

STATE BOARD OF EDUCATION
(State Board for Career and Technology Education)

KEVEN ELLIS, Lufkin
Chair of the State Board of Education
District 9

MARTY ROWLEY, Amarillo
Vice Chair of the State Board of
Education
District 15

GEORGINA PÉREZ, El Paso
Secretary of the State Board of
Education
District 1

Board Members

LAWRENCE ALLEN, JR., Houston
District 4

PAM LITTLE, Fairview
District 12

DONNA BAHORICH, Houston
District 6

TOM MAYNARD, Florence
District 10

BARBARA CARGILL, Conroe
District 8

SUE MELTON-MALONE, Robinson
District 14

RUBEN CORTEZ, JR., Brownsville
District 2

KEN MERCER, San Antonio
District 5

AICHA DAVIS, Dallas
District 13

MARISA PEREZ-DIAZ, Converse
District 3

PATRICIA HARDY, Fort Worth
District 11

MATT ROBINSON, Friendswood
District 7

Committees of the State Board of Education

INSTRUCTION

Sue Melton-Malone, chair
Pam Little, vice chair
Aicha Davis
Georgina C. Pérez
Marty Rowley

SCHOOL FINANCE/PERMANENT SCHOOL FUND

Tom Maynard, chair
Lawrence Allen, Jr., vice chair
Donna Bahorich
Patricia Hardy
Ken Mercer

SCHOOL INITIATIVES

Barbara Cargill, chair
Marisa Perez-Diaz, vice chair
Ruben Cortez, Jr.
Keven Ellis
Matt Robinson

April 16, 2020

State Board of Education
Austin, Texas

I certify that this is the official agenda of the State Board of Education for its meeting on April 16-17, 2020. Agenda items have been prepared and reviewed by Texas Education Agency staff and are presented for the board's discussion and consideration. Where appropriate, I have proposed an action.

Respectfully submitted,

A handwritten signature in black ink, appearing to read 'Mike Morath', with a long horizontal flourish extending to the right.

Mike Morath
Commissioner of Education

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SCHEDULE AND AGENDAS

Committees and Board

State Board of Education, Austin, Texas

Meeting Times

April 16-17, 2020

Thursday, April 16, 2020

9:00 a.m. Committee of the Full Board

The following committee meetings will begin at 11:00 a.m. or upon adjournment of the Committee of the Full Board:

Committee on Instruction

Committee on School Finance/Permanent School Fund

Committee on School Initiatives

Friday, April 17, 2020

9:00 a.m. General Meeting

If the Committee of the Full Board does not complete its agenda Thursday, it will resume its virtual meeting on Friday. If the Committee on Instruction does not complete its agenda Thursday, it will resume its virtual meeting on Friday. If the Committee on School Finance/Permanent School Fund does not complete its agenda Thursday, it will resume its virtual meeting on Friday. If the Committee on School Initiatives does not complete its agenda Thursday, it will resume its virtual meeting on Friday.

NOTE: The chair may permit the board to take up and discuss any of the discussion items on a committee agenda, including hearing any invited presentations to a committee, based upon a recommendation from the committee or inability of the committee to complete its agenda on a preceding day.

The SBOE or a committee of the SBOE may conduct a closed meeting on any agenda item in accordance with Texas Open Meetings Act, Chapter 551, Subchapters D and E. Before any closed meeting is convened, the presiding officer will publicly identify the section or sections of the Act authorizing the closed meeting. All final votes, actions, or decisions will be taken in open meeting.

Agenda is online at

http://tea.texas.gov/About_TEA/Leadership/State_Board_of_Education/SBOE_Meetings/State_Board_of_Education_Agenda/ on the Texas Education Agency website. The posted information contains links to board action items including rule items and rule text, and selected discussion items. Public comments on proposed rules may be submitted electronically. All agenda items and rule text are subject to change at any time prior to each board meeting. To the extent possible, copies of changes made after the agenda and the schedule are published will be available at the time of the virtual meeting.

THURSDAY
April 16, 2020

9:00 a.m.

COMMITTEE OF THE FULL BOARD

Public testimony – Individual testimony will be taken at the time the related item comes up for committee discussion or action. The procedures for registering and taking public testimony at State Board of Education committee meetings and general board meetings are provided at <https://tea.texas.gov/about-tea/leadership/state-board-education/sboe-meetings/sboe-operating-rules-amended-9-13-19> or in the information section of the agenda.

- 1. Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements (Second Reading and Final Adoption) (Board agenda page I-1)**

COMMITTEE - ACTION
SBOE - ACTION

This item presents for second reading and final adoption proposed amendments to 19 Texas Administrative Code (TAC) Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements. The proposed amendments would update the rules to align with the requirements of House Bill (HB) 678, 86th Texas Legislature, 2019, and revisions to career and technical education (CTE) programs of study. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a) and (c-1).

COMMITTEE OF THE FULL BOARD (continued)

2. **Proposed Revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education**
(Second Reading and Final Adoption)
(Board agenda page I-12)

COMMITTEE - ACTION
SBOE - ACTION

This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC) Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources, Subchapter C, Arts, Audio/Video Technology, and Communications, Subchapter K, Information Technology, Subchapter O, Science, Technology, Engineering, and Mathematics, and Subchapter Q, Energy. The proposed revisions would update the Texas Essential Knowledge and Skills (TEKS) to align with recent legislation requiring the board to consolidate high school technology applications TEKS into the career and technical education (CTE) TEKS and eliminate TEKS for duplicative courses. The proposed revisions would also update the TEKS for CTE to add a new career cluster in energy to align with revised programs of study. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

COMMITTEE OF THE FULL BOARD (continued)

3. **Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses (Second Reading and Final Adoption) (Board agenda page I-103)**

**COMMITTEE - ACTION
SBOE - ACTION**

This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC), Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, to add Texas Essential Knowledge and Skills (TEKS) for a new African American studies ethnic studies course, to renumber sections, and to update references to course numbers and titles to reflect recent revisions to the social studies TEKS. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c); and 28.025(a).

4. ***Proclamation 2022* of the State Board of Education Advertising for Bids on Instructional Materials (Board agenda page I-128)**

**COMMITTEE - ACTION
SBOE - ACTION**

This item provides an opportunity for the State Board of Education (SBOE) to issue *Proclamation 2022*, calling for instructional materials for health and physical education. Instructional materials submitted in response to *Proclamation 2022* would be scheduled for adoption by the SBOE in November 2021. Statutory authority for this action is the Texas Education Code (TEC), §31.022.

5. **Perkins Reauthorization and Approval of State Plan (Board agenda page I-163)**

**COMMITTEE - ACTION
SBOE - ACTION**

This item provides the opportunity for the board to hear an update on the reauthorization of federal Perkins funding and approve the four-year career and technical education plan for the state of Texas in compliance with the reauthorization. Statutory authority for this action is the Texas Education Code (TEC), §7.109.

COMMITTEE OF THE FULL BOARD (continued)

- 6. Update on Texas Essential Knowledge and Skills (TEKS) Review**
(Board agenda page I-458)

COMMITTEE - ACTION
SBOE - ACTION

This item provides the opportunity for staff to present an update on the review of the Texas Essential Knowledge and Skills (TEKS) and the English Language Proficiency Standards (ELPS). The item also provides the opportunity for the board to provide additional guidance to TEKS and ELPS review work groups. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

**THURSDAY
April 16, 2020**

11:00 a.m. or upon adjournment of the Committee of the Full Board

COMMITTEE ON INSTRUCTION

Members: Sue Melton-Malone, chair; Pam Little, vice chair; Aicha Davis; Georgina C. Pérez; Marty Rowley. A quorum of the State Board of Education may attend the committee meeting and discuss items on the committee agenda.

Public testimony – Individual testimony will be taken at the time the related item comes up for committee discussion or action. The procedures for registering and taking public testimony at State Board of Education committee meetings and general board meetings are provided at <https://tea.texas.gov/about-tea/leadership/state-board-education/sboe-meetings/sboe-operating-rules-amended-9-13-19> or in the information section of the agenda.

- 1. Proposed Repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32 (Second Reading and Final Adoption) (Board agenda page II-I)**

**COMMITTEE - ACTION
SBOE - ACTION**

This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32. The proposed repeals would remove the Texas Essential Knowledge and Skills (TEKS) adopted to be effective in 2009 for high school English and Spanish language arts and reading and English as a second language and related implementation language that will be superseded by new 19 TAC §§110.35-110.39 and §§128.33-128.35 beginning with the 2020-2021 school year. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

COMMITTEE ON INSTRUCTION (continued)

**2. Action Regarding Origo Education
(Board agenda page II-5)**

**COMMITTEE - ACTION
SBOE - ACTION**

This item provides the opportunity for the committee and board to consider action regarding Origo Education related to substitution of new editions of a student journal for its adopted products for English and Spanish math, grades K-5. Origo Education has substituted new editions for the products adopted by the State Board of Education (SBOE) in 2013. Statutory authority for this action is the Texas Education Code (TEC), §§31.003, 31.022. and 31.151.

**THURSDAY
April 16, 2020**

11:00 a.m. or upon adjournment of the Committee of the Full Board

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND

Members: Tom Maynard, chair; Lawrence A. Allen, Jr., vice chair; Donna Bahorich; Patricia Hardy; Ken Mercer. A quorum of the State Board of Education may attend the committee meeting and discuss items on the committee agenda. A quorum of the Committee of Investment Advisors to the Permanent School Fund may attend the committee meeting and discuss items on the committee agenda.

Public testimony – Individual testimony will be taken at the time the related item comes up for committee discussion or action. The procedures for registering and taking public testimony at State Board of Education committee meetings and general board meetings are provided at <https://tea.texas.gov/about-tea/leadership/state-board-education/sboe-meetings/sboe-operating-rules-amended-9-13-19> or in the information section of the agenda.

- 1. Proposed Repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds
(Second Reading and Final Adoption)
(Board agenda page III-1)**

**COMMITTEE – ACTION
SBOE – ACTION**

This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 105, Foundation School Program, Subchapter B, Use of State Funds, §105.11, Maximum Allowable Indirect Cost, and §105.12, Basic Allotment. The proposed repeals would implement House Bill (HB) 3, 86th Texas Legislature, 2019, which removed the State Board of Education's (SBOE's) rulemaking authority related to maximum allowable indirect costs and the basic allotment for the Foundation School Program (FSP). No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), [§48.004](#), as transferred, redesignated, and amended by HB 3, 86th Texas Legislature, 2019.

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND (continued)

2. **Proposed Amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures**
(First Reading and Filing Authorization)
(Board agenda page III-5)

COMMITTEE – ACTION
SBOE – ACTION

This item presents for first reading and filing authorization proposed amendment to 19 Texas Administrative Code (TAC) Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures. The proposed amendment would reflect changes made by House Bill (HB) 1520, 86th Texas Legislature, 2019, that eliminated the requirement for out-of-state certified public accountancy (CPA) firms to be licensed in Texas. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(32), 44.001, 44.007, 44.008, and 44.010.

3. **Review of Permanent School Fund Securities Transactions and the Investment Portfolio**
(Board agenda page III-10)

COMMITTEE - DISCUSSION
SBOE – NO ACTION

Investment staff will report on the transactions executed during the months of December 2019, January and February 2020 in the investment portfolio of the Texas Permanent School Fund. Statutory authority for this item is the Texas Constitution, Article VII, §2 and §5, and 19 Texas Administrative Code (TAC) Chapter 33.

4. **Ratification of the Purchases and Sales of the Investment Portfolio of the Permanent School Fund for the Months of December 2019, January and February 2020**
(Board agenda page III-11)

COMMITTEE - ACTION
SBOE - CONSENT

This item provides an opportunity for the committee and board to consider approval of the purchases and sales of investments executed in the portfolio of the Permanent School Fund for the months of December 2019, January and February 2020. Statutory authority for this action is the Texas Constitution, Article VII, §2 and §5, and 19 Texas Administrative Code (TAC) Chapter 33.

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND (continued)

- 5. Report of the Permanent School Fund Executive Administrator and Chief Investment Officer**
(Board agenda page III-12)

COMMITTEE - DISCUSSION
SBOE - NO ACTION

The Permanent School Fund executive administrator will report to the committee on matters relating to the management of the Permanent School Fund and the Charter District Reserve Fund. The report may present information on historical and current status of Fund holdings, current and proposed investment policies and procedures, and historical and current Fund performance and compliance. The administrator may update the board on the bond guarantee program, the status of requests for proposal or for qualifications and current contracts for services and other administrative activities undertaken on behalf of the board. The administrator may provide an update on the PSF distribution or on the effect of legislation impacting the PSF. The administrator may provide an analysis of current and future investment market conditions, focusing upon the impact on the holdings of the PSF. Statutory authority for this item is Texas Constitution, Article VII, §2 and §5, 19 Texas Administrative Code (TAC) Chapter 33.

**THURSDAY
April 16, 2020**

11:00 a.m. or upon adjournment of the Committee of the Full Board

COMMITTEE ON SCHOOL INITIATIVES

Members: Barbara Cargill, chair; Marisa B. Perez-Diaz, vice chair; Ruben Cortez, Jr; Keven Ellis; Matt Robinson. A quorum of the State Board of Education may attend the committee meeting and discuss items on the committee agenda.

Public testimony – Individual testimony will be taken at the time the related item comes up for committee discussion or action. The procedures for registering and taking public testimony at State Board of Education committee meetings and general board meetings are provided at <https://tea.texas.gov/about-tea/leadership/state-board-education/sboe-meetings/sboe-operating-rules-amended-9-13-19> or in the information section of the agenda.

- 1. Recommendation for Appointment to the Fort Sam Houston Independent School District Board of Trustees
(Board agenda page IV-1)**

**COMMITTEE - ACTION
SBOE - CONSENT**

This item provides an opportunity for the board to consider an appointment to the board of trustees of the Fort Sam Houston Independent School District. The appointment is necessary due to the expiration of the term of office for a board member. Statutory authority for this action is the Texas Education Code (TEC) 11.352.

- 2. Recommendation for Appointments to the Lackland Independent School District Board of Trustees
(Board agenda page IV-22)**

**COMMITTEE – ACTION
SBOE - CONSENT**

This item provides an opportunity for the board to consider two appointments to the board of trustees of the Lackland Independent School District. The appointments are necessary due to the expiration of the term of office for two board members. Statutory authority for this action is the Texas Education Code (TEC) 11.352.

COMMITTEE ON SCHOOL INITIATIVES (continued)

- 3. Open-Enrollment Charter School Generation 25 Application Updates**
(Board agenda page IV-33)

COMMITTEE – DISCUSSION
SBOE – NO ACTION

The director of the Division of Charter School Administration will discuss updates regarding the Generation Twenty-Five Open-Enrollment Charter Application cycle. Statutory authority for this item is the Texas Education Code (TEC), §12.110.

- 4. Adoption of Review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters (Adoption of Review)**
(Board agenda page IV-34)

COMMITTEE – ACTION
SBOE – ACTION

Texas Government Code, §2001.039, establishes a four-year rule review cycle for all state agency rules, including State Board of Education (SBOE) rules. This item presents the adoption of review of 19 Texas Administrative Code (TAC) Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters. Subchapter A establishes a provision for an SBOE member to be designated as the liaison for charter selection for charters proposed under Texas Education Code (TEC), Chapter 12, Subchapter D; charter selection procedures for charters granted under the TEC, Chapter 12, Subchapter D; and provisions for a 90-day no-contact requirement. Subchapter B sets forth provisions for adverse action on a home-rule school district charter. The statutory authority for the rule review is the Texas Government Code (TGC), §2001.039. The statutory authority for 19 TAC Chapter 100, Subchapter A, is the Texas Education Code (TEC), §12.101. The statutory authority for 19 TAC Chapter 100, Subchapter B, is TEC, §§7.102(c)(8), 12.028, 12.101(b), and 12.101(b-0).

COMMITTEE ON SCHOOL INITIATIVES (continued)

5. **Review of Proposed Amendments to 19 TAC Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures**
(Board agenda page IV-38)

COMMITTEE – ACTION
SBOE – ACTION

This item provides the State Board of Education (SBOE) an opportunity to review the State Board for Educator Certification (SBEC) rule actions that would propose amendments to 19 Texas Administrative Code (TAC) Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures. The proposed amendments would implement the statutory requirements of Senate Bill (SB) 1839 and House Bills (HBs) 2039 and 3349, 85th Texas Legislature, Regular Session, 2017, and HB 3, 86th Texas Legislature, 2019. The proposed amendment to Subchapter C, Assessment of Educators, would reduce the amount of time for computer- and paper-based examination retakes from 45 to 30 days and would update the figure specifying the required test for issuance of the standard certification, including the removal of the master teacher certification class and the Principal: Early Childhood-Grade 12 certificate and the addition of Early Childhood-Grade 3 (EC-3), Science of Teaching Reading, and Trade and Industrial Workforce Training. The proposed amendment to Subchapter D, Types and Classes of Certificates Issued, would require the English as a Second Language Supplemental assessment for issuance of an intern certificate obtained through the intensive pre-service route. The proposed amendment to Subchapter E, Educational Aide Certificate, would allow the Educational Aide I certificate to be issued to high school students who have completed certain career and technical education courses. Proposed changes to Subchapter G, Certificate Issuance Procedures, would clarify that requests for certificate corrections be submitted to the Texas Education Agency (TEA) within six weeks from the original date of issuance. The proposed changes would also implement the requirement specified in statute that certified classroom teachers must complete training prior to receiving test approval for the Early Childhood: Prekindergarten-Grade 3 certificate. The SBEC made changes to the proposed text in Figure: 19 TAC §230.21(e) in response to public comment and to revert text for future rulemaking. Statutory authority for 19 TAC Chapter 230 is the Texas Education Code (TEC) §§21.041(b)(1), (2), and (4); 21.044(a); 21.048, as amended by HB 3, 86th Texas Legislature, 2019; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.064, as amended by HB 3, 86th Texas Legislature, Regular Session, 2019; 22.082; and Texas Occupations Code (TOC), §54.003, for Subchapter C; 21.003(a); 21.031; 21.041(b)(1)-(5) and (9); 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 22.064; and 22.0831(c) and (f) for Subchapter D; 21.041(a) and (b)(1)-(4) for Subchapter E; and 21.031(a); 21.041(b)(1)-(5) and (9) and (c); 21.044(a), (e), and (f); 21.048, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.0485; 21.0489; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.054(a), as amended by SBs 7, 179, and 1839, 85th Texas Legislature, Regular Session, 2017, and HB 2424, 86th Texas Legislature, 2019; 22.082; and 22.0831(c) and (f); and TOC, §53.105, for Subchapter G.

Information Materials

- 1. State Board of Education Operating Rules, September 13, 2019**
Public testimony information begins on page V-8.
(Board agenda page V-1)

- 2. Current Status of the Permanent School Fund**
(Board agenda page V-24)

- 3. 2017-2021 Rule Review Plan for State Board of Education Rules**
(Board agenda page V-25)

This item outlines the rule review plan for State Board of Education (SBOE) rules during the period of September 2017 through August 2021. Texas Government Code, §2001.039, requires an ongoing four-year rule review of existing state agency rules, including SBOE rules. The rule review requirement is designed to ensure that the reason for initially adopting or readopting a rule continues to exist.

OFFICIAL AGENDA

**STATE BOARD OF EDUCATION
AUSTIN, TEXAS**

**April 17, 2020
9:00 a.m.**

Student Performance

Invocation

Pledge of Allegiance

Roll Call

Approval of Minutes

State Board of Education, November 15, 2019

State Board of Education, January 31, 2020

Public testimony – Individual testimony will be taken at the time the related item comes up for Committee discussion or action. The procedures for registering and taking public testimony at State Board of Education committee meetings and general board meetings are provided at <https://tea.texas.gov/about-tea/leadership/state-board-education/sboe-meetings/sboe-operating-rules-amended-9-13-19> or in the information section of the agenda.

1. Approval of Consent Agenda

Any agenda item may be placed on the Consent Agenda by any State Board of Education committee.

[\(Agenda Exhibit\)](#) 22

COMMITTEE OF THE FULL BOARD

2. Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements (Second Reading and Final Adoption)

This item presents for second reading and final adoption proposed amendments to 19 Texas Administrative Code (TAC) Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements. The proposed amendments would update the rules to align with the requirements of House Bill (HB) 678, 86th Texas Legislature, 2019, and revisions to career and technical education (CTE) programs of study. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a) and (c-1).

[\(Agenda Exhibit\)](#) I-1

COMMITTEE OF THE FULL BOARD (continued)

**3. Proposed Revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education
(Second Reading and Final Adoption)**

This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC) Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources, Subchapter C, Arts, Audio/Video Technology, and Communications, Subchapter K, Information Technology, Subchapter O, Science, Technology, Engineering, and Mathematics, and Subchapter Q, Energy. The proposed revisions would update the Texas Essential Knowledge and Skills (TEKS) to align with recent legislation requiring the board to consolidate high school technology applications TEKS into the career and technical education (CTE) TEKS and eliminate TEKS for duplicative courses. The proposed revisions would also update the TEKS for CTE to add a new career cluster in energy to align with revised programs of study. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

(Agenda Exhibit) I-12

**4. Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses
(Second Reading and Final Adoption)**

This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC), Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, to add Texas Essential Knowledge and Skills (TEKS) for a new African American studies ethnic studies course, to renumber sections, and to update references to course numbers and titles to reflect recent revisions to the social studies TEKS. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c); and 28.025(a).

(Agenda Exhibit) I-103

5. *Proclamation 2022 of the State Board of Education Advertising for Bids on Instructional Materials*

This item provides an opportunity for the State Board of Education (SBOE) to issue *Proclamation 2022*, calling for instructional materials for health and physical education. Instructional materials submitted in response to *Proclamation 2022* would be scheduled for adoption by the SBOE in November 2021. Statutory authority for this action is the Texas Education Code (TEC), §31.022.

(Agenda Exhibit) I-128

COMMITTEE OF THE FULL BOARD (continued)

6. Perkins Reauthorization and Approval of State Plan

This item provides the opportunity for the board to hear an update on the reauthorization of federal Perkins funding and approve the four-year career and technical education plan for the state of Texas in compliance with the reauthorization. Statutory authority for this action is the Texas Education Code (TEC), §7.109.

[\(Agenda Exhibit\)](#) I-163

7. Update on Texas Essential Knowledge and Skills (TEKS) Review

This item provides the opportunity for staff to present an update on the review of the Texas Essential Knowledge and Skills (TEKS) and the English Language Proficiency Standards (ELPS). The item also provides the opportunity for the board to provide additional guidance to TEKS and ELPS review work groups. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

[\(Agenda Exhibit\)](#) I-458

COMMITTEE ON INSTRUCTION

8. Proposed Repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32 (Second Reading and Final Adoption)

This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32. The proposed repeals would remove the Texas Essential Knowledge and Skills (TEKS) adopted to be effective in 2009 for high school English and Spanish language arts and reading and English as a second language and related implementation language that will be superseded by new 19 TAC §§110.35-110.39 and §§128.33-128.35 beginning with the 2020-2021 school year. No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(4), 28.002(a) and (c), and 28.025(a).

[\(Agenda Exhibit\)](#) II-1

COMMITTEE ON INSTRUCTION (continued)

9. Action Regarding Origo Education

This item provides the opportunity for the committee and board to consider action regarding Origo Education related to substitution of new editions of a student journal for its adopted products for English and Spanish math, grades K-5. Origo Education has substituted new editions for the products adopted by the State Board of Education (SBOE) in 2013. Statutory authority for this action is the Texas Education Code (TEC), §§31.003, 31.022. and 31.151.

(Agenda Exhibit) II-5

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND

10. Proposed Repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds (Second Reading and Final Adoption)

This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 105, Foundation School Program, Subchapter B, Use of State Funds, §105.11, Maximum Allowable Indirect Cost, and §105.12, Basic Allotment. The proposed repeals would implement House Bill (HB) 3, 86th Texas Legislature, 2019, which removed the State Board of Education's (SBOE's) rulemaking authority related to maximum allowable indirect costs and the basic allotment for the Foundation School Program (FSP). No changes are recommended since approved for first reading. Statutory authority for this action is the Texas Education Code (TEC), §48.004, as transferred, redesignated, and amended by HB 3, 86th Texas Legislature, 2019.

(Agenda Exhibit) III-1

11. Proposed Amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures (First Reading and Filing Authorization)

This item presents for first reading and filing authorization proposed amendment to 19 Texas Administrative Code (TAC) Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures. The proposed amendment would reflect changes made by House Bill (HB) 1520, 86th Texas Legislature, 2019, that eliminated the requirement for out-of-state certified public accountancy (CPA) firms to be licensed in Texas. Statutory authority for this action is the Texas Education Code (TEC), §§7.102(c)(32), 44.001, 44.007, 44.008, and 44.010.

(Agenda Exhibit) III-5

COMMITTEE ON SCHOOL INITIATIVES

**12. Adoption of Review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters
(Adoption of Review)**

Texas Government Code, §2001.039, establishes a four-year rule review cycle for all state agency rules, including State Board of Education (SBOE) rules. This item presents the adoption of review of 19 Texas Administrative Code (TAC) Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters. Subchapter A establishes a provision for an SBOE member to be designated as the liaison for charter selection for charters proposed under Texas Education Code (TEC), Chapter 12, Subchapter D; charter selection procedures for charters granted under the TEC, Chapter 12, Subchapter D; and provisions for a 90-day no-contact requirement. Subchapter B sets forth provisions for adverse action on a home-rule school district charter. The statutory authority for the rule review is the Texas Government Code (TGC), §2001.039. The statutory authority for 19 TAC Chapter 100, Subchapter A, is the Texas Education Code (TEC), §12.101. The statutory authority for 19 TAC Chapter 100, Subchapter B, is TEC, §§7.102(c)(8), 12.028, 12.101(b), and 12.101(b-0).

(Agenda Exhibit) IV-34

COMMITTEE ON SCHOOL INITIATIVES (continued)

13. Review of Proposed Amendments to 19 TAC Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures

This item provides the State Board of Education (SBOE) an opportunity to review the State Board for Educator Certification (SBEC) rule actions that would propose amendments to 19 Texas Administrative Code (TAC) Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures. The proposed amendments would implement the statutory requirements of Senate Bill (SB) 1839 and House Bills (HBs) 2039 and 3349, 85th Texas Legislature, Regular Session, 2017, and HB 3, 86th Texas Legislature, 2019. The proposed amendment to Subchapter C, Assessment of Educators, would reduce the amount of time for computer- and paper-based examination retakes from 45 to 30 days and would update the figure specifying the required test for issuance of the standard certification, including the removal of the master teacher certification class and the Principal: Early Childhood-Grade 12 certificate and the addition of Early Childhood-Grade 3 (EC-3), Science of Teaching Reading, and Trade and Industrial Workforce Training. The proposed amendment to Subchapter D, Types and Classes of Certificates Issued, would require the English as a Second Language Supplemental assessment for issuance of an intern certificate obtained through the intensive pre-service route. The proposed amendment to Subchapter E, Educational Aide Certificate, would allow the Educational Aide I certificate to be issued to high school students who have completed certain career and technical education courses. Proposed changes to Subchapter G, Certificate Issuance Procedures, would clarify that requests for certificate corrections be submitted to the Texas Education Agency (TEA) within six weeks from the original date of issuance. The proposed changes would also implement the requirement specified in statute that certified classroom teachers must complete training prior to receiving test approval for the Early Childhood: Prekindergarten-Grade 3 certificate. The SBEC made changes to the proposed text in Figure: 19 TAC §230.21(e) in response to public comment and to revert text for future rulemaking. Statutory authority for 19 TAC Chapter 230 is the Texas Education Code (TEC) §§21.041(b)(1), (2), and (4); 21.044(a); 21.048, as amended by HB 3, 86th Texas Legislature, 2019; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.064, as amended by HB 3, 86th Texas Legislature, Regular Session, 2019; 22.082; and Texas Occupations Code (TOC), §54.003, for Subchapter C; 21.003(a); 21.031; 21.041(b)(1)-(5) and (9); 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 22.064; and 22.0831(c) and (f) for Subchapter D; 21.041(a) and (b)(1)-(4) for Subchapter E; and 21.031(a); 21.041(b)(1)-(5) and (9) and (c); 21.044(a), (e), and (f); 21.048, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.0485; 21.0489; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.054(a), as amended by SBs 7, 179, and 1839, 85th Texas Legislature, Regular Session, 2017, and HB 2424, 86th Texas Legislature, 2019; 22.082; and 22.0831(c) and (f); and TOC, §53.105, for Subchapter G.

(Agenda Exhibit) IV-38

REPORTS OF COMMITTEES REGARDING AGENDA ITEMS POSTED FOR DISCUSSION ON COMMITTEE AGENDAS

Committee chairs may provide an update about discussion items considered during the current meeting by any standing committee or ad hoc committee.

REPORTS OF OTHER STATE BOARD OF EDUCATION MEMBERS REGARDING AGENDA ITEMS AND EDUCATIONAL ACTIVITIES AND CONCERNS IN INDIVIDUAL DISTRICTS

Members of the State Board of Education may present information regarding agenda items or other relevant information about public education.

Information Materials

1. **State Board of Education Operating Rules, September 13, 2019**
Public testimony information begins on page V-8.
(Board agenda page V-1)

2. **Current Status of the Permanent School Fund**
(Board agenda page V-24)

3. **2017-2021 Rule Review Plan for State Board of Education Rules**
(Board agenda page V-25)

This item outlines the rule review plan for State Board of Education (SBOE) rules during the period of September 2017 through August 2021. Texas Government Code, §2001.039, requires an ongoing four-year rule review of existing state agency rules, including SBOE rules. The rule review requirement is designed to ensure that the reason for initially adopting or readopting a rule continues to exist.

**CONSENT AGENDA
STATE BOARD OF EDUCATION
April 17, 2020**

(1) Ratification of the Purchases and Sales of the Investment Portfolio of the Permanent School Fund for the Months of December 2019, January and February 2020

This item provides an opportunity for the committee and board to consider approval of the purchases and sales of investments executed in the portfolio of the Permanent School Fund for the months of December 2019, January and February 2020. Statutory authority for this action is the Texas Constitution, Article VII, §2 and §5, and 19 Texas Administrative Code (TAC) Chapter 33.

[\(Agenda Exhibit\)](#) III-11

(2) Recommendation for Appointment to the Fort Sam Houston Independent School District Board of Trustees

This item provides an opportunity for the board to consider an appointment to the board of trustees of the Fort Sam Houston Independent School District. The appointment is necessary due to the expiration of the term of office for a board member. Statutory authority for this action is the Texas Education Code (TEC) 11.352.

[\(Agenda Exhibit\)](#) IV-1

(3) Recommendation for Appointments to the Lackland Independent School District Board of Trustees

This item provides an opportunity for the board to consider two appointments to the board of trustees of the Lackland Independent School District. The appointments are necessary due to the expiration of the term of office for two board members. Statutory authority for this action is the Texas Education Code (TEC) 11.352.

[\(Agenda Exhibit\)](#) IV-22

COMMITTEE OF THE FULL BOARD

Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements
(Second Reading and Final Adoption)

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION
STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item presents for second reading and final adoption proposed amendments to 19 Texas Administrative Code (TAC) Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements. The proposed amendments would update the rules to align with the requirements of House Bill (HB) 678, 86th Texas Legislature, 2019, and revisions to career and technical education (CTE) programs of study. No changes are recommended since approved for first reading.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(4); 28.002(a) and (c); and 28.025(a) and (c-1).

TEC, §7.102(c)(4), requires the State Board of Education (SBOE) to establish curriculum and graduation requirements.

TEC, §28.002(a), identifies the subjects of the required curriculum.

TEC, §28.002(c), requires the SBOE to by rule identify the essential knowledge and skills of each subject in the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials and addressed on the state assessment instruments.

TEC, §28.025(a), requires the SBOE to by rule determine the curriculum requirements for the foundation high school program that are consistent with the required curriculum and to designate the specific courses in the foundation curriculum that are required under the foundation high school program.

TEC, §28.025(c-1), requires the SBOE to by rule provide students with multiple options for earning each endorsement, including, to the greatest extent possible, coherent sequences of courses. The SBOE by rule must permit a student to enroll in courses under more than one endorsement curriculum before the student's junior year.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed amendments is August 1, 2020. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2020-2021 school year. The earlier effective date will allow districts of innovation that begin school prior to the statutorily required start date to implement the proposed rulemaking when they begin their school year.

PREVIOUS BOARD ACTION: The SBOE adopted rules in 19 TAC Chapter 74, Subchapter B, to implement the Foundation High School Program effective July 8, 2014. The SBOE adopted amendments

to 19 TAC Chapter 74, Subchapter B, effective August 22, 2016; August 28, 2017; and August 27, 2018. The SBOE last adopted amendments effective August 1, 2019. A discussion item regarding Chapter 74, Subchapter B, was included on the agenda for the Committee of the Full Board during the November 2019 SBOE meeting. The board approved for first reading and filing authorization the proposed amendments to 19 TAC §§74.11-74.13 at the January 2020 SBOE meeting.

BACKGROUND INFORMATION AND JUSTIFICATION: The 83rd Texas Legislature, Regular Session, 2013, passed HB 5, amending TEC, §28.025, to transition from three high school graduation programs to one foundation high school program with endorsement options to increase flexibility for students. HB 5 gave the SBOE the authority to identify advanced courses related to the new graduation program, identify the curriculum requirements for the endorsements, and determine the requirements for performance acknowledgments related to the graduation program.

The 86th Texas Legislature, 2019, passed HB 678, which amended TEC, §28.025(b-21), to allow elementary school students to earn one high school credit toward the languages other than English (LOTE) graduation requirement by successfully completing a course in American Sign Language (ASL).

The 86th Texas Legislature, 2019, also passed HB 963, which requires the SBOE, not later than March 1, 2020, to conduct a review of the TEKS for CTE and technology applications courses for Grades 9-12 and amend the board's rules to consolidate courses and eliminate duplicative courses. The SBOE is required to implement this provision only if the legislature appropriated money specifically for that purpose. If the legislature did not appropriate money specifically for that purpose, the SBOE may, but is not required to, implement a requirement using other appropriations available for that purpose. The legislature did not appropriate money specifically for the purpose of implementing this requirement.

Texas is redesigning state-level programs of study to include coherent and rigorous content with challenging academic standards and relevant career and technical content. Programs of study will be aligned with state and regional labor market information, including high-wage, high-skill, and in-demand occupations. As a part of the program of study revision process, Texas conducted a statewide labor market analysis that discovered several instances where occupations and postsecondary training overlap.

The attachment to this item reflects the text of proposed amendments to 19 TAC §§74.11-74.13 for consideration by the SBOE for second reading and final adoption. The proposed amendments would update the graduation requirements to reflect changes to the rules on endorsements to reflect the revised programs of study and to ensure that a student who completed a program of study could earn one of the endorsements. Additionally, the proposed amendments would update the rules to align with the consolidation of the high school technology applications and CTE TEKS, allow students who completed an ASL course in elementary school to earn one high school credit toward the LOTE graduation requirement, and clarify language regarding the requirements for satisfying a LOTE graduation requirement by completing a dual language immersion program while in elementary school.

No changes are recommended since approved for first reading.

Proposed revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics, and Subchapter Q, Energy, is presented as a separate item in this agenda.

FISCAL IMPACT: No changes have been made to this section since published as proposed.

The TEA has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed.

The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed.

The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed.

The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed.

The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed.

TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed rulemaking would expand an existing regulation by allowing elementary school students to earn one high school credit toward the LOTE graduation requirement by successfully completing a course in ASL. The proposed rulemaking would also expand a regulation by allowing students to fulfill graduation requirements by completing courses in a new career cluster for CTE.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not create a new regulation; would not limit or repeal an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: No changes have been made to this section since published as proposed.

The proposal would provide added flexibility in course options for students to meet high school graduation requirements. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed.

The proposal would have no new data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed.

The TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: Following the January 2020 SBOE meeting, notice of the proposed amendments to 19 TAC §§74.11-74.13 was filed with the Texas Register, initiating the public comment period. The public comment period on the proposal began March 6, 2020, and ended April 10, 2020. No comments had been received at the time this item was prepared. A summary of any public comments received regarding the proposal will be provided to the SBOE prior to and during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposal at the appropriate committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for second reading and final adoption the proposed amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements; §74.12, Foundation High School Program; and §74.13, Endorsements; and

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements; §74.12, Foundation High School Program; and §74.13, Endorsements, is necessary and shall have an effective date of August 1, 2020. *(Per TEC, §7.102(f), a vote of two-thirds of the members of the board is necessary for an earlier effective date.)*

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services
Shelly Ramos, Senior Director, Curriculum Standards and Student Support

Attachment: Text of Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements; §74.12, Foundation High School Program; and §74.13, Endorsements

ATTACHMENT
Text of Proposed Amendments to 19 TAC

Chapter 74. Curriculum Requirements

Subchapter B. Graduation Requirements

§74.11. High School Graduation Requirements.

(a)-(f) (No change.)

(g) Elective credits may be selected from the following:

- (1) high school courses not required for graduation that are listed in the following chapters of this title:
 - (A) Chapter 110 of this title (relating to Texas Essential Knowledge and Skills for English Language Arts and Reading);
 - (B) Chapter 111 of this title (relating to Texas Essential Knowledge and Skills for Mathematics);
 - (C) Chapter 112 of this title (relating to Texas Essential Knowledge and Skills for Science);
 - (D) Chapter 113 of this title (relating to Texas Essential Knowledge and Skills for Social Studies);
 - (E) Chapter 114 of this title (relating to Texas Essential Knowledge and Skills for Languages Other Than English);
 - (F) Chapter 115 of this title (relating to Texas Essential Knowledge and Skills for Health Education);
 - (G) Chapter 116 of this title (relating to Texas Essential Knowledge and Skills for Physical Education);
 - (H) Chapter 117 of this title (relating to Texas Essential Knowledge and Skills for Fine Arts);
 - ~~(I) Chapter 126 of this title (relating to Texas Essential Knowledge and Skills for Technology Applications);~~
 - (I) ~~(H)~~ Chapter 127 of this title (relating to Texas Essential Knowledge and Skills for Career Development); and
 - (J) ~~(K)~~ Chapter 130 of this title (relating to Texas Essential Knowledge and Skills for Career and Technical Education);
- (2) state-approved innovative courses as specified in §74.27 of this title (relating to Innovative Courses and Programs);
- (3) Junior Reserve Officer Training Corps (JROTC)--one to four credits; and
- (4) Driver Education--one-half credit.

(h)-(n) (No change.)

§74.12. Foundation High School Program.

(a) (No change.)

(b) Core courses. A student must demonstrate proficiency in the following.

(1)-(4) (No change.)

(5) Languages other than English (LOTE)--two credits.

- (A) The credits may be selected from the following:
 - (i) any two levels in the same language, including comparable AP or IB language courses that do not count toward another credit required for graduation; or
 - (ii) two credits in computer programming languages, including computer coding, to be selected from Computer Science I, II, and III, AP Computer Science Principles, AP Computer Science A, IB Computer Science Standard Level, and IB Computer Science Higher Level.
- (B) A single two-credit IB LOTE course may only satisfy one LOTE requirement.
- (C) If a student, in completing the first credit of LOTE, demonstrates that the student is unlikely to be able to complete the second credit, the student may substitute another appropriate course as follows:
 - (i) Special Topics in Language and Culture;
 - (ii) World History Studies or World Geography Studies for a student who is not required to complete both by the local district;
 - (iii) another credit selected from Chapter 114 of this title (relating to Texas Essential Knowledge and Skills for Languages Other Than English); or
 - (iv) computer programming languages, including computer coding.
- (D) The determination regarding a student's ability to complete the second credit of LOTE must be agreed to by:
 - (i) the teacher of the first LOTE credit course or another LOTE teacher designated by the school district, the principal or designee, and the student's parent or person standing in parental relation;
 - (ii) the student's admission, review, and dismissal (ARD) committee if the student receives special education services under the TEC, Chapter 29, Subchapter A; or
 - (iii) the committee established for the student under Section 504, Rehabilitation Act of 1973 (29 United States Code, Section 794) if the student does not receive special education services under the TEC, Chapter 29, Subchapter A, but is covered by the Rehabilitation Act of 1973.
- (E) A student, who due to a disability, is unable to complete two credits in the same language in a language other than English, may substitute a combination of two credits that are not being used to satisfy another specific graduation requirement selected from English language arts, mathematics, science, or social studies or two credits in career and technical education or technology applications for the LOTE credit requirements. The determination regarding a student's ability to complete the LOTE credit requirements will be made by:
 - (i) the student's ARD committee if the student receives special education services under the TEC, Chapter 29, Subchapter A; or
 - (ii) the committee established for the student under Section 504, Rehabilitation Act of 1973 (29 United States Code, Section 794) if the student does not receive special education services under the TEC, Chapter 29, Subchapter A, but is covered by the Rehabilitation Act of 1973.
- (F) A student who successfully completes a dual language immersion/two-way or dual language immersion/one-way program in accordance with §89.1210(d)(3) and (4) of this title (relating to Program Content and Design), §89.1227 of this title (relating to Minimum Requirements for Dual Language Immersion Program Model), and §89.1228 of this title (relating to Two-Way Dual Language Immersion Program Model Implementation) at an elementary school may satisfy one credit of the two credits required in a language other than English.

- (i) To successfully complete a dual language immersion program, a student must:
 - (I) have participated in a dual language immersion program for at least five consecutive school years;
 - (II) achieve high levels of academic competence as demonstrated by performance of meets or masters grade level on both the mathematics and reading State of Texas Assessments of Academic Readiness (STAAR®) in English or Spanish, as applicable, in at least one grade level; and
 - (III) achieve proficiency in both English and a language other than English as demonstrated by scores of proficient or higher in the reading and speaking domains on language proficiency or achievement tests in both languages.
- (ii) The second credit of a language other than English must be in the same language as the successfully completed dual language immersion program.

(G) A student who successfully completes a course in American Sign Language while in elementary school may satisfy one credit of the two credits required in a language other than English.

(6)-(7) (No change.)

(c)-(d) (No change.)

§74.13. Endorsements.

(a)-(c) (No change.)

(d) A school district may define advanced courses and determine a coherent sequence of courses for an endorsement area, provided that prerequisites in Chapters 110-117, ~~[126,]~~ 127, and 130 of this title are followed.

(e) (No change.)

(f) A student may earn any of the following endorsements.

(1) Science, technology, engineering, and mathematics (STEM). A student may earn a STEM endorsement by completing the requirements specified in subsection (e) of this section, including Algebra II, chemistry, and physics or Principles of Technology and:

(A) a coherent sequence of courses for four or more credits in career and technical education (CTE) that consists of at least two courses in the same career cluster and at least one advanced CTE course. The courses may be selected from Chapter 130 of this title (relating to Texas Essential Knowledge and Skills for Career and Technical Education), Chapter 127 of this title (relating to Texas Essential Knowledge and Skills for Career Development), or CTE innovative courses approved by the commissioner of education. The final course in the sequence must be selected from Chapter 130, Subchapter O, of this title (relating to Science, Technology, Engineering, and Mathematics) or Career Preparation I or II and Project-Based Research in Chapter 127, Subchapter B, of this title (relating to High School), if the course addresses a STEM-related field; or

(B) courses required to complete a TEA-designated program of study related to STEM; or

~~[(B) a coherent sequence of four credits in computer science selected from the following:]~~

~~[(i) Fundamentals of Computer Science; or]~~

~~[(ii) Computer Science I; or]~~

~~[(iii) Computer Science II; or]~~

~~[(iv) Computer Science III; or]~~

- ~~[(v) — Digital Forensics; or]~~
- ~~[(vi) — Discrete Mathematics for Computer Science; or]~~
- ~~[(vii) — Game Programming and Design; or]~~
- ~~[(viii) — Mobile Application Development; or]~~
- ~~[(ix) — Robotics Programming and Design; or]~~
- ~~[(x) — Independent Studies in Technology Applications; or]~~
- ~~[(xi) — AP Computer Science A; or]~~
- ~~[(xii) — AP Computer Science Principles; or]~~
- ~~[(xiii) — IB Computer Science, Standard Level; or]~~
- ~~[(xiv) — IB Computer Science, Higher Level; or]~~

- (C) three credits in mathematics by successfully completing Algebra II and two additional mathematics courses for which Algebra II is a prerequisite by selecting courses from subsection (e)(2) of this section; or
- (D) four credits in science by successfully completing chemistry, physics, and two additional science courses by selecting courses from subsection (e)(6) of this section; or
- ~~[(E) — a coherent sequence of four courses in cybersecurity to consist of Foundations of Cybersecurity and Cybersecurity Capstone and two additional courses to be selected from the following:]~~

- ~~[(i) — AP Computer Science A; or]~~
- ~~[(ii) — Computer Science I; or]~~
- ~~[(iii) — AP Computer Science Principles; or]~~
- ~~[(iv) — Digital Forensics; or]~~
- ~~[(v) — Computer Maintenance; or]~~
- ~~[(vi) — Internetworking Technologies I; or]~~
- ~~[(vii) — Internetworking Technologies II; or]~~
- ~~[(viii) — Networking; or]~~

~~(E)~~ [(F)] in addition to Algebra II, chemistry, and physics, a coherent sequence of three additional credits from no more than two of the categories or disciplines represented by subparagraphs (A), (B), (C), and (D) of this paragraph.

(2) Business and industry. A student may earn a business and industry endorsement by completing the requirements specified in subsection (e) of this section and:

- (A) a coherent sequence of courses for four or more credits in CTE that consists of at least two courses in the same career cluster and at least one advanced CTE course. The courses may be selected from Chapter 130 of this title, Chapter 127 of this title, or CTE innovative courses approved by the commissioner. The final course in the sequence must be selected from one of the following:
 - (i) Chapter 130, Subchapter A, of this title (relating to Agriculture, Food, and Natural Resources); or
 - (ii) Chapter 130, Subchapter B, of this title (relating to Architecture and Construction); or
 - (iii) Chapter 130, Subchapter C, of this title (relating to Arts, Audio/Video Technology, and Communications); or

- (iv) Chapter 130, Subchapter D, of this title (relating to Business Management and Administration); or
- (v) Chapter 130, Subchapter F, of this title (relating to Finance); or
- (vi) Chapter 130, Subchapter I, of this title (relating to Hospitality and Tourism); or
- (vii) Chapter 130, Subchapter K, of this title (relating to Information Technology); or
- (viii) Chapter 130, Subchapter M, of this title (relating to Manufacturing); or
- (ix) Chapter 130, Subchapter N, of this title (relating to Marketing); or
- (x) Chapter 130, Subchapter P, of this title (relating to Transportation, Distribution, and Logistics); or
- ~~(xi) Chapter 130, Subchapter Q, of this title (relating to Energy); or~~
- ~~(xii) ~~(xi)~~ Career Preparation I or II and Project-Based Research in Chapter 127, Subchapter B, of this title if the course addresses a career from a field listed in clauses ~~(i)-(xi)~~ ~~(i)-(x)~~ of this subparagraph; or~~

~~(B) courses required to complete a TEA-designated program of study related to business and industry; or~~

~~(C) ~~(B)~~ four English credits by selecting courses from Chapter 110 of this title to include three levels in one of the following areas:~~

- (i) public speaking; or
- (ii) debate; or
- (iii) advanced broadcast journalism; or
- (iv) advanced journalism: newspaper; or
- (v) advanced journalism: yearbook; or
- (vi) advanced journalism: literary magazine; or

~~[(C) four technology applications credits by selecting from the following:]~~

- ~~[(i) Digital Design and Media Production; or]~~
- ~~[(ii) Digital Art and Animation; or]~~
- ~~[(iii) 3-D Modeling and Animation; or]~~
- ~~[(iv) Digital Communications in the 21st Century; or]~~
- ~~[(v) Digital Video and Audio Design; or]~~
- ~~[(vi) Web Communications; or]~~
- ~~[(vii) Web Design; or]~~
- ~~[(viii) Web Game Development; or]~~
- ~~[(ix) Independent Study in Evolving/Emerging Technologies; or]~~

(D) a coherent sequence of four credits from subparagraph (A), (B), or (C) of this paragraph.

(3) Public services. A student may earn a public services endorsement by completing the requirements specified in subsection (e) of this section and:

(A) a coherent sequence of courses for four or more credits in CTE that consists of at least two courses in the same career cluster and at least one advanced CTE course. The courses may be selected from Chapter 130 of this title, Chapter 127 of this title, or CTE innovative courses approved by the commissioner. The final course in the sequence must be selected from one of the following:

- (i) Chapter 130, Subchapter E, of this title (relating to Education and Training); or
- (ii) Chapter 130, Subchapter G, of this title (relating to Government and Public Administration); or
- (iii) Chapter 130, Subchapter H, of this title (relating to Health Science); or
- (iv) Chapter 130, Subchapter J, of this title (relating to Human Services); or
- (v) Chapter 130, Subchapter L, of this title (relating to Law, Public Safety, Corrections, and Security); or
- (vi) Career Preparation I or II and Project-Based Research in Chapter 127, Subchapter B, of this title if the course addresses a field from a cluster listed in clauses (i)-(v) of this subparagraph; or

(B) courses required to complete a TEA-designated program of study related to public services; or

(C) [~~(B)~~]four courses in Junior Reserve Officer Training Corps (JROTC).

- (4) Arts and humanities. A student may earn an arts and humanities endorsement by completing the requirements specified in subsection (e) of this section and:
- (A) five social studies credits by selecting courses from Chapter 113 of this title; or
 - (B) four levels of the same language in a language other than English by selecting courses in accordance with Chapter 114 of this title, which may include Advanced Language for Career Applications; or
 - (C) two levels of the same language in a language other than English and two levels of a different language in a language other than English by selecting courses in accordance with Chapter 114 of this title; or
 - (D) four levels of American sign language by selecting courses in accordance with Chapter 114 of this title; or
 - (E) a coherent sequence of four credits by selecting courses from one or two categories or disciplines in fine arts from Chapter 117 of this title or innovative courses approved by the commissioner; or
 - (F) four English credits by selecting from the following:
 - (i) English IV; or
 - (ii) Independent Study in English; or
 - (iii) Literary Genres; or
 - (iv) Creative Writing; or
 - (v) Research and Technical Writing; or
 - (vi) Humanities; or
 - (vii) Communication Applications; or
 - (viii) AP English Literature and Composition; or
 - (ix) AP English Language and Composition; or
 - (x) IB Language Studies A: Language and Literature Standard Level; or
 - (xi) IB Language Studies A: Language and Literature Higher Level; or
 - (xii) IB Language Studies A: Literature Standard Level; or
 - (xiii) IB Language Studies A: Literature Higher Level; or

(xiv) IB Literature and Performance Standard Level.

- (5) Multidisciplinary studies. A student may earn a multidisciplinary studies endorsement by completing the requirements specified in subsection (e) of this section and:
- (A) four advanced courses that prepare a student to enter the workforce successfully or postsecondary education without remediation from within one endorsement area or among endorsement areas that are not in a coherent sequence; or
 - (B) four credits in each of the four foundation subject areas to include chemistry and/or physics and English IV or a comparable AP or IB English course; or
 - (C) four credits in Advanced Placement, International Baccalaureate, or dual credit selected from English, mathematics, science, social studies, economics, languages other than English, or fine arts.

(g) (No change.)

Proposed Revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education
(Second Reading and Final Adoption)

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION
STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC) Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy. The proposed revisions would update the Texas Essential Knowledge and Skills (TEKS) to align with recent legislation requiring the board to consolidate high school technology applications TEKS into the career and technical education (CTE) TEKS and eliminate TEKS for duplicative courses. The proposed revisions would also update the TEKS for CTE to add a new career cluster in energy to align with revised programs of study. No changes are recommended since approved for first reading.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(4); 28.002(a) and (c); and 28.025(a).

TEC, §7.102(c)(4), requires the State Board of Education (SBOE) to establish curriculum and graduation requirements.

TEC, §28.002(a), identifies the subjects of the required curriculum.

TEC, §28.002(c), requires the SBOE to by rule identify the essential knowledge and skills of each subject in the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials and addressed on the state assessment instruments.

TEC, §28.025(a), requires the SBOE to by rule determine the curriculum requirements for the foundation high school graduation program that are consistent with the required curriculum under the TEC, §28.002.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed revisions is August 1, 2020. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2020-2021 school year. The earlier effective date will allow districts of innovation that begin school prior to the statutorily required start date to implement the proposed rulemaking when they begin their school year.

PREVIOUS BOARD ACTION: The SBOE adopted the TEKS for CTE, including career development, effective September 1, 1998. The CTE TEKS were last amended to be effective August 28, 2017.

A discussion item regarding proposed revisions to 19 TAC Chapter 126 and Chapter 130 was presented to the Committee of the Full Board at the November 2019 SBOE meeting. At the time, committee members asked staff to prepare rule text to reflect the addition of TEKS for a new Energy career cluster and consolidation of high school technology applications and CTE courses. At the January 2020 meeting, the board approved proposed revisions to 19 TAC Chapter 126 and Chapter 130 for first reading and filing authorization.

BACKGROUND INFORMATION AND JUSTIFICATION: The 86th Texas Legislature, 2019, passed House Bill 963, which required the SBOE, not later than March 1, 2020, to conduct a review of the TEKS for CTE and technology applications courses for Grades 9-12 and amend the board's rules to consolidate courses and eliminate duplicative courses. The SBOE is only required to implement this provision if the legislature appropriated money specifically for that purpose. If the legislature did not appropriate money specifically for that purpose, the SBOE may, but is not required to, implement a requirement using other appropriations available for that purpose. The legislature did not appropriate money specifically for the purpose of implementing this requirement.

Texas is redesigning state-level programs of study to include coherent and rigorous content with challenging academic standards and relevant career and technical content. Programs of study will be aligned with state and regional labor market information, including high-wage, high-skill, and in-demand occupations. As a part of the program of study revision process, Texas conducted a statewide labor market analysis that discovered several instances where occupations and postsecondary training overlap. As part of this process, it was recommended that a new career cluster in energy be added to address programs of study in the energy industry.

The attachment to this item reflects the text of proposed revisions to 19 TAC Chapter 130 for consideration by the SBOE for second reading and final adoption. The text of 19 TAC §§126.31-126.52 and 126.61-126.67 proposed for repeal can be found on the TEA website at <http://ritter.tea.state.tx.us/rules/tac/chapter126/index.html>.

In Chapter 126, all but two of the courses in Subchapters C and D would be repealed and proposed as new courses in Chapter 130. Section 126.40 and §126.45, relating to robotics programming and digital video and audio design, are duplicative of other courses in Chapter 130 and would not be re-proposed as new courses in Chapter 130.

In Chapter 130, the repealed courses from Chapter 126 would be proposed as new courses in Subchapters C, K, and O. Subchapter K would also include the repeal of duplicative courses in web technologies and computer programming. New Subchapter Q would include two courses currently contained in Subchapter A as well as five new courses.

No changes are recommended since approved for first reading.

FISCAL IMPACT: No changes have been made to this section since published as proposed.

The TEA has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed.

The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed.

The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed.

The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed.

The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed.

TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed rulemaking would create new regulations and repeal existing regulations. The proposed revisions would consolidate high school technology applications TEKS into the CTE TEKS and eliminate TEKS for duplicative courses. The proposed revisions would also update the TEKS for CTE to add a new career cluster in energy to align with revised programs of study.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not expand or limit an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: No changes have been made to this section since published as proposed.

The proposal would consolidate high school technology applications TEKS into the CTE TEKS and eliminate TEKS for duplicative courses. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed.

The proposal would have no new data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed.

The TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: Following the January 2020 SBOE meeting, notice of the proposed revisions to 19 TAC Chapter 126 and Chapter 130 was filed with the Texas Register, initiating the public comment period. The public comment period on the proposal began March 6, 2020, and ended April 10, 2020. No comments had been received at the time this item was prepared. A summary of any public comments received regarding the proposal will be provided to the SBOE prior to and during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposal at the appropriate committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for second reading and final adoption the proposed revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy; and

Make an affirmative finding that immediate adoption of the proposed revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy, is necessary and shall have an effective date of August 1, 2020. *(Per TEC, §7.102(f), a vote of two-thirds of the members of the board is necessary for an earlier effective date.)*

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services
Shelly Ramos, Senior Director, Curriculum Standards and Student Support

Attachment: Text of Proposed Revisions to 19 TAC Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy

ATTACHMENT
Text of Proposed Revisions to 19 TAC

Chapter 130. Texas Essential Knowledge and Skills for Career and Technical Education

Subchapter A. Agriculture, Food, and Natural Resources

§130.13. Oil and Gas Production I (One Credit), Adopted 2015.

- ~~(a) General requirements. This course is recommended for students in Grades 9-12. Students shall be awarded one credit for successful completion of this course.~~
- ~~(b) Introduction.~~
- ~~(1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~
- ~~(2) The Agriculture, Food, and Natural Resources Career Cluster focuses on the production, processing, marketing, distribution, financing, and development of agricultural commodities and resources, including food, fiber, wood products, natural resources, horticulture, and other plant and animal products/resources.~~
- ~~(3) In Oil and Gas Production I, students will identify specific career opportunities and skills, abilities, tools, certification, and safety measures associated with each career. Students will also understand components, systems, equipment, and production and safety regulations associated with oil and gas wells. To prepare for careers in oil and gas production, students must attain academic skills and knowledge, acquire technical knowledge and skills related to oil and gas production and the workplace, and develop knowledge and skills regarding career opportunities, entry requirements, and industry expectations. To prepare for success, students need opportunities to learn, reinforce, apply, and transfer their knowledge and skills and technologies in a variety of settings.~~
- ~~(4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~
- ~~(5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~
- ~~(c) Knowledge and skills.~~
- ~~(1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:~~
- ~~(A) identify career development, education, and entrepreneurship opportunities in the oil and gas production field;~~
- ~~(B) apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation;~~
- ~~(C) demonstrate knowledge of personal and occupational safety, environmental regulations, and first aid policy in the workplace;~~
- ~~(D) analyze employers' expectations such as appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills; and~~
- ~~(E) demonstrate leadership skills to accomplish organizational goals and objectives.~~
- ~~(2) The student develops a supervised agriculture experience program. The student is expected to:~~
- ~~(A) plan, propose, conduct, document, and evaluate a supervised agriculture experience program as an experiential learning activity;~~
- ~~(B) apply proper record keeping skills as they relate to the supervised agriculture experience;~~

- ~~(C) — participate in youth leadership opportunities to create a well-rounded experience program; and~~
- ~~(D) — produce and participate in a local program of activities using a strategic planning process.~~
- ~~(3) — The student understands the history and process for drilling a well. The student is expected to:~~
 - ~~(A) — describe the history of drilling for petroleum in the United States and abroad;~~
 - ~~(B) — describe and appraise routine drilling operations, offshore drilling, and new drilling technologies;~~
 - ~~(C) — describe the tools and techniques for directional drilling;~~
 - ~~(D) — examine the differences between fishing, retrieving, and repairing pipe;~~
 - ~~(E) — describe the methods for completing a well in order for production to begin;~~
 - ~~(F) — assess fluid pressure;~~
 - ~~(G) — determine how the flow is initiated in a new well;~~
 - ~~(H) — differentiate between major components of a well and discuss the purpose, design, and operation of each component;~~
 - ~~(I) — describe activities associated with completing a well;~~
 - ~~(J) — describe the well completion processes and equipment;~~
 - ~~(K) — summarize the instruments and techniques used when logging and testing during the drilling and completion of a well;~~
 - ~~(L) — list the factors that are analyzed when studying a poorly producing well; and~~
 - ~~(M) — identify the responsibilities, characteristics, abilities, and work behaviors of personnel that are involved in well service.~~
- ~~(4) — The student discusses and identifies components, systems, equipment, production, and safety regulations associated with oil and gas wells. The student is expected to:~~
 - ~~(A) — identify the major systems and equipment used in the production of oil and gas;~~
 - ~~(B) — identify and describe the wellhead equipment that controls fluid flow;~~
 - ~~(C) — trace the process flow through the oil and gas production systems and equipment;~~
 - ~~(D) — discuss the purpose of the wellhead and identify the major components;~~
 - ~~(E) — describe the purpose, design, and operation of each wellhead component;~~
 - ~~(F) — compare and contrast the major differences in wellhead construction;~~
 - ~~(G) — compare and contrast onshore and offshore facilities;~~
 - ~~(H) — compare and contrast oil and gas regions within the United States;~~
 - ~~(I) — describe the safety, health, and environmental concerns associated with working around a wellhead;~~
 - ~~(J) — explain how the wellhead system affects other production systems tied to the wellhead;~~
 - ~~(K) — describe the activities associated with monitoring and regulating well flow;~~
 - ~~(L) — describe the wellhead maintenance activities performed by the production technician;~~
 - ~~(M) — operate and troubleshoot a wellhead using a computer simulator, pilot plant, or tabletop unit; and~~
 - ~~(N) — identify the operating conditions that would warrant a manual or automatic shut-in of a well and steps involved in a manual shut-in of a well.~~

~~(5) — The student discusses safety issues related to the oil and gas industry. The student is expected to:~~

~~(A) — describe the safety, health, and environmental concerns associated with drilling, production, and maintenance; and~~

~~(B) — research safety standards in the petroleum industry such as the Bureau of Safety and Environmental Enforcement (BSEE), United States Coast Guard (USCG), American Petroleum Institute (API), Department of Transportation (DOT), Occupational Safety and Health Administration (OSHA), Environmental Protection Agency (EPA), American Society for Testing and Materials (ASTM), American National Standards Institute (ANSI), and others.]~~

§130.14. Oil and Gas Production II (One Credit), Adopted 2015.

~~(a) — General requirements. This course is recommended for students in Grades 10-12. Prerequisite: Oil and Gas Production I. Students shall be awarded one credit for successful completion of this course.~~

~~(b) — Introduction:~~

~~(1) — Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~

~~(2) — The Agriculture, Food, and Natural Resources Career Cluster focuses on the production, processing, marketing, distribution, financing, and development of agricultural commodities and resources, including food, fiber, wood products, natural resources, horticulture, and other plant and animal products/resources.~~

~~(3) — In Oil and Gas Production II, students will gain knowledge of the specific requirements for entry into post secondary education and employment in the petroleum industry; research and discuss petroleum economies; research and discuss the modes of transportation in the petroleum industry; research and discuss environmental, health, and safety concerns; research and discuss different energy sources; and prepare for industry certification. To prepare for careers in oil and gas production, students must attain academic skills and knowledge, acquire technical knowledge and skills related to oil and gas production and the workplace, and develop knowledge and skills regarding career opportunities, entry requirements, and industry expectations. To prepare for success, students need opportunities to learn, reinforce, apply, and transfer their knowledge and skills and technologies in a variety of settings.~~

~~(4) — Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~

~~(5) — Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~

~~(c) — Knowledge and skills:~~

~~(1) — The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:~~

~~(A) — identify career development, education, and entrepreneurship opportunities in the field of agriculture, food, and natural resources;~~

~~(B) — identify careers in agriculture, food, and natural resources with required aptitudes in science, technology, engineering, mathematics, language arts, and/or social studies;~~

~~(C) — apply technology skills to create an electronic portfolio of skills and abilities;~~

~~(D) — apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation in agriculture, food, and natural resources;~~

- ~~(E) — demonstrate knowledge of personal and occupational safety, health, environmental regulations, and first-aid policy in the workplace; and~~
- ~~(F) — analyze employers' expectations, including appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills.~~
- ~~(2) — The student develops a supervised agriculture experience program. The student is expected to:~~
 - ~~(A) — plan, propose, conduct, document, and evaluate a supervised agriculture experience program as an experiential learning activity;~~
 - ~~(B) — apply proper record keeping skills as they relate to the supervised agriculture experience;~~
 - ~~(C) — participate in youth leadership opportunities to create a well rounded experience program; and~~
 - ~~(D) — produce and participate in a local program of activities using a strategic planning process.~~
- ~~(3) — The student researches and discusses the modes of transportation and environmental, health, and safety concerns. The student is expected to:~~
 - ~~(A) — describe evolution of transportation in the petroleum industry;~~
 - ~~(B) — research and access the various ground methods of transportation;~~
 - ~~(C) — survey health and safety policies, procedures, regulations, and practices as they relate to transportation in the petroleum industry;~~
 - ~~(D) — research and discuss petroleum economics;~~
 - ~~(E) — compare and contrast marketing, sales, and distribution of petroleum products;~~
 - ~~(F) — identify supply chain businesses that create new supplies of oil and gas;~~
 - ~~(G) — identify supply creation companies and how they operate;~~
 - ~~(H) — discuss the factors in investment decision making; and~~
 - ~~(I) — calculate rates of return to evaluate prospects.~~
- ~~(4) — The student researches the different methods of disposing of oil and gas waste and methods of cleanup. The student is expected to:~~
 - ~~(A) — discuss the disposal methods of exploration and production wastes;~~
 - ~~(B) — identify cleanup methods for blowouts and spills; and~~
 - ~~(C) — identify refining processes that minimize environmental impact.~~
- ~~(5) — The student researches and identifies the different energy sources and priorities for the oil and gas industry. The student is expected to:~~
 - ~~(A) — research the petroleum industry to identify renewable energy sources;~~
 - ~~(B) — present the challenges and priorities of the petroleum industry;~~
 - ~~(C) — research the critical technologies needed in the future; and~~
 - ~~(D) — research the nontechnical solutions to energy needs.]~~

Subchapter C. Arts, Audio/Video Technology, and Communications

§130.123. Digital Design and Media Production (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Arts, Audio/Video Technology, and Communications Career Cluster focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.
 - (3) Digital Design and Media Production will allow students to demonstrate creative thinking, develop innovative strategies, and use communication tools in order to work effectively with others as well as independently. Students will gather information electronically, which will allow for problem solving and making informed decisions regarding media projects. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will demonstrate a thorough understanding of digital design principles that is transferable to other disciplines. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student employs a creative design process to create original projects as they relate to purposes and audiences. The student is expected to:
 - (A) create designs for defined projects such as graphics, logos, and page layouts;
 - (B) apply design elements and typography standards; and
 - (C) use visual composition principles.
 - (2) Communication and collaboration. The student understands professional digital media communications strategies. The student is expected to:
 - (A) adapt the language and design of a project for audience, purpose, situation, and intent;
 - (B) organize oral, written, and graphic information into formal and informal publications;
 - (C) interpret and communicate information to multiple audiences; and
 - (D) collaborate to create original projects, including seeking and responding to advice from others such as peers or experts in the creation and evaluation process.
 - (3) Research and information fluency. The student uses a variety of strategies to plan, obtain, evaluate, and use valid information. The student is expected to:
 - (A) obtain print and digital information such as graphics, audio, and video from a variety of resources while citing the sources;
 - (B) evaluate information for accuracy and validity; and
 - (C) present accurate information using techniques appropriate for the intended audience.

- (4) Critical thinking, problem solving, and decision making. The student implements problem-solving methods using critical-thinking skills to plan, implement, manage, and evaluate projects; solve problems; and make informed decisions using appropriate digital tools and resources. The student is expected to:
- (A) employ critical-thinking and interpersonal skills to solve problems and make decisions through planning and gathering, interpreting, and evaluating data;
 - (B) identify and organize the tasks for completion of a project using the most appropriate digital tools;
 - (C) distinguish design requirements as they relate to the purposes and audiences of a project and apply appropriate design elements;
 - (D) seek and respond to input from others, including peers, teachers, and outside collaborators;
 - (E) evaluate a process and project both independently and collaboratively and make suggested revisions; and
 - (F) transfer critical-thinking, problem-solving, and decision-making processes when using new technologies.
- (5) Digital citizenship. The student complies with standard practices and behaviors and upholds legal and ethical responsibilities. The student is expected to:
- (A) examine copyright and fair use guidelines with regard to print and digital media;
 - (B) model ethical and legal acquisition and use of digital resources such as licensing and established methods of citing sources;
 - (C) demonstrate proper digital etiquette, personal security guidelines, use of network resources, and application of the district's acceptable use policy for technology; and
 - (D) identify and demonstrate positive personal qualities such as flexibility, open-mindedness, initiative, listening attentively to speakers, willingness to learn new knowledge and skills, and pride in quality work.
- (6) Technology operations and concepts. The student uses technology concepts, systems, and operations as appropriate for a project. The student is expected to:
- (A) define the purpose of a product and identify the specified audience;
 - (B) demonstrate appropriate project management to:
 - (i) create a plan for a media project such as a storyboard, stage development, and identification of equipment and resources; and
 - (ii) evaluate design, content delivery, purpose, and audience throughout a project's timeline and make suggested revisions until completion of the project;
 - (C) use hardware, software, and information appropriate to a project and its audience to:
 - (i) acquire readily available digital information, including text, audio, video, and graphics, citing the sources;
 - (ii) create digital content through the use of various devices such as video camera, digital camera, scanner, microphone, interactive whiteboard, video capture, and musical instrument;
 - (iii) collaborate via online tools such as blogs, discussion boards, email, and online learning communities;
 - (iv) make decisions regarding the selection and use of software, taking into consideration operating system platform, quality, appropriateness, effectiveness, and efficiency;

- (v) delineate and make necessary adjustments regarding compatibility issues, including digital file formats and cross-platform connectivity; and
 - (vi) demonstrate the ability to import and export elements from one program to another;
- (D) use digital typography standards such as:
 - (i) one space after punctuation, the use of em- and en-dashes, and smart quotation marks;
 - (ii) categories of type, font, size, style, and alignment appropriate for the task;
 - (iii) type techniques such as drop cap, decorative letters, or embedded text frames as graphic elements;
 - (iv) leading and kerning, automatic text flow into linked columns, widows and orphans, and text wrap; and
 - (v) type measurement for inches and picas;
- (E) apply design and layout principles and techniques to:
 - (i) incorporate the principles of design, including balance, contrast, dominant element, white space, consistency, repetition, alignment, and proximity;
 - (ii) apply the elements of design, including text, graphics, and white space;
 - (iii) apply color principles appropriate to the product in order to communicate the mood for the specific audience;
 - (iv) identify the parts of pages, including inside margin, outside margin, and gutter;
 - (v) create a master template, including page specifications and other repetitive elements; and
 - (vi) use style sheets, including a variety of type specifications such as typeface, style, size, alignment, indents, and tabs;
- (F) demonstrate appropriate use of digital photography and editing to:
 - (i) use digital photography equipment to capture still-shot images that incorporate various photo composition techniques, including lighting, perspective, candid versus posed, rule of thirds, and filling the frame;
 - (ii) transfer digital images from equipment to the computer; and
 - (iii) demonstrate image enhancement techniques such as feathering, layering, color enhancement, and image selection using appropriate digital manipulation software;
- (G) demonstrate appropriate use of videography equipment and techniques to:
 - (i) use digital photography equipment to capture video that incorporates video principles such as lighting, zooming, panning, and stabilization;
 - (ii) transfer video from equipment to the computer;
 - (iii) demonstrate videographic enhancement and editing techniques such as transitions, zooming, content editing, and synchronizing audio and video using appropriate digital manipulation software; and
 - (iv) export video in digital formats to be used in various delivery systems such as podcasting, downloadable media, embedding, and streaming; and
- (H) deploy digital media into print, web, and video products to:

- (i) produce digital files in various formats such as portable document format (PDF), portable network graphics (PNG), and HyperText Markup Language (HTML);
- (ii) publish integrated digital content such as video, audio, text, graphics, and motion graphics following appropriate digital etiquette standards;
- (iii) publish and share projects using online methods such as social media and collaborative sites;
- (iv) incorporate various digital media into a printed document such as a newsletter, poster, or report;
- (v) use printing options such as tiling, color separations, and collation; and
- (vi) collect and organize student-created products to build an individual portfolio.

§130.124. Digital Art and Animation (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: Art, Level I. This course is recommended for students in Grades 9-12. This course satisfies the high school fine arts graduation requirement.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Arts, Audio/Video Technology, and Communications Career Cluster focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.
 - (3) Digital Art and Animation consists of computer images and animations created with digital imaging software. Digital Art and Animation has applications in many careers, including graphic design, advertising, web design, animation, corporate communications, illustration, character development, script writing, storyboarding, directing, producing, inking, project management, editing, and the magazine, television, film, and game industries. Students in this course will produce various real-world projects and animations. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
 - (A) evaluate, edit, and create scripts for animations;
 - (B) identify and apply color theories, including harmony rules, tints, shades, gradients, color mixing, new color creation, and the visual impacts of specific color combinations using a digital format;
 - (C) compare, contrast, and integrate the basic sound editing principles, including mixing and manipulating wave forms, audio tracks, and effects;
 - (D) compare and contrast the rules of composition such as the rule of thirds or the golden section/rectangle with respect to harmony and balance;

- (E) evaluate the fundamental concepts of a digital art and design such as composition, perspective, angles, lighting, repetition, proximity, white space, balance, and contrast;
 - (F) analyze digital art designs to interpret the point of interest, the prominence of the subject, and visual parallels between the structures of natural and human-made environments;
 - (G) distinguish among typefaces while recognizing and resolving conflicts that occur through the use of typography as a design element;
 - (H) use perspective, including backgrounds, light, shades and shadows, hue and saturation, and scale, to capture a focal point and create depth;
 - (I) use the basic principles of design such as proportion, balance, variety, emphasis, harmony, symmetry, and unity in type, color, size, line thickness, shape, and space;
 - (J) edit files using appropriate digital editing tools and established design principles such as consistency, repetition, alignment, proximity, white space, image file size, color use, and font size, type, and style; and
 - (K) identify pictorial qualities in a design such as shape and form, space and depth, or pattern and texture to create visual unity and desired effects in designs.
- (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:
- (A) use vocabulary as it relates to digital art, audio, and animation;
 - (B) demonstrate the use of technology to participate in self-directed and collaborative activities within the global community;
 - (C) participate in electronic communities;
 - (D) create technology specifications for tasks and rubrics for the evaluation of products;
 - (E) design and implement procedures to track trends, set timelines, and evaluate products;
 - (F) collaborate with peers in delineating technological tasks;
 - (G) publish and save information in a variety of ways, including print or digital formats;
 - (H) analyze and evaluate projects for design, content delivery, purpose, and audience; and
 - (I) critique original digital artwork, portfolios, and products with peers.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) distinguish between and correctly apply process color (RGB and CYMK), spot color, and black or white;
 - (B) research the history of digital art and animation;
 - (C) research career choices in digital art and animation;
 - (D) use the Internet to retrieve information in an electronic format;
 - (E) demonstrate the appropriate use of digital imaging, video integration, and sound retrieved from an electronic format;
 - (F) import sounds from a variety of sources; and
 - (G) create planning designs such as rough sketches, storyboards, and brainstorming materials.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:

- (A) distinguish between and use the components of animation software programs such as cast, score, stage, and the animation manipulation interface;
 - (B) distinguish between and use different animation techniques such as path and cell animation, onion skinning, and tweening;
 - (C) create three-dimensional effects by layering images such as foreground, middle distance, and background images;
 - (D) apply a variety of color schemes such as monochromatic, analogous, complementary, primary/secondary triads, cool/warm colors, and split complements to digital designs;
 - (E) use the basic concepts of color and design theory such as working in a bitmapped and vector mode to create backgrounds, characters, and other cast members as needed for the animation;
 - (F) use the appropriate scripting language or program code to create an animation;
 - (G) use a variety of lighting techniques such as shadows and shading to create effects; and
 - (H) define the design attributes and requirements of products created for a variety of purposes such as posters, billboards, logos, corporate identity, advertisements, book jackets, brochures, and magazines.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) discuss copyright laws/issues and use of digital information such as attributing ideas and citing sources using established methods;
 - (B) define plagiarism and model respect of intellectual property;
 - (C) demonstrate proper digital etiquette and knowledge of acceptable use policies when using technology; and
 - (D) evaluate the validity and reliability of sources.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
- (A) demonstrate knowledge and appropriate use of operating systems, software applications, and communication and networking components;
 - (B) make decisions regarding the selection and use of software and Internet resources;
 - (C) make necessary adjustments regarding compatibility issues with digital file formats, importing and exporting data, and cross-platform compatibility; and
 - (D) read, use, and develop technical documentation.

§130.125. 3-D Modeling and Animation (One Credit)

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: Art, Level I. This course is recommended for students in Grades 9-12. This course satisfies the high school fine arts graduation requirement.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Arts, Audio/Video Technology, and Communications Career Cluster focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.

- (3) 3-D Modeling and Animation consists of computer images created in a virtual three-dimensional (3-D) environment. 3-D Modeling and Animation has applications in many careers, including criminal justice, crime scene, and legal applications; construction and architecture; engineering and design; and the movie and game industries. Students in this course will produce various 3-D models of real-world objects. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
- (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
- (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
- (A) evaluate, edit, and create scripts for animations;
 - (B) identify and apply color theories, including harmony rules, tints, shades, gradients, color mixing, new color creation, and the visual impacts of specific color combinations using a digital format;
 - (C) apply texture, transparency, skinning, and contour along a 3-D object surface;
 - (D) compare, contrast, and integrate the basic sound editing principles, including mixing and manipulating wave forms, audio tracks, and effects;
 - (E) compare and contrast the rules of composition such as the rule of thirds or the golden section/rectangle with respect to harmony and balance;
 - (F) evaluate the fundamental concepts of 3-D modeling and design such as composition, perspective, angles, lighting, repetition, proximity, white space, balance, and contrast;
 - (G) analyze 3-D model objects to interpret the point of interest, the prominence of the subject, and visual parallels between the structures of natural and human-made environments;
 - (H) distinguish among typefaces while recognizing and resolving conflicts that occur through the use of typography as a design element;
 - (I) use perspective, including spot and directional light, backgrounds, ambience, shades and shadows, and hue and saturation;
 - (J) use the basic principles of design such as proportion, balance, variety, emphasis, harmony, symmetry, and unity in type, color, size, line thickness, shape, and space;
 - (K) edit files using appropriate digital editing tools and established design principles such as consistency, repetition, alignment, proximity, white space, image file size, color use, font size, type, and style; and
 - (L) identify pictorial qualities in a design such as shape and form, space and depth, or pattern and texture to create visual unity and desired effects in designs.
- (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:
- (A) use vocabulary as it relates to digital art, audio, and animation;
 - (B) demonstrate the use of technology to participate in self-directed and collaborative activities within the global community;
 - (C) participate in electronic communities;

- (D) create technology specifications for tasks and rubrics for the evaluation of products;
 - (E) design and implement procedures to track trends, set timelines, and evaluate products;
 - (F) collaborate with peers in delineating technological tasks;
 - (G) publish and save information in a variety of ways, including print or digital formats;
 - (H) analyze and evaluate projects for design, content delivery, purpose, and audience; and
 - (I) critique original 3-D digital artwork, portfolios, and products with peers.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) distinguish among and correctly apply process color (RGB and CYMK), spot color, and black or white;
 - (B) research the history of 3-D modeling and 3-D animation;
 - (C) research career choices in 3-D modeling and 3-D animation;
 - (D) use the Internet to retrieve information in an electronic format;
 - (E) demonstrate the appropriate use of 3-D objects, digital imaging, video integration, and sound retrieved from an electronic format;
 - (F) import sounds from a variety of sources; and
 - (G) create planning designs such as rough sketches, storyboards, and brainstorming materials.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:
- (A) distinguish between and use the components of 3-D animation software programs such as cast, score, environment, the X-Y-Z coordinate system, and the animation manipulation interface;
 - (B) distinguish between and use the different 3-D modeling techniques such as box modeling, transformation, and polygon primitives using extrusion and rotation;
 - (C) distinguish between and use the different 3-D animation techniques such as path and rendering using dynamics and physics;
 - (D) apply a variety of color schemes such as monochromatic, analogous, complementary, primary/secondary triads, cool/warm colors, and split complements to digital designs;
 - (E) use the basic concepts of color and design theory such as working with 3-D models and environments, characters, objects, and other cast members as needed for the animation;
 - (F) use the appropriate rendering techniques to create an animation;
 - (G) use a variety of lighting techniques such as shadow, shading, point, spot, directional, and ambient to create effects; and
 - (H) define the design attributes and requirements of a 3-D animation project.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) discuss copyright laws/issues and use of digital information such as attributing ideas and citing sources using established methods;
 - (B) define plagiarism and model respect of intellectual property;
 - (C) demonstrate proper digital etiquette and knowledge of acceptable use policies when using technology; and

- (D) evaluate the validity and reliability of sources.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
 - (A) demonstrate knowledge and appropriate use of operating systems, software applications, and communication and networking components;
 - (B) make decisions regarding the selection and use of software and Internet resources;
 - (C) make necessary adjustments regarding compatibility issues with digital file formats, importing and exporting data, and cross-platform compatibility; and
 - (D) read, use, and develop technical documentation.

§130.126. Digital Communications in the 21st Century (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Arts, Audio/Video Technology, and Communications Career Cluster focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.
 - (3) Digital Communications in the 21st Century will prepare students for the societal demands of increased civic literacy, independent working environments, global awareness, and the mastery of a base set of analysis and communication skills. Students will be expected to design and present an effective product based on well-researched issues in order to thoughtfully propose suggested solutions to authoritative stakeholders. The outcome of the process and product approach is to provide students an authentic platform to demonstrate effective application of multimedia tools within the contexts of global communication and collaborative communities and appropriately share their voices to affect change that concerns their future. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student demonstrates the ability to analyze, evaluate, and adapt during the creative problem-solving process and demonstrates creative thinking in developing solutions to real-world issues using digital tools. The student is expected to:
 - (A) generate innovative, sustainable solutions for real-world issues such as global warming, immigration, or the global economy using emerging digital tools;
 - (B) gather and evaluate accurate information for feasibility and practicality as a basis for making communication decisions; and
 - (C) analyze the ethical and social responsibilities as a project team when communicating with peers, stakeholders, and experts.

- (2) Creativity and innovation. The student uses innovative thinking to develop new ideas and processes for solving real-world issues and conveying those ideas to a global audience through a persuasive digital product. The student is expected to:
- (A) examine real-world issues relating to current topics such as health care, government, business, or aerospace;
 - (B) develop innovative solutions to address issues;
 - (C) create unique methods and products conveying solutions to audiences beyond the classroom such as school officials, non-profit organizations, higher education officials, government, or other stakeholders;
 - (D) demonstrate the effective use and importance of verbal and nonverbal communication skills when presenting ideas and solutions to diverse audiences; and
 - (E) use appropriate techniques to manage communication apprehension, build self-confidence, and gain command of information.
- (3) Communication and collaboration. The student develops a process to effectively communicate with peers, experts, and other audiences about current issues and solutions to global problems. The student is expected to:
- (A) demonstrate innovative uses of a wide range of emerging technologies, including online learning, mobile devices, digital content, and Web 2.0 tools such as podcasting, wikis, and blogs;
 - (B) participate within appropriate electronic communities as a learner, initiator, and contributor;
 - (C) extend the learning environment beyond the school walls using appropriate digital tools;
 - (D) collaborate with a variety of field experts;
 - (E) prepare for, organize, and participate in an informative or persuasive group discussion with an audience; and
 - (F) participate appropriately in conversations by making clear requests, giving accurate directions, and asking purposeful questions.
- (4) Communication and collaboration. The student uses digital tools to facilitate collaboration and communication in the design, development, and evaluation of products offering solutions to real-world issues. The student is expected to:
- (A) design and organize resources to create an effective collaborative working environment that enables a group to investigate a local, state, national, or global issue;
 - (B) analyze and evaluate effective communication;
 - (C) demonstrate leadership by managing project activities such as timelines, research, product development, marketing material, and effective communication skills;
 - (D) demonstrate effective management of diverse peer-group dynamics such as solving problems, managing conflicts, and building consensus; and
 - (E) evaluate original products for accuracy, validity, and compliance with copyright laws.
- (5) Research and information fluency. The student uses a variety of strategies to acquire and evaluate information relating to real-world issues. The student is expected to:
- (A) locate authoritative information from primary and secondary sources such as field experts, online full-text databases, or current news databases;
 - (B) make decisions regarding the selection, acquisition, and use of information gathered, taking into consideration its quality, appropriateness, effectiveness, and level of interest to society; and

- (C) demonstrate fluency in the use of a variety of electronic sources such as cloud computing, emerging collaboration technologies, data mining strategies, and mobile or other technologies.
- (6) Research and information fluency. The student uses a variety of digital tools to synthesize information related to real-world issues in student-created materials. The student is expected to:
- (A) construct real-world informational materials that inform, persuade, or recommend reform of selected issues;
 - (B) identify and employ a method to evaluate the design, functionality, and accuracy of the student-created materials; and
 - (C) use effective strategies to organize and outline presentations to support and clarify points.
- (7) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to conduct research, manage products, solve problems, and make informed decisions for real-world local, state, national, and global issues. The student is expected to:
- (A) identify and define authentic problems and significant questions for investigation;
 - (B) design and implement procedures to track trends, set timelines, and review and evaluate progress for project completion;
 - (C) read and use technical documentation, including appropriate help options, to complete tasks; and
 - (D) analyze the audience, occasion, and purpose when designing presentations.
- (8) Critical thinking, problem solving, and decision making. The student creates a product presenting solutions for real-world local, state, national, and global issues. The student is expected to:
- (A) create technology specifications for tasks and rubrics to evaluate products and product quality against established criteria;
 - (B) resolve information conflicts and validate information by comparing data;
 - (C) represent diverse perspectives in problem solutions; and
 - (D) prepare and use visual or auditory aids such as scripts, notes, or digital applications to enhance presentations.
- (9) Digital citizenship. The student examines ethical and legal behavior to demonstrate leadership as a digital citizen. The student is expected to:
- (A) model safe and ethical use of digital information;
 - (B) model respect of intellectual property when manipulating, morphing, or editing graphics, video, text, and sound;
 - (C) use technology applications in a positive manner that supports productivity, collaboration, and continuing education; and
 - (D) use professional etiquette and protocol in situations such as making introductions, offering and receiving criticism, and communicating with digital tools.
- (10) Digital citizenship. The student demonstrates ethical and legal behavior in the creation of student products. The student is expected to:
- (A) use collaborative tools and strategies; and
 - (B) use digital tools to correctly document sources such as in bibliographies or works cited.
- (11) Technology operations and concepts. The student makes decisions regarding the selection, acquisition, and use of digital tools in a multimedia classroom/lab, taking into consideration the quality, appropriateness, effectiveness, and efficiency of the tools. The student is expected to:

- (A) determine the most appropriate file type based on universally recognized file formats such as portable document format (PDF), text format (TXT), rich text format (RTF), and Joint Photographic Experts Group format (JPEG);
 - (B) use compression schemes for photo, animation, video, and graphics; and
 - (C) distinguish among appropriate color, sound, and design principles such as consistency, repetition, alignment, proximity, and ratio of text to white space.
- (12) Technology operations and concepts. The student demonstrates knowledge through various cloud and network technologies such as web-based interactive presentations, document sharing, and online scholarly databases. The student is expected to:
- (A) use necessary vocabulary related to digital tools;
 - (B) retrieve and discriminate between authoritative and non-authoritative data sources; and
 - (C) adopt, adapt, and transfer prior knowledge to multiple situations when retrieving, manipulating, and creating original digital projects.

§130.127. Web Game Development (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: Web Design. This course is recommended for students in Grades 11 and 12.
- (b) Introduction.
- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Arts, Audio/Video Technology, and Communications Career Cluster focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.
 - (3) Web Game Development will allow students to demonstrate creative thinking, develop innovative strategies, and use digital and communication tools necessary to develop fully functional online games. Web Game Development has career applications for many aspects of the game industry, including programming, art principles, graphics, web design, storyboarding and scripting, and business and marketing. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
 - (A) research, evaluate, and demonstrate appropriate design of a web-based gaming site;
 - (B) illustrate ideas for web artwork from direct observations, experiences, and imagination;
 - (C) create original designs for web applications; and
 - (D) demonstrate the effective use of art media to create original web designs.
 - (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:

- (A) understand and evaluate the use and appropriateness of webinars;
 - (B) examine, discuss, and summarize interactive online learning environments;
 - (C) distinguish between distance learning, virtual learning, and online learning;
 - (D) define and evaluate Voice over Internet Protocol (VoIP);
 - (E) identify and apply end-user, peer, self-, and professional evaluations; and
 - (F) work collaboratively to create functioning programs and gaming products.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) research, evaluate, and create web forms for database processing;
 - (B) identify the various programming languages and differentiate among the available web programming languages;
 - (C) research, evaluate, and summarize content management systems (CMS);
 - (D) differentiate between Common Gateway Interface (CGI) and computer-generated imagery (CGI);
 - (E) discuss, analyze, and summarize streaming media/content and game broadcasting;
 - (F) define and evaluate instant messaging (IM) within a game environment;
 - (G) analyze and discuss the history of gaming;
 - (H) discuss, analyze, compare, and contrast game types such as action, action-adventure, adventure, construction and management simulation, life simulation, massively multiplayer online role-playing (MMORPG), music, party, puzzle, role-playing, sports, strategy, trivia, and vehicle simulation;
 - (I) discuss, analyze, compare, and contrast gaming hardware, including console, personal computer, mobile, and web;
 - (J) compare and contrast web standards versus browser-specific languages;
 - (K) research, evaluate, and summarize e-commerce;
 - (L) investigate career opportunities in programming, gaming, art, design, business, and marketing;
 - (M) research the characteristics of existing gaming websites to determine local, state, national, and global trends;
 - (N) compare and contrast historical and contemporary styles of art as applied to website development;
 - (O) compare and contrast the use of the art elements of color, texture, form, line, space, and value and the art principles of emphasis, pattern, rhythm, balance, proportion, and unity in personal web game artwork and the web game artwork of others, using vocabulary accurately;
 - (P) describe general characteristics in artwork from a variety of cultures that influence web game design;
 - (Q) research and evaluate emerging technologies; and
 - (R) research and evaluate augmented reality (the supplementing of reality with computer-generated imagery) such as heads-up display and virtual digital projectors.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:

- (A) select an appropriate web programming language based on given criteria;
 - (B) develop requirements for a database and determine the appropriate means to insert, delete, and modify records;
 - (C) develop Structured Query Language (SQL) statements to retrieve, insert, modify, and delete records in a database;
 - (D) design and create a flow diagram to plan a database, program, and game;
 - (E) define and identify proper use of gaming graphics, including skins, textures, environment appearance, environment mapping, raster graphics, and vector graphics;
 - (F) plan an animation that includes the movement of characters, camera movements, camera angles, user point of view, mechanics of motion, backgrounds, settings, ambient objects, and environments;
 - (G) compare and contrast two-dimensional (2-D) and three-dimensional (3-D) animation;
 - (H) develop and create a gaming storyboard and script that shows the overall development of a storyline;
 - (I) identify and implement graphic and game design elements, including color, environment, time to completion, difficulty, story complexity, character development, device control, backstory, delivery, and online player(s);
 - (J) design and create decision trees for a game's artificial intelligence engine;
 - (K) compare and contrast available audio formats for optimal delivery;
 - (L) identify the similarities and differences among platforms, including the application of coding on a personal computer, mobile device, and gaming console;
 - (M) research and identify existing online game development tools;
 - (N) evaluate and determine network requirements for the delivery of online games to end users; and
 - (O) create visual solutions by elaborating on direct observation, experiences, and imagination as they apply to original web design.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) explain game ratings and why games fit into certain ratings;
 - (B) assess games and game ratings in terms of their impact on societal interactions;
 - (C) model the ethical and legal acquisition of digital information following copyright laws, fair-use guidelines, and the student code of conduct;
 - (D) define and practice the ethical and legal acquisition, sharing, and use of files taking into consideration their primary ownership and copyright;
 - (E) examine original web game artwork to comply with appropriate behavioral, communication, and privacy guidelines, including ethics, online bullying and harassment, personal security, appropriate audience language, ethical use of files/file sharing, technical documentation, and online communities;
 - (F) interpret, evaluate, and justify artistic decisions in the creation of original art for web game design; and
 - (G) analyze original web game artwork and digital portfolios created by peers and others to form precise conclusions about formal qualities, historical and cultural contexts, intents, and meanings.

- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
- (A) create a website that includes:
- (i) an interactive database with elements such as SQL statements, Extensible Markup Language (XML), and Open Database Connectivity (ODBC);
 - (ii) javascript; and
 - (iii) server-side processing, including Common Gateway Interface (CGI); bitmap and vector graphics; database creation, modification, and deletion; creation and maintenance of user accounts; user authentication; and documentation;
- (B) create a fully functional online game that includes:
- (i) multiple game levels with increasing difficulty;
 - (ii) high-score ranking;
 - (iii) physics, including center of mass, collision detection, lighting, shading, perspective, anatomy, motion blur, lens flare, and reflections;
 - (iv) art principles, including color theory, texture, balance, lighting, shading, skinning, and drawing;
 - (v) graphics resolution, including pixel depth and compression;
 - (vi) database creation, modification, and deletion;
 - (vii) creation and maintenance of user accounts;
 - (viii) user authentication;
 - (ix) artificial intelligence;
 - (x) game-level saving;
 - (xi) mathematical functions;
 - (xii) varying camera angles;
 - (xiii) VoIP for online web games; and
 - (xiv) documentation; and
- (C) create a digital portfolio.

Subchapter K. Information Technology

§130.308. Web Technologies (One Credit), Adopted 2015:

- (a) ~~General requirements. This course is recommended for students in Grades 10-12. Recommended prerequisite: Principles of Information Technology. Students shall be awarded one credit for successful completion of this course.~~
- (b) ~~Introduction:~~
- ~~(1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~
 - ~~(2) The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.~~
 - ~~(3) In Web Technologies, students will learn to make informed decisions and apply the decisions to the field of IT. Students will implement personal and interpersonal skills to prepare for a rapidly evolving workplace environment. The knowledge and skills acquired and practiced will enable students to successfully perform and interact in a technology driven society. Students will enhance reading, writing, computing, communication, and critical thinking and apply them to the IT environment.~~
 - ~~(4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~
 - ~~(5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~
- (c) ~~Knowledge and skills:~~
- ~~(1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:~~
 - ~~(A) identify and demonstrate work behaviors and qualities that enhance employability and job advancement such as regular attendance, attention to proper attire, maintenance of a clean and safe work environment, pride in work, flexibility, and initiative;~~
 - ~~(B) employ effective verbal and nonverbal communication skills;~~
 - ~~(C) examine the role of certifications, resumes, and portfolios in the web technology profession;~~
 - ~~(D) solve problems and think critically;~~
 - ~~(E) demonstrate leadership skills and function effectively as a team member; and~~
 - ~~(F) demonstrate planning and time management skills such as storyboarding and project management, including initiating, planning, executing, monitoring and controlling, and closing a project.~~
 - ~~(2) The student identifies employment opportunities in the IT field with a focus in the area of interactive media. The student is expected to:~~
 - ~~(A) identify job opportunities and accompanying job duties and tasks;~~
 - ~~(B) research careers of personal interest along with the education, job skills, and experience required to achieve personal career goals;~~
 - ~~(C) demonstrate an understanding of the functions of resumes and portfolios; and~~
 - ~~(D) create a portfolio.~~

- ~~(3) The student demonstrates knowledge and appropriate use of hardware, software, and connectivity technologies. The student is expected to:~~
- ~~(A) identify networking components and define the impact of networking components on web development;~~
 - ~~(B) evaluate the various input, processing, output, and storage devices and storage services;~~
 - ~~(C) identify current and future Internet protocols such as hypertext transfer protocol, file transfer protocol, telnet, and email; and~~
 - ~~(D) describe new trends in web technology and evaluate their impact on web development.~~
- ~~(4) The student complies with practices and behaviors that meet legal and ethical responsibilities. The student is expected to:~~
- ~~(A) explain and demonstrate ethical use of technology and online resources;~~
 - ~~(B) differentiate between copyright and trademarks;~~
 - ~~(C) explain the concept of intellectual property laws, including copyright, trademarks, and patents and consequences of violating each type of law;~~
 - ~~(D) examine the consequences of plagiarism;~~
 - ~~(E) adhere to copyright and trademark intellectual property laws and regulations, including demonstrating correct acquisition and citation of sources;~~
 - ~~(F) discuss the process of acquiring rights to use copyrighted and trademarked content in a website;~~
 - ~~(G) demonstrate appropriate behavior and adherence to acceptable use policies when accessing and using online resources;~~
 - ~~(H) explain the importance of information privacy such as securing credit card information, passwords, and personal information;~~
 - ~~(I) describe the function of a non-disclosure agreement; and~~
 - ~~(J) discuss website accessibility concerns.~~
- ~~(5) The student evaluates electronic information. The student is expected to:~~
- ~~(A) identify appropriate methods to analyze the design and functionality of web pages;~~
 - ~~(B) demonstrate skill in testing the accuracy and validity of information acquired; and~~
 - ~~(C) synthesize information from data acquired from online resources.~~
- ~~(6) The student creates and modifies web and digital media designs. The student is expected to:~~
- ~~(A) implement functional design elements such as proximity, repetition, contrast, alignment, color theory, consistency, image file size, and typography;~~
 - ~~(B) identify, create, modify, and use common file formats such as text, image, video analog and digital, and audio files;~~
 - ~~(C) select, create, modify, and integrate effective digital content such as vector-based and raster graphics, motion graphics, video, and audio;~~
 - ~~(D) create web pages using current web standards and web development skills such as version control, documentation, web application security, validation, accessibility, and compatibility across multiple browsers and devices;~~
 - ~~(E) demonstrate proper use of folder structure hierarchy; and~~
 - ~~(F) use web coding standards to evaluate the design and functionality of web pages such as the World Wide Web Consortium (W3C) guidelines.~~

- ~~(7) — The student demonstrates and employs knowledge of Internet programming strategies to develop and maintain web applications. The student is expected to:~~
- ~~(A) — explain the importance of Internet programming standards;~~
 - ~~(B) — differentiate among various web coding standards such as HyperText Markup Language, and cascading style sheets;~~
 - ~~(C) — use standard applications to develop web applications such as text-based editing programs, word processors, and web authoring software;~~
 - ~~(D) — compare and contrast the impact of different browsers on web development;~~
 - ~~(E) — explain client-server applications and describe the process of a client-server transaction;~~
 - ~~(F) — identify the advantages and disadvantages of client-side processing;~~
 - ~~(G) — identify security issues related to client-side processing;~~
 - ~~(H) — use standard scripting languages to produce interactive web applications;~~
 - ~~(I) — identify characteristics of various scripting languages; and~~
 - ~~(J) — explain the process to construct secure transaction interfaces from the web server to the customer.~~
- ~~(8) — The student employs knowledge of web administration to develop and maintain web applications. The student is expected to:~~
- ~~(A) — compare the advantages and disadvantages of running a personal server versus using a server provider;~~
 - ~~(B) — explain the Transmission Control Protocol/Internet Protocol;~~
 - ~~(C) — identify hardware and software requirements for web servers;~~
 - ~~(D) — evaluate server providers;~~
 - ~~(E) — describe the process of establishing a domain name;~~
 - ~~(F) — simulate the administration of web servers, including uploading and managing files;~~
 - ~~(G) — collect and analyze usage statistics;~~
 - ~~(H) — maintain documentation of the server environment such as specifications, passwords, and software versions;~~
 - ~~(I) — summarize the process of server backup and restoration of software features;~~
 - ~~(J) — propose security measures to protect web servers from electronic threats such as unauthorized access and negative intentions; and~~
 - ~~(K) — evaluate security measures such as using a firewall, Secure Socket Layer (SSL) connections, and Hypertext Transfer Protocol Secure (HTTPS) transactions.~~
- ~~(9) — The student evaluates a problem and creates a project management plan for meeting client requirements. The student is expected to:~~
- ~~(A) — communicate with clients to analyze requirements to meet the needs of the client and target audience;~~
 - ~~(B) — document design properties, necessary tools, and resources and identify and address risks;~~
 - ~~(C) — develop and use a timeline task list such as critical milestones, potential challenges, and interdependencies; and~~
 - ~~(D) — use various methods to evaluate the progress of the plan and modify as necessary.~~

~~(10) — The student creates and implements a web product using a project management plan. The student is expected to:~~

~~(A) — create and simulate the publication of a multipage web product using client required content and web design concepts;~~

~~(B) — develop a test plan for a multipage web product for testing usability, effectiveness, reliability, and customer acceptance;~~

~~(C) — explain the quality assurance process; and~~

~~(D) — develop and implement a quality assurance plan.]~~

§130.309. Computer Programming I (One Credit), Adopted 2015.

~~(a) — General requirements. This course is recommended for students in Grades 10-12. Recommended prerequisites: Principles of Information Technology and Algebra I. Students shall be awarded one credit for successful completion of this course.~~

~~(b) — Introduction:~~

~~(1) — Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~

~~(2) — The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.~~

~~(3) — In Computer Programming I, students will acquire knowledge of structured programming techniques and concepts appropriate to developing executable programs and creating appropriate documentation. Students will analyze the social responsibility of business and industry regarding the significant issues relating to the environment, ethics, health, safety, and diversity in society and in the workplace as related to computer programming. Students will apply technical skills to address business applications of emerging technologies.~~

~~(4) — Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~

~~(5) — Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~

~~(c) — Knowledge and skills:~~

~~(1) — The student demonstrates the necessary skills for career development, maintenance of employability, and successful completion of course outcomes. The student is expected:~~

~~(A) — employ effective reading and writing skills;~~

~~(B) — employ effective verbal and nonverbal communication skills;~~

~~(C) — solve problems and think critically;~~

~~(D) — demonstrate leadership skills and function effectively as a team member;~~

~~(E) — demonstrate an understanding of legal and ethical responsibilities in relation to the field of IT;~~

~~(F) — demonstrate planning and time management skills such as project management, including initiating, planning, executing, monitoring and controlling, and closing a project; and~~

~~(G) — identify job opportunities and accompanying job duties and tasks.~~

~~(2) — The student differentiates the concepts of integrity and confidentiality as related to technology in the business environment. The student is expected to:~~

- (A) — define business ethics;
 - (B) — distinguish between honest and dishonest business practices;
 - (C) — examine copyright and licensing issues in the software industry; and
 - (D) — analyze the effects of unethical practices on a business.
- (3) — The student identifies and analyzes the client project software needs and requirements. The student is expected to:
- (A) — gather data to identify client and project requirements;
 - (B) — identify input and output requirements;
 - (C) — identify system processing requirements; and
 - (D) — develop program requirements and specifications.
- (4) — The student develops an IT-based project plan to solve a specific problem. The student is expected to:
- (A) — define scope of work to meet client based project needs;
 - (B) — identify software development processes and issues; and
 - (C) — explain the software system life cycle approach.
- (5) — The student designs a software application plan. The student is expected to:
- (A) — articulate the principles of system design such as procedural, object-oriented, and event-driven processes;
 - (B) — perform a logical design using appropriate software tools;
 - (C) — apply algorithmic and data structure concepts;
 - (D) — identify constraints;
 - (E) — identify modular design concepts; and
 - (F) — document the design specification using a defined procedure.
- (6) — The student solves problems using different types and levels of programming languages and quality assurances. The student is expected to:
- (A) — differentiate among the concepts of data such as procedural, object-oriented, and event-driven representation;
 - (B) — identify current programming languages and the environment in which each is used;
 - (C) — produce procedural and object-oriented programs using structured coding with appropriate style and clarity of expression;
 - (D) — demonstrate skill in program testing;
 - (E) — compare computed results with anticipated results to determine the reasonableness of the solutions;
 - (F) — troubleshoot technological problems;
 - (G) — explain the software quality assurance process; and
 - (H) — follow established quality assurance procedures for testing, identifying problems, and tracking resolutions.
- (7) — The student recognizes issues and complies with procedures for maintaining the security of computerized information. The student is expected to:

- ~~(A) — identify risks to information systems facilities, data communications systems, and applications;~~
- ~~(B) — comply with federal and state legislation pertaining to computer crime, fraud, and abuse;~~
- ~~(C) — identify and select controls for information systems facilities, data communications, and applications appropriate to specific risks; and~~
- ~~(D) — apply procedures used to recover from situations such as system failure and computer virus.]~~

§130.310. Computer Programming II (One Credit), Adopted 2015;

- ~~(a) — General requirements. This course is recommended for students in Grades 11 and 12. Recommended prerequisites: Principles of Information Technology and Computer Programming I. Students shall be awarded one credit for successful completion of this course.~~
- ~~(b) — Introduction:~~
 - ~~(1) — Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~
 - ~~(2) — The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.~~
 - ~~(3) — In Computer Programming II, students will expand their knowledge and skills in structured programming techniques and concepts by addressing more complex problems and developing comprehensive programming solutions. Students will analyze the social responsibility of business and industry regarding the significant issues relating to environment, ethics, health, safety, and diversity in society and in the workplace as related to computer programming. Students will apply technical skills to address business applications of emerging technologies.~~
 - ~~(4) — Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~
 - ~~(5) — Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~
- ~~(c) — Knowledge and skills:~~
 - ~~(1) — The student demonstrates professional standards/employability skills as required by business and industry. The student is expected:~~
 - ~~(A) — employ effective reading and writing skills;~~
 - ~~(B) — employ effective verbal and nonverbal communication skills;~~
 - ~~(C) — illustrate interview skills for successful job placement;~~
 - ~~(D) — solve problems and think critically;~~
 - ~~(E) — demonstrate leadership skills and function effectively as a team member;~~
 - ~~(F) — identify and implement proper safety procedures;~~
 - ~~(G) — demonstrate an understanding of legal and ethical responsibilities in relation to the field of IT; and~~
 - ~~(H) — demonstrate planning and time management skills such as project management, including initiating, planning, executing, monitoring and controlling, and closing a project.~~
 - ~~(2) — The student identifies various employment opportunities in the IT field. The student is expected to:~~

- ~~(A) — create a personal career plan along with education, job skills, and experience necessary to achieve career goals; and~~
- ~~(B) — develop a resume that includes letters of recommendation appropriate to a chosen career plan.~~
- ~~(3) — The student identifies project software needs and requirements. The student is expected to:~~
 - ~~(A) — identify input and output requirements;~~
 - ~~(B) — identify system processing requirements;~~
 - ~~(C) — identify hardware, networking, and software system functional requirements;~~
 - ~~(D) — conduct a project needs analysis;~~
 - ~~(E) — define a problem to be solved by a created application;~~
 - ~~(F) — analyze requirement specifications using current approaches;~~
 - ~~(G) — identify project constraints; and~~
 - ~~(H) — use advanced modeling and analysis of functional requirements.~~
- ~~(4) — The student produces an IT based strategy and project plan to solve a provided class problem. The student is expected to:~~
 - ~~(A) — identify key functions and subsystem capabilities of modern software products;~~
 - ~~(B) — identify software resources and individual product risks; and~~
 - ~~(C) — identify software development methodologies.~~
- ~~(5) — The student demonstrates knowledge of the software development environment. The student is expected to:~~
 - ~~(A) — apply prototyping techniques;~~
 - ~~(B) — use appropriate configuration management tools;~~
 - ~~(C) — apply language specific programming techniques;~~
 - ~~(D) — develop programs using appropriate language;~~
 - ~~(E) — apply the appropriate development environment for each selected language such as the compiler, debugger, test generator, and analyzer;~~
 - ~~(F) — use appropriate modeling and analysis tools; and~~
 - ~~(G) — use appropriate requirement tracking tools.~~
- ~~(6) — The student demonstrates knowledge of the software development process. The student is expected to:~~
 - ~~(A) — articulate the information system life cycle;~~
 - ~~(B) — identify system analysis issues related to design, testing, implementation, and maintenance;~~
 - ~~(C) — identify the use of program design tools in a software development process; and~~
 - ~~(D) — identify current information life cycle models.~~
- ~~(7) — The student designs a software application. The student is expected to:~~
 - ~~(A) — apply principals of system design such as structured, object oriented, and event driven processes;~~
 - ~~(B) — develop a logical design;~~
 - ~~(C) — document design specifications according to a defined procedure;~~

- ~~(D) — design system input, output, processing, and interfaces;~~
 - ~~(E) — identify the characteristics and uses of data processing such as batch, interactive, event driven, and object-oriented;~~
 - ~~(F) — explain algorithmic and data structure concepts;~~
 - ~~(G) — identify constraints;~~
 - ~~(H) — identify modular design concepts;~~
 - ~~(I) — identify the features, functions, and architectures of client server computing;~~
 - ~~(J) — articulate database management concepts;~~
 - ~~(K) — define the objectives of a client server application;~~
 - ~~(L) — design static and dynamic online processing systems; and~~
 - ~~(M) — employ interface techniques.~~
- ~~(8) — The student codes a software application. The student is expected to:~~
- ~~(A) — apply programming language concepts;~~
 - ~~(B) — identify the hardware software connection;~~
 - ~~(C) — articulate the concept of data representation;~~
 - ~~(D) — apply structured, object-oriented, and event driven programming techniques;~~
 - ~~(E) — articulate how a programming language can support multitasking and exception handling;~~
 - ~~(F) — identify how current key programming languages work in different operating system environments;~~
 - ~~(G) — translate data structures and program design into code in an appropriate language;~~
 - ~~(H) — demonstrate key constructs and commands specific to a language;~~
 - ~~(I) — identify current programming languages used in software development;~~
 - ~~(J) — explain how to resolve program implementation issues such as debugging, documentation, and auditing;~~
 - ~~(K) — articulate software development issues such as correctness, reliability, and productivity;~~
 - ~~(L) — explain code analysis issues related to design, testing, implementation, and maintenance;~~
 - ~~(M) — demonstrate how to design and implement programs in a top-down manner;~~
 - ~~(N) — demonstrate how to translate algorithmic and modular design into computer code;~~
 - ~~(O) — explain how programming control structures are used to verify correctness;~~
 - ~~(P) — compile and debug computer code; and~~
 - ~~(Q) — prepare appropriate commenting within code.~~
- ~~(9) — The student demonstrates knowledge of software testing. The student is expected to:~~
- ~~(A) — develop a test plan;~~
 - ~~(B) — define test procedures;~~
 - ~~(C) — develop test cases; and~~
 - ~~(D) — perform software testing.~~
- ~~(10) — The student performs quality assurance testing. The student is expected to:~~
- ~~(A) — explain the software quality assurance process;~~

- ~~(B) — apply standard requirements for software quality assurance;~~
- ~~(C) — perform software quality assurance tasks to determine a quality software product; and~~
- ~~(D) — conduct code inspection.~~
- ~~(11) — The student applies procedures for maintaining the security of computerized information. The student is expected to:~~
 - ~~(A) — identify risks to information systems facilities, data, communication systems, and applications;~~
 - ~~(B) — comply with federal and state legislation pertaining to computer crime, fraud, and abuse;~~
 - ~~(C) — identify and select controls for information systems facilities, data communications, and applications appropriate to specific risks; and~~
 - ~~(D) — apply procedures used to recover from situations such as system failure and computer virus.]~~

§130.315. Web Communications (One-Half Credit).

- ~~(a) — General requirements. Students shall be awarded one-half credit for successful completion of this course. This course is recommended for students in Grade 9.~~
- ~~(b) — Introduction.~~
 - ~~(1) — Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.~~
 - ~~(2) — The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.~~
 - ~~(3) — In Web Communications, students will acquire knowledge of web communications and technological operations and concepts. This is an exploratory course in web communications. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.~~
 - ~~(4) — Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.~~
 - ~~(5) — Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.~~
- ~~(c) — Knowledge and skills.~~
 - ~~(1) — Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:~~
 - ~~(A) — demonstrate proficiency in the use of local and online collaboration;~~
 - ~~(B) — create websites using web editors or web authoring programs;~~
 - ~~(C) — evaluate the accessibility and usability of original websites; and~~
 - ~~(D) — conceptualize possible technologies based on current technical trends.~~
 - ~~(2) — Communication and collaboration. The student uses digital technology to work collaboratively toward his or her own learning and the learning of others. The student is expected to:~~
 - ~~(A) — analyze and implement the proper and acceptable use of digital/virtual communications technologies such as instant messaging (IM), chat, email, and social networking;~~

- (B) define and implement the acquisition, sharing, and use of files taking into consideration primary ownership and copyright;
 - (C) apply decisions regarding the selection, acquisition, and sharing of uniform resource locators (URLs) used in research, taking into consideration their quality, appropriateness, and effectiveness; and
 - (D) solve problems using critical-thinking strategies.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) verify the accuracy, validity, and currency of acquired information;
 - (B) conduct effective searches using Boolean operators;
 - (C) acquire and use appropriate vocabulary terms;
 - (D) cite sources appropriately using established methods;
 - (E) model ethical and legal acquisition of digital information following guidelines in the student code of conduct, including plagiarism and copyright laws;
 - (F) identify and discuss emerging technologies and their impact;
 - (G) understand Internet history and structure and how they impact current use; and
 - (H) demonstrate appropriate use of grammar, spelling, and vocabulary when creating original work.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:
- (A) demonstrate the transfer and adaptation of knowledge through the creation of original work;
 - (B) evaluate and implement security measures such as firewalls and Hypertext Transfer Protocol Secure (HTTPS) to protect original work;
 - (C) analyze and follow timelines needed to create, edit, and present original work;
 - (D) verify current licensing issues for software being used for the creation of original work;
 - (E) identify and evaluate the design and functionality of web pages using rubrics;
 - (F) optimize web information for fast download such as dial-up and high-speed Internet and mobile devices; and
 - (G) evaluate original work through self-, peer, and professional review of websites.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) engage in online activities that follow appropriate behavioral, communication, and privacy guidelines, including ethics, personal security, and verbiage determined by the intended audience;
 - (B) understand the negative impact of inappropriate technology use, including online bullying and harassment;
 - (C) implement online security guidelines, including identity protection, limited personal information sharing, and password protection of a secure website; and
 - (D) advocate and practice safe, legal, and responsible use of information and technology.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:

- (A) demonstrate knowledge of hardware such as scanners, cameras, printers, video cameras, and external hard drives;
- (B) identify the parts of a computer and explain their functions;
- (C) summarize the need, functionality, and use of servers;
- (D) identify the advantages and disadvantages of running a personal web server versus using a web server provider;
- (E) differentiate and appropriately use various input, processing, output, and primary/secondary storage devices;
- (F) create and implement universally accessible documents;
- (G) analyze bandwidth issues as they relate to audience, servers, connectivity, and cost;
- (H) establish a folder/directory hierarchy for storage of a web page and its related or linked files;
- (I) follow file and folder naming conventions, including spacing, special characters, and capitalization; and
- (J) identify basic design principles when creating a website.

§130.316. Web Design (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.
 - (3) In Web Design students will acquire knowledge of web design and technological operations and concepts that support creativity, innovation, collaboration, information fluency, critical thinking and decision making. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
 - (A) demonstrate proficiency in local and online collaboration;
 - (B) create a website using web editors and web authoring programs;
 - (C) evaluate the accessibility and usability of an original website as it relates to a target audience;
 - (D) conceptualize new possible technologies based on current technical trends;

- (E) analyze the use of virtualization such as virtual classrooms, distance learning, virtual storage, and a virtual operating system;
 - (F) demonstrate knowledge and appropriate use of operating systems, software applications, and communication and networking components; and
 - (G) make decisions regarding the selection, acquisition, and use of software, taking into consideration its quality, appropriateness, effectiveness, and efficiency.
- (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:
- (A) analyze and implement the proper and acceptable use of digital/virtual communications technologies such as instant messaging (IM), chat, email, and social networking;
 - (B) define and implement the acquisition, sharing, and use of files, taking into consideration their primary ownership and copyright;
 - (C) apply decisions regarding the selection, acquisition, and sharing of uniform resource locators (URLs) used in research, taking into consideration their quality, appropriateness, and effectiveness;
 - (D) solve problems using critical-thinking strategies; and
 - (E) compare, evaluate, and implement the use of wired versus wireless access.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) verify the accuracy, validity, and currency of acquired information;
 - (B) conduct effective searches with Boolean operators;
 - (C) acquire and use appropriate vocabulary terms;
 - (D) cite sources appropriately using established methods;
 - (E) model ethical and legal acquisition of digital information following guidelines in the student code of conduct, including plagiarism and copyright laws;
 - (F) identify and discuss emerging technologies and their impact;
 - (G) understand Internet history and structure and how they impact current use;
 - (H) demonstrate appropriate use of grammar, spelling, and vocabulary when creating original work;
 - (I) acquire, evaluate, and use various web standards such as World Wide Web Consortium (W3C), Ecma International, and Internet Corporation for Assigned Names and Numbers (ICANN) to make informed decisions and implement standards in original work;
 - (J) understand, analyze, and use interactive websites;
 - (K) understand, evaluate, and determine the appropriate use of dynamic and static websites;
 - (L) understand, evaluate, and determine the appropriate use of open/closed source file formats and software;
 - (M) explain and demonstrate how search engines work such as advanced options, preferences, advertising, and search categories;
 - (N) evaluate, create, and apply principles of project management, including web storyboards, site maps, job duties, time constraints, group dynamics, communication interaction, and project completion, evaluation, and feedback;
 - (O) understand the use and application of a virtual private network (VPN);

- (P) distinguish among protocols, including Hypertext Transfer Protocol (HTTP) and File Transfer Protocol (FTP);
 - (Q) summarize the technical needs of a World Wide Web server, including random access memory (RAM), hard disk capacity, central processing unit (CPU) speed, busses, methods of connectivity, and appropriate software;
 - (R) demonstrate proficiency in the use of a variety of electronic input devices such as keyboard, scanner, voice/sound recorder, mouse, touch screen, or digital video by incorporating such components while publishing web pages;
 - (S) demonstrate proper digital etiquette and knowledge of acceptable use policies when using networks, especially resources on the Internet and intranets;
 - (T) demonstrate proficiency in and appropriate use and navigation of local area networks (LANs), wide area networks (WANs), the Internet, and intranets for research and resource sharing;
 - (U) construct appropriate search strategies in the acquisition of information from the Internet, including keyword searches and searches with Boolean operators; and
 - (V) acquire information in electronic formats, including text, audio, video, and graphics, citing the source.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:
- (A) demonstrate the transfer and adaptation of knowledge through the creation of original work;
 - (B) evaluate and implement security measures to protect original work such as firewalls and Hypertext Transfer Protocol Secure (HTTPS);
 - (C) analyze and follow timelines needed to create, edit, and present original work;
 - (D) verify current licensing issues for software being used for the creation of original work;
 - (E) identify and evaluate the design and functionality of web pages using rubrics;
 - (F) optimize web information for fast download such as dial-up and high-speed Internet and mobile devices;
 - (G) evaluate original work through self-, peer, and professional review of websites;
 - (H) evaluate the types, functions, and target audiences of websites;
 - (I) read, use, and develop technical documents;
 - (J) analyze, examine, assess, and decide on servers as they relate to the management of a website;
 - (K) analyze, examine, assess, and decide on a web host;
 - (L) analyze, examine, assess, and decide on domain name acquisition and retention;
 - (M) evaluate the functionality of a website such as color scheme, grammar, technological constraints, age appropriateness, cross-platform usability, and user relevant criteria as it relates to an intended audience;
 - (N) identify software file formats and their characteristics and appropriate use;
 - (O) identify and apply search engine optimization (SEO) to ensure optimal website visibility;
 - (P) investigate and choose electronic security methods for a web server to protect from unauthorized access and negative intentions; and

- (Q) draw conclusions from data gathered from electronic and telecommunication resources.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) engage in online activities that follow appropriate behavioral, communication, and privacy guidelines, including ethics, personal security, verbiage determined by the intended audience, and ethical use of files and file sharing;
 - (B) understand the negative impact of inappropriate technology use, including online bullying and harassment;
 - (C) implement online security guidelines, including identity protection, limited personal information sharing, and password protection of a secure website;
 - (D) engage in safe, legal, and responsible use of information and technology;
 - (E) understand and respond to local, state, national, and global issues to ensure appropriate cross-browser and cross-platform usability;
 - (F) interpret, use, and develop a safe online shared computing environment;
 - (G) identify legal, ethical, appropriate, and safe website marketing practices;
 - (H) identify legal, ethical, appropriate, and safe multimedia usage, including video, audio, graphics, animation, and emerging trends;
 - (I) analyze the impact of the World Wide Web on society through research, interviews, and personal observation; and
 - (J) participate in relevant and meaningful activities in the larger community and society to create electronic projects.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
- (A) demonstrate knowledge of hardware, including scanners, cameras, printers, video cameras, and external hard drives;
 - (B) identify the parts of a computer and explain its functions;
 - (C) summarize the need for and functionality and use of servers;
 - (D) identify the advantages and disadvantages of running a personal web server versus using a web server provider;
 - (E) differentiate and appropriately use various input, processing, output, and primary/secondary storage devices;
 - (F) create and implement universally accessible documents;
 - (G) analyze bandwidth issues as related to audience, server, connectivity, and cost;
 - (H) establish a folder/directory hierarchy for storage of a web page and its related or linked files;
 - (I) create file and folder naming conventions to follow established guidelines, including spacing, special characters, and capitalization;
 - (J) identify basic design principles when creating a website, including white space, color theory, background color, shape, line, proximity, unity, balance (ratio of text to white space), alignment, typography, font size, type, style, image file size, repetition, contrast, consistency, and aesthetics;
 - (K) demonstrate knowledge of the six core domains (gov, net, com, mil, org, edu) and be familiar with new domain implementation;

- (L) implement escape codes, HyperText Markup Language (HTML), cascading style sheets (CSS), and javascript through hard coding, web editors, and web authoring programs;
- (M) identify and use FTP client software;
- (N) implement java applet insertion;
- (O) identify and differentiate various network topologies, including physical and logical;
- (P) create, evaluate, and use web-based animation;
- (Q) create, evaluate, and use video, including editing, compression, exporting, appropriateness, and delivery;
- (R) demonstrate the ability to conduct secure communications from a web server to a client; and
- (S) use hypertext linking appropriately when creating web pages.

§130.317. Independent Study in Technology Applications (One Credit), Beginning with School Year 2012-2013.

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: a minimum of one credit from the courses in the Information Technology Career Cluster. This course may be taken at Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.
 - (3) In Independent Study in Technology Applications, through the study of technology applications foundations, including technology-related terms, concepts, and data input strategies, students will communicate information in different formats and to diverse audiences using a variety of technologies. Students will learn to make informed decisions; develop and produce original work that exemplifies the standards identified by the selected profession or discipline; and publish the product in electronic media and print. Students will practice the efficient acquisition of information by identifying task requirements, using search strategies, and using technology to access, analyze, and evaluate the acquired information. By using technology as a tool that supports the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
 - (A) apply existing knowledge to promote creativity in designing new technology products or services;

- (B) design and implement procedures to track trends, set timelines, and review and evaluate progress for continual improvement in process and product;
 - (C) produce electronic documentation to illustrate the progress of a project;
 - (D) seek and respond to input from peers and professionals in delineating technological tasks and problem solving;
 - (E) make necessary revisions and/or proceed to the next stage of study;
 - (F) use technology terminology appropriate to the independent study course;
 - (G) develop and apply advanced creativity and innovation employed in technology applications skills;
 - (H) identify and solve problems, individually and with input from peers and professionals, using research methods and advanced creativity and innovation skills used in a selected profession or discipline;
 - (I) develop products that meet standards identified by the selected profession or discipline; and
 - (J) produce original work to solve an identified problem and publish a product in electronic media and print.
- (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:
- (A) format developed projects according to defined output specifications, including target audience and viewing environment;
 - (B) present findings to a panel for comment and professional response;
 - (C) determine and implement the best method of presenting or publishing findings;
 - (D) synthesize and publish information in a variety of print or digital formats;
 - (E) use evolving network and Internet resources and appropriate technology skills to create, exchange, and publish information;
 - (F) develop cultural understanding and global awareness by interacting with learners of other cultures through evolving digital formats and communication methods;
 - (G) collaborate with others to identify a problem to be solved, hypotheses, and strategies to accomplish a task;
 - (H) participate with electronic communities as a learner, initiator, contributor, and facilitator/mentor; and
 - (I) participate in relevant, meaningful activities in the larger community and society to create electronic projects.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student is expected to:
- (A) use evolving network and Internet resources for research and resource sharing of technology applications;
 - (B) apply appropriate search strategies in the acquisition of information from the Internet, including keyword and Boolean search strategies;
 - (C) pose hypotheses and questions related to a selected problem;
 - (D) acquire information using appropriate research strategies with source citations through electronic formats, including interactive components, text, audio, video, graphics, and simulations; and

- (E) identify, create, and use available file formats, including text, image, video, and audio files.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:
 - (A) evaluate the design, functionality, and accuracy of the accessed information;
 - (B) conduct systematic research;
 - (C) demonstrate creative-thinking and problem-solving skills;
 - (D) integrate appropriate productivity tools, including network, mobile access, and multimedia tools, in the creation of solutions to problems;
 - (E) use enriched curricular content in the creation of products;
 - (F) synthesize and generate new information from data gathered from electronic resources;
 - (G) read and use technical documentation; and
 - (H) write simple technical documentation relative to the audience.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
 - (A) discuss intellectual property, privacy, sharing of information, copyright laws, and software licensing agreements;
 - (B) model ethical acquisition and use of digital information;
 - (C) model respect of intellectual property when editing graphics, video, text, and sound files;
 - (D) demonstrate proper etiquette, responsible use of software, and knowledge of acceptable use policies when using network resources;
 - (E) demonstrate best practices in understanding and applying information security;
 - (F) develop and maintain a technical documentation library in a variety of formats; and
 - (G) investigate how technology has changed and the social and ethical ramifications of computer usage.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
 - (A) demonstrate knowledge and appropriate use of input devices, operating systems, software applications, and communication and networking components;
 - (B) select, acquire, and use appropriate digital tools;
 - (C) delineate and make necessary adjustments regarding compatibility issues, including digital file formats and cross-platform connectivity; and
 - (D) use appropriate technology terminology and naming conventions.

§130.318. Independent Study in Evolving/Emerging Technologies (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: a minimum of one credit from the courses in the Information Technology Career Cluster. This course may be taken at Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.

- (2) The Information Technology (IT) Career Cluster focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.
- (3) In the Independent Study in Evolving/Emerging Technologies course, through the study of evolving/emerging technologies, including technology-related terms, concepts, and data input strategies, students will communicate information in different formats and to diverse audiences using a variety of technologies. Students will learn to make informed decisions, develop and produce original work that exemplifies the standards identified by the selected profession or discipline, and publish the product in electronic media and print. Students will demonstrate efficient acquisition of information by identifying task requirements, using search strategies, and using technology to access, analyze, and evaluate the acquired information. By using technology as a tool that supports the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
- (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
- (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student demonstrates creative thinking, constructs knowledge, and develops innovative products and processes using technology. The student is expected to:
- (A) apply existing knowledge to promote creativity in designing new technology products or services;
- (B) design and implement procedures to track trends, set timelines, and review and evaluate progress for continual improvement in process and product;
- (C) produce electronic documentation to illustrate the progress of a project;
- (D) seek and respond to input from peers and professionals in delineating technological tasks and problem solving;
- (E) make necessary revisions and/or proceed to the next stage of study;
- (F) use technology terminology appropriate to the independent study course;
- (G) develop and apply advanced creativity and innovation employed in technology applications skills;
- (H) identify and solve problems, individually and with input from peers and professionals, using research methods and advanced creativity and innovation skills used in a selected profession or discipline;
- (I) develop products that meet standards identified by a selected profession or discipline; and
- (J) produce original work to solve an identified problem and publish a product in electronic media and print.
- (2) Communication and collaboration. The student uses digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning experience of others. The student is expected to:
- (A) format developed projects according to defined output specifications, including target audience and viewing environment;
- (B) present findings to a panel for comment and professional response;

- (C) determine and implement the best method of presenting or publishing findings;
 - (D) synthesize and publish information in a variety of print or digital formats;
 - (E) use evolving network resources and appropriate technology skills to create, exchange, and publish information;
 - (F) develop cultural understanding and global awareness by interacting with learners of other cultures through evolving digital formats and communication methods;
 - (G) collaborate with others to identify a problem to be solved, hypotheses, and strategies to accomplish a task;
 - (H) participate with electronic communities as a learner, initiator, contributor, and facilitator/mentor; and
 - (I) participate in relevant, meaningful activities in the larger community and society to create electronic projects.
- (3) Research and information fluency. The student applies digital tools to gather, evaluate, and use information. The student uses a variety of strategies to acquire information from electronic resources, with appropriate supervision. The student is expected to:
- (A) use evolving network and Internet resources for research and resource sharing of technology applications;
 - (B) apply appropriate search strategies in the acquisition of information from the Internet, including keyword and Boolean search strategies;
 - (C) pose hypotheses and questions related to a selected problem;
 - (D) acquire information using appropriate research strategies with source citations through electronic formats, including interactive components, text, audio, video, graphics, and simulations; and
 - (E) identify, create, and use available file formats, including text, image, video, and audio files.
- (4) Critical thinking, problem solving, and decision making. The student uses critical-thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources. The student is expected to:
- (A) evaluate the design, functionality, and accuracy of the accessed information;
 - (B) conduct systematic research;
 - (C) demonstrate creative-thinking and problem-solving skills;
 - (D) integrate appropriate productivity tools, including network, mobile access, and multimedia tools, in the creation of solutions to problems;
 - (E) use enriched curricular content in the creation of products;
 - (F) synthesize and generate new information from data gathered from electronic resources;
 - (G) read and use technical documentation; and
 - (H) write simple technical documentation relative to the audience.
- (5) Digital citizenship. The student understands human, cultural, and societal issues related to technology and practices legal and ethical behavior. The student is expected to:
- (A) discuss intellectual property, privacy, sharing of information, copyright laws, and software licensing agreements;
 - (B) model ethical acquisition and use of digital information;
 - (C) model respect of intellectual property when editing graphics, video, text, and sound files;

- (D) demonstrate proper etiquette, responsible use of software, and knowledge of acceptable use policies when using network resources;
 - (E) demonstrate best practices in understanding and applying information security;
 - (F) develop and maintain a technical documentation library in a variety of formats; and
 - (G) investigate how technology has changed and the social and ethical ramifications of computer usage.
- (6) Technology operations and concepts. The student demonstrates a sound understanding of technology concepts, systems, and operations. The student is expected to:
- (A) demonstrate knowledge and appropriate use of input devices, operating systems, software applications, and communication and networking components;
 - (B) select, acquire, and use appropriate digital tools;
 - (C) delineate and make necessary adjustments regarding compatibility issues, including digital file formats and cross-platform connectivity; and
 - (D) use appropriate technology terminology and naming conventions.

Subchapter O. Science, Technology, Engineering, and Mathematics

§130.420. Fundamentals of Computer Science (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Fundamentals of Computer Science is intended as a first course for those students just beginning the study of computer science. Students will learn about the computing tools that are used every day. Students will foster their creativity and innovation through opportunities to design, implement, and present solutions to real-world problems. Students will collaborate and use computer science concepts to access, analyze, and evaluate information needed to solve problems. Students will learn the problem-solving and reasoning skills that are the foundation of computer science. By using computer science knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will gain an understanding of the principles of computer science through the study of technology operations and concepts. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student develops products and generates new understanding by extending existing knowledge. The student is expected to:
 - (A) investigate and explore various career opportunities within the computer science field and report findings through various media;
 - (B) create and publish interactive stories, games, and animations;
 - (C) create and publish interactive animations;
 - (D) create algorithms for the solution of various problems;
 - (E) create web pages using a mark-up language;
 - (F) use the Internet to create and publish solutions; and
 - (G) design creative and effective user interfaces.
 - (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
 - (A) seek and respond to advice from peers and professionals in evaluating problem solutions;
 - (B) debug and solve problems using reference materials and effective strategies; and

- (C) publish information in a variety of ways such as print, monitor display, web pages, and video.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
 - (A) construct appropriate electronic search strategies; and
 - (B) use a variety of resources, including other subject areas, together with various productivity tools to gather authentic data as a basis for individual and group programming projects.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
 - (A) demonstrate the ability to insert applets into web pages;
 - (B) find, download, and insert scripting code into web pages to enhance interactivity;
 - (C) understand binary representation of data in computer systems, perform conversions between decimal and binary number systems, and count in binary number systems;
 - (D) read and define a problem's description, purpose, and goals;
 - (E) demonstrate coding proficiency in a contemporary programming language by developing solutions that create stories, games, and animations;
 - (F) choose, identify, and use the appropriate data type to properly represent data in a problem solution;
 - (G) demonstrate an understanding of and use variables within a programmed story, game, or animation;
 - (H) demonstrate proficiency in the use of arithmetic operators to create mathematical expressions, including addition, subtraction, multiplication, real division, integer division, and modulus division;
 - (I) demonstrate an understanding of and use sequence within a programmed story, game, or animation;
 - (J) demonstrate an understanding of and use conditional statements within a programmed story, game, or animation;
 - (K) demonstrate an understanding of and use iteration within a programmed story, game, or animation;
 - (L) create an interactive story, game, or animation;
 - (M) use random numbers within a programmed story, game, or animation; and
 - (N) test program solutions by investigating valid and invalid data.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
 - (A) discuss copyright laws/issues and model ethical acquisition of digital information by citing sources using established methods;
 - (B) demonstrate proper digital etiquette and knowledge of acceptable use policies when using networks, especially resources on the Internet and on intranets;
 - (C) investigate measures such as passwords or virus detection/prevention to protect computer systems and databases from unauthorized use and tampering;
 - (D) understand the safety risks associated with the use of social networking sites;
 - (E) discuss the impact of computing and computing related advancements on society; and

- (F) determine the reliability of information available through electronic media.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
 - (A) demonstrate knowledge of the basic computer components, including a central processing unit (CPU), storage, and input/output devices;
 - (B) use operating system tools, including appropriate file management;
 - (C) demonstrate knowledge and appropriate use of different operating systems;
 - (D) demonstrate knowledge and understanding of basic network connectivity;
 - (E) describe, compare, and contrast the differences between an application and an operating system; and
 - (F) compare, contrast, and appropriately use various input, processing, output, and primary/secondary storage devices.

§140.421. Computer Science I (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Algebra I. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Computer Science I will foster students' creativity and innovation by presenting opportunities to design, implement, and present meaningful programs through a variety of media. Students will collaborate with one another, their instructor, and various electronic communities to solve the problems presented throughout the course. Through data analysis, students will identify task requirements, plan search strategies, and use computer science concepts to access, analyze, and evaluate information needed to solve problems. By using computer science knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will gain an understanding of the principles of computer science through the study of technology operations, systems, and concepts. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student develops products and generates new understandings by extending existing knowledge. The student is expected to:
 - (A) participate with electronic communities as a learner, initiator, contributor, and teacher/mentor;

- (B) extend the learning environment beyond the school walls with digital products created to increase teaching and learning in the other subject areas; and
 - (C) participate in relevant, meaningful activities in the larger community and society to create electronic projects.
- (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
 - (A) create and properly display meaningful output;
 - (B) create interactive console display interfaces, with appropriate user prompts, to acquire data from a user;
 - (C) use Graphical User Interfaces (GUIs) to create interactive interfaces to acquire data from a user and display program results;
 - (D) write programs with proper programming style to enhance the readability and functionality of the code by using meaningful descriptive identifiers, internal comments, white space, spacing, indentation, and a standardized program style;
 - (E) improve numeric display by optimizing data visualization;
 - (F) display simple vector graphics using lines, circles, and rectangles;
 - (G) display simple bitmap images; and
 - (H) seek and respond to advice from peers and professionals in evaluating quality and accuracy.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
 - (A) use a variety of resources, including foundation and enrichment curricula, to gather authentic data as a basis for individual and group programming projects; and
 - (B) use various productivity tools to gather authentic data as a basis for individual and group programming projects.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
 - (A) use program design problem-solving strategies to create program solutions;
 - (B) define and specify the purpose and goals of solving a problem;
 - (C) identify the subtasks needed to solve a problem;
 - (D) identify the data types and objects needed to solve a problem;
 - (E) identify reusable components from existing code;
 - (F) design a solution to a problem;
 - (G) code a solution from a program design;
 - (H) identify and debug errors;
 - (I) test program solutions with appropriate valid and invalid test data for correctness;
 - (J) debug and solve problems using error messages, reference materials, language documentation, and effective strategies;
 - (K) explore common algorithms, including finding greatest common divisor, finding the biggest number out of three, finding primes, making change, and finding the average;
 - (L) analyze and modify existing code to improve the underlying algorithm;

- (M) create program solutions that exhibit robust behavior by understanding, avoiding, and preventing runtime errors, including division by zero and type mismatch;
 - (N) select the most appropriate algorithm for a defined problem;
 - (O) demonstrate proficiency in the use of the arithmetic operators to create mathematical expressions, including addition, subtraction, multiplication, real division, integer division, and modulus division;
 - (P) create program solutions to problems using available mathematics libraries, including absolute value, round, power, square, and square root;
 - (Q) develop program solutions that use assignment;
 - (R) develop sequential algorithms to solve non-branching and non-iterative problems;
 - (S) develop algorithms to decision-making problems using branching control statements;
 - (T) develop iterative algorithms and code programs to solve practical problems;
 - (U) demonstrate proficiency in the use of the relational operators;
 - (V) demonstrate proficiency in the use of the logical operators; and
 - (W) generate and use random numbers.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) discuss intellectual property, privacy, sharing of information, copyright laws, and software licensing agreements;
 - (B) model ethical acquisition and use of digital information;
 - (C) demonstrate proper digital etiquette, responsible use of software, and knowledge of acceptable use policies;
 - (D) investigate measures, including passwords and virus detection/prevention, to protect computer systems and databases from unauthorized use and tampering; and
 - (E) investigate how technology has changed and the social and ethical ramifications of computer usage.
- (6) Technology operations, systems, and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
- (A) compare and contrast types of operating systems, software applications, and programming languages;
 - (B) demonstrate knowledge of major hardware components, including primary and secondary memory, a central processing unit (CPU), and peripherals;
 - (C) differentiate among current programming languages, discuss the use of those languages in other fields of study, and demonstrate knowledge of specific programming terminology and concepts;
 - (D) differentiate between a high-level compiled language and an interpreted language;
 - (E) understand concepts of object-oriented design;
 - (F) use local and global scope access variable declarations;
 - (G) encapsulate data and associated subroutines into an abstract data type;
 - (H) create subroutines that do not return values with and without the use of arguments and parameters;

- (I) create subroutines that return typed values with and without the use of arguments and parameters;
- (J) understand and identify the data-binding process between arguments and parameters;
- (K) compare objects using reference values and a comparison routine;
- (L) understand the binary representation of numeric and nonnumeric data in computer systems;
- (M) understand the finite limits of numeric data;
- (N) perform numerical conversions between the decimal and binary number systems and count in the binary number system;
- (O) choose, identify, and use the appropriate data types for integer, real, and Boolean data when writing program solutions;
- (P) demonstrate an understanding of the concept of a variable;
- (Q) demonstrate an understanding of and use reference variables for objects;
- (R) demonstrate an understanding of how to represent and manipulate text data, including concatenation and other string functions;
- (S) demonstrate an understanding of the concept of scope;
- (T) identify and use the structured data type of one-dimensional arrays to traverse, search, and modify data;
- (U) choose, identify, and use the appropriate data type and structure to properly represent the data in a program problem solution; and
- (V) compare and contrast strongly typed and un-typed programming languages.

§130.422. Computer Science II (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Algebra I and either Computer Science I or Fundamentals of Computer Science. This course is recommended for students in Grades 11 and 12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Computer Science II will foster students' creativity and innovation by presenting opportunities to design, implement, and present meaningful programs through a variety of media. Students will collaborate with one another, their instructor, and various electronic communities to solve the problems presented throughout the course. Through data analysis, students will identify task requirements, plan search strategies, and use computer science concepts to access, analyze, and evaluate information needed to solve problems. By using computer science knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will gain an understanding of computer science through the study of technology operations, systems, and concepts. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking;

problem solving, and decision making; digital citizenship; and technology operations and concepts.

(4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.

(5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.

(c) Knowledge and skills.

(1) Creativity and innovation. The student develops products and generates new understandings by extending existing knowledge. The student is expected to:

(A) use program design problem-solving strategies to create program solutions;

(B) demonstrate the ability to read and modify large programs, including the design description and process development;

(C) follow the systematic problem-solving process of identifying the specifications of purpose and goals, the data types and objects needed, and the subtasks to be performed;

(D) compare and contrast design methodologies and implementation techniques such as top-down, bottom-up, and black box;

(E) analyze, modify, and evaluate existing code by performing a case study on a large program, including inheritance and black box programming;

(F) identify the data types and objects needed to solve a problem;

(G) choose, identify, and use the appropriate abstract data type, advanced data structure, and supporting algorithms to properly represent the data in a program problem solution;

(H) use object-oriented programming development methodology, data abstraction, encapsulation with information hiding, and procedural abstraction in program development and testing; and

(I) create, edit, and manipulate bitmap images that are used to enhance user interfaces and program functionality.

(2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:

(A) use the principles of software engineering to work in software design teams, break a problem statement into specific solution requirements, create a program development plan, code part of a solution from a program development plan while a partner codes the remaining part, team test the solution for correctness, and develop presentations to report the solution findings;

(B) create interactive console display interfaces with appropriate user prompts;

(C) create interactive human interfaces to acquire data from a user and display program results using an advanced Graphical User Interface (GUI);

(D) write programs and communicate with proper programming style to enhance the readability and functionality of the code by using meaningful descriptive identifiers, internal comments, white space, indentation, and a standardized program style;

(E) improve data display by optimizing data visualization;

(F) display simple vector graphics to interpret and display program results; and

(G) display simple bitmap images.

(3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:

- (A) use local area networks (LANs) and wide area networks (WANs), including the Internet and intranets, in research, file management, and collaboration;
 - (B) understand programming file structure and file access for required resources;
 - (C) acquire and process information from text files, including files of known and unknown sizes;
 - (D) manipulate data structures using string processing;
 - (E) manipulate data values by casting between data types;
 - (F) identify and use the structured data type of one-dimensional arrays to traverse, search, modify, insert, and delete data;
 - (G) identify and use the structured data type of two-dimensional arrays to traverse, search, modify, insert, and delete data; and
 - (H) identify and use a list object data structure to traverse, search, insert, and delete data.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
- (A) develop sequential algorithms using branching control statements, including nested structures, to create solutions to decision-making problems;
 - (B) develop choice algorithms using selection control statements based on ordinal values;
 - (C) demonstrate proficiency in the use of short-circuit evaluation;
 - (D) demonstrate proficiency in the use of Boolean algebra, including De Morgan's Law;
 - (E) develop iterative algorithms using nested loops;
 - (F) identify, trace, and appropriately use recursion in programming solutions, including algebraic computations;
 - (G) design, construct, evaluate, and compare search algorithms, including linear searching and binary searching;
 - (H) identify, describe, design, create, evaluate, and compare standard sorting algorithms, including selection sort, bubble sort, insertion sort, and merge sort;
 - (I) measure time/space efficiency of various sorting algorithms;
 - (J) compare and contrast search and sort algorithms, including linear, quadratic, and recursive strategies, for time/space efficiency;
 - (K) analyze algorithms using "big-O" notation for best, average, and worst-case data patterns;
 - (L) develop algorithms to solve various problems, including factoring, summing a series, finding the roots of a quadratic equation, and generating Fibonacci numbers;
 - (M) test program solutions by investigating boundary conditions; testing classes, methods, and libraries in isolation; and performing stepwise refinement;
 - (N) identify and debug compile, syntax, runtime, and logic errors;
 - (O) compare and contrast algorithm efficiency by using informal runtime comparisons, exact calculation of statement execution counts, and theoretical efficiency values using "big-O" notation, including worst-case, best-case, and average-case time/space analysis;
 - (P) demonstrate the ability to count, convert, and perform mathematical operations in the binary and hexadecimal number systems;
 - (Q) demonstrate knowledge of the maximum integer boundary, minimum integer boundary, imprecision of real number representations, and round-off errors;

- (R) create program solutions to problems using the mathematics library class;
 - (S) use random algorithms to create simulations that model the real world;
 - (T) identify, understand, and create class specifications and relationships among classes, including composition and inheritance relationships;
 - (U) understand and explain object relationships among defined classes, abstract classes, and interfaces;
 - (V) create object-oriented definitions using class declarations, variable declarations, constant declarations, method declarations, parameter declarations, and interface declarations;
 - (W) create robust classes that encapsulate data and the methods that operate on that data and incorporate overloading to enrich the object's behavior;
 - (X) design and implement a set of interactive classes;
 - (Y) design, create, and evaluate multiclass programs that use abstract classes and interfaces;
 - (Z) understand and implement a student-created class hierarchy;
 - (AA) extend, modify, and improve existing code using inheritance;
 - (BB) create adaptive behaviors, including overloading, using polymorphism;
 - (CC) understand and use reference variables for object and string data types;
 - (DD) understand and implement access scope modifiers;
 - (EE) understand and demonstrate how to compare objects;
 - (FF) duplicate objects using the appropriate deep and/or shallow copy;
 - (GG) define and implement abstract classes and interfaces in program problem solutions;
 - (HH) apply functional decomposition to a program solution;
 - (II) create simple and robust objects from class definitions through instantiation;
 - (JJ) apply class membership of variables, constants, and methods;
 - (KK) examine and mutate the properties of an object using accessors and modifiers;
 - (LL) understand and implement a composite class; and
 - (MM) design and implement an interface.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) model ethical acquisition and use of digital information;
 - (B) demonstrate proper digital etiquette, responsible use of software, and knowledge of acceptable use policies; and
 - (C) investigate digital rights management.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
- (A) compare and contrast types of operating systems, software applications, hardware platforms, and programming languages;
 - (B) demonstrate knowledge of major hardware components, including primary and secondary memory, a central processing unit (CPU), and peripherals;
 - (C) demonstrate knowledge of major networking components, including hosts, servers, switches, and routers;

- (D) demonstrate knowledge of computer communication systems, including single-user, peer-to-peer, workgroup, client-server, and networked;
- (E) demonstrate knowledge of computer addressing systems, including Internet Protocol (IP) address and Media Access Control (MAC) address; and
- (F) differentiate among the categories of programming languages, including machine, assembly, high-level compiled, high-level interpreted, and scripted.

§130.423. Computer Science III (One Credit).

(a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Computer Science II, Advanced Placement (AP) Computer Science A, or International Baccalaureate (IB) Computer Science. This course is recommended for students in Grades 11 and 12.

(b) Introduction.

- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
- (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
- (3) Computer Science III will foster students' creativity and innovation by presenting opportunities to design, implement, and present meaningful programs through a variety of media. Students will collaborate with one another, their instructor, and various electronic communities to solve the problems presented throughout the course. Through data analysis, students will identify task requirements, plan search strategies, and use computer science concepts to access, analyze, and evaluate information needed to solve problems. By using computer science knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will gain an understanding of advanced computer science data structures through the study of technology operations, systems, and concepts. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
- (4) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (5) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.

(c) Knowledge and skills.

- (1) Creativity and innovation. The student develops products and generates new understandings by extending existing knowledge. The student is expected to:
 - (A) apply data abstraction and encapsulation to manage complexity;
 - (B) implement a student-created class hierarchy;
 - (C) read and write class specifications using visual organizers, including Unified Modeling Language;
 - (D) use black box programming methodology;
 - (E) design, create, and use interfaces to apply protocols;
 - (F) identify, describe, design, create, evaluate, and compare standard sorting algorithms that perform sorting operations on data structures, including quick sort and heap sort;

- (G) select, identify, and use the appropriate abstract data type, advanced data structure, and supporting algorithms to properly represent the data in a program problem solution; and
 - (H) manage complexity by using a systems approach.
- (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
- (A) use local area networks (LANs) and wide area networks (WANs), including the Internet and intranets, in research, file management, and collaboration;
 - (B) create interactive human interfaces to acquire data from a user and display program results using an advanced Graphical User Interface (GUI);
 - (C) write programs and communicate with proper programming style to enhance the readability and functionality of the code by using meaningful descriptive identifiers, internal comments, white space, indentation, and a standardized program style; and
 - (D) work in software design teams.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
- (A) identify and use the structured data type of arrays of objects to traverse, search, modify, insert, and delete data;
 - (B) identify and use two-dimensional ragged arrays to traverse, search, modify, insert, and delete data;
 - (C) identify and use a list object data structure, including vector, to traverse, search, insert, and delete object data;
 - (D) understand and trace a linked-list data structure;
 - (E) create program solutions using a linked-list data structure, including unordered single, ordered single, double, and circular linked;
 - (F) understand composite data structures, including a linked list of linked lists;
 - (G) understand and create program solutions using stacks, queues, trees, heaps, priority queues, graph theory, and enumerated data types;
 - (H) understand and create program solutions using sets, including HashSet and TreeSet;
 - (I) understand and create program solutions using maps, including HashMap and TreeMap; and
 - (J) write and modify text file data.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
- (A) develop choice algorithms using selection control statements, including break, label, and continue;
 - (B) demonstrate proficiency in the use of the bitwise operators;
 - (C) develop iterative algorithms using do-while loops;
 - (D) demonstrate proficiency in the use of the ternary operator;
 - (E) create program solutions that use iterators;
 - (F) identify, trace, and appropriately use recursion;
 - (G) understand and create program solutions using hashing;
 - (H) perform pattern recognition using regular expressions;

- (I) explore common algorithms, including matrix addition and multiplication, fractals, Towers of Hanoi, and magic square;
 - (J) create program solutions that exhibit robust behavior by understanding and avoiding runtime errors and handling anticipated errors;
 - (K) understand object-oriented design concepts of inner classes, outer classes, and anonymous classes;
 - (L) use object reference scope identifiers, including null, this, and super;
 - (M) provide object functionality to primitive data types;
 - (N) write program assumptions in the form of assertions;
 - (O) write a Boolean expression to test a program assertion; and
 - (P) construct assertions to make explicit program invariants.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) model ethical acquisition and use of digital information; and
 - (B) demonstrate proper digital etiquette, responsible use of software, and knowledge of acceptable use policies.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
- (A) compare and contrast high-level programming languages;
 - (B) create a small workgroup network;
 - (C) create and apply a basic network addressing scheme; and
 - (D) create discovery programs in a low-level language, high-level language, and scripting language.

§130.424. Digital Forensics (One Credit), Beginning with School Year 2019-2020.

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Digital forensics is an evolving discipline concerned with analyzing anomalous activity on computers, networks, programs, and data. As a discipline, it has grown with the emergence of a globally-connected digital society. As computing has become more sophisticated, so too have the abilities of malicious agents to access systems and private information. By evaluating prior incidents, digital forensics professionals have the ability to investigate and craft appropriate responses to disruptions to corporations, governments, and individuals. Whereas cybersecurity takes a proactive approach to information assurance to minimize harm, digital forensics takes a reactive approach to incident response.
 - (4) Digital Forensics introduces students to the knowledge and skills of digital forensics. The course provides a survey of the field of digital forensics and incident response.

- (5) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (6) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Employability skills. The student identifies necessary skills for career development and employment opportunities. The student is expected to:
 - (A) investigate the need for digital forensics;
 - (B) research careers in digital forensics along with the education and job skills required for obtaining a job in both the public and private sector;
 - (C) identify job and internship opportunities as well as accompanying duties and tasks;
 - (D) identify and discuss certifications for digital forensics careers;
 - (E) explain ethical and legal responsibilities in relation to the field of digital forensics;
 - (F) identify and describe businesses and government agencies that use digital forensics;
 - (G) identify and describe the kinds of crimes investigated by digital forensics specialists; and
 - (H) solve problems and think critically.
 - (2) Employability skills. The student communicates and collaborates effectively. The student is expected to:
 - (A) apply effective teamwork strategies;
 - (B) collaborate with a community of peers and professionals;
 - (C) create, review, and edit a report summarizing technical findings; and
 - (D) present technical information to a non-technical audience.
 - (3) Ethics and laws. The student recognizes and analyzes ethical and current legal standards, rights, and restrictions related to digital forensics. The student is expected to:
 - (A) develop a plan to advocate for ethical and legal behaviors both online and offline among peers, family, community, and employers;
 - (B) research local, state, national, and international law such as the Electronic Communications Privacy Act of 1986, Title III (Pen Register Act); USA PATRIOT Act of 2001; and Digital Millennium Copyright Act;
 - (C) research historic cases or events regarding digital forensics or cyber;
 - (D) examine ethical and legal behavior when presented with confidential or sensitive information in various scenarios related to cyber activities;
 - (E) analyze case studies of computer incidents;
 - (F) use the findings of a computer incident investigation to reconstruct the incident;
 - (G) identify and discuss intellectual property laws, issues, and use;
 - (H) contrast legal and illegal aspects of information gathering;
 - (I) contrast ethical and unethical aspects of information gathering;
 - (J) analyze emerging legal and societal trends affecting digital forensics; and
 - (K) discuss how technological changes affect applicable laws.

- (4) Digital citizenship. The student understands and demonstrates the social responsibility of end users regarding digital technology, safety, digital hygiene, and cyberbullying. The student is expected to:
- (A) identify and use digital information responsibly;
 - (B) use digital tools responsibly;
 - (C) identify and use valid and reliable sources of information; and
 - (D) gain informed consent prior to investigating incidents.
- (5) Digital forensics skills. The student locates, processes, analyzes, and organizes data. The student is expected to:
- (A) identify sources of data;
 - (B) analyze and report data collected;
 - (C) maintain data integrity;
 - (D) examine metadata of a file; and
 - (E) examine how multiple data sources can be used for digital forensics, including investigating malicious software (malware) and email threats.
- (6) Digital forensics skills. The student understands software concepts and operations as they apply to digital forensics. The student is expected to:
- (A) compare software applications as they apply to digital forensics;
 - (B) describe the purpose of various application types such as email, web, file sharing, security applications, and data concealment tools;
 - (C) identify the different purposes of data formats such as pdf, wav, jpeg, and exe;
 - (D) describe how application logs and metadata are used for investigations;
 - (E) describe digital forensics tools;
 - (F) select the proper software tool based on appropriateness, effectiveness, and efficiency for a given digital forensics scenario; and
 - (G) describe components of applications such as configurations settings, data, supporting files, and user interface.
- (7) Digital forensics skills. The student understands operating systems concepts and functions as they apply to digital forensics. The student is expected to:
- (A) compare various operating systems;
 - (B) describe file attributes, including access and creation times;
 - (C) describe how operating system logs are used for investigations;
 - (D) compare and contrast the file systems of various operating systems;
 - (E) compare various primary and secondary storage devices; and
 - (F) differentiate between volatile and non-volatile memory.
- (8) Digital forensics skills. The student understands networking concepts and operations as they apply to digital forensics. The student is expected to:
- (A) examine networks, including Internet Protocol (IP) addressing and subnets;
 - (B) describe the Open Systems Interconnection (OSI) model;
 - (C) describe the Transmission Control Protocol/Internet Protocol (TCP/IP) model;

- (D) use network forensic analysis tools to examine network traffic data from sources such as firewalls, routers, intrusion detection systems (IDS), and remote access logs; and
 - (E) identify malicious or suspicious network activities such as mandatory access control (MAC) spoofing and rogue wireless access points.
- (9) Digital forensics skills. The student explains the principles of access controls. The student is expected to:
- (A) define the principle of least privilege;
 - (B) describe the impact of granting access and permissions;
 - (C) identify different access components such as passwords, tokens, key cards, and biometric verification systems;
 - (D) explain the value of an access log to identify suspicious activity;
 - (E) describe the risks of granting third parties access to personal and proprietary data on social media and systems;
 - (F) describe the risks involved with accepting Terms of Service (ToS) or End User License Agreements (EULA) without a basic understanding of the terms or agreements; and
 - (G) identify various access control methods such as MAC, role-based access control (RBAC), and discretionary access control (DAC).
- (10) Incident response. The student follows a methodological approach to prepare for and respond to an incident. The student is expected to:
- (A) define the components of the incident response cycle, including preparation; detection and analysis; containment, eradication, and recovery; and post-incident activity;
 - (B) describe incident response preparation;
 - (C) discuss incident response detection and analysis;
 - (D) discuss containment and eradication of and recovery from an incident;
 - (E) describe post-incident activities such as reflecting on lessons learned, using collected incident data, and retaining evidence of an incident;
 - (F) develop an incident response plan; and
 - (G) describe ways a user may compromise the validity of existing evidence.
- (11) Incident response. The student objectively analyzes collected data from an incident. The student is expected to:
- (A) identify the role of chain of custody in digital forensics;
 - (B) describe safe data handling procedures;
 - (C) explain the fundamental concepts of confidentiality, integrity, availability, authentication, and authorization;
 - (D) identify and report information conflicts or suspicious activity;
 - (E) identify events of interest and suspicious activity by examining network traffic; and
 - (F) identify events of interest and suspicious activity by examining event logs.
- (12) Incident response. The student analyzes the various ways systems can be compromised. The student is expected to:
- (A) analyze the different signatures of cyberattacks; and
 - (B) identify points of weakness and attack vectors such as online spoofing, phishing, and social engineering.

§130.425. Discrete Mathematics for Computer Science (One Credit), Beginning with School Year 2012-2013.

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Algebra II. This course is recommended for students in Grades 11 and 12.
- (b) Introduction.
- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Discrete Mathematics for Computer Science provides the tools used in most areas of computer science. Exposure to the mathematical concepts and discrete structures presented in this course is essential in order to provide an adequate foundation for further study. Discrete Mathematics for Computer Science is generally listed as a core requirement for Computer Science majors. Course topics are divided into six areas: sets, functions, and relations; basic logic; proof techniques; counting basics; graphs and trees; and discrete probability. Mathematical topics are interwoven with computer science applications to enhance the students' understanding of the introduced mathematics. Students will develop the ability to see computational problems from a mathematical perspective. Introduced to a formal system (propositional and predicate logic) upon which mathematical reasoning is based, students will acquire the necessary knowledge to read and construct mathematical arguments (proofs), understand mathematical statements (theorems), and use mathematical problem-solving tools and strategies. Students will be introduced to discrete data structures such as sets, discrete functions, and relations and graphs and trees. Students will also be introduced to discrete probability and expectations. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Creativity and innovation. The student develops products and generates new understanding by extending existing knowledge. The student is expected to:
 - (A) model algorithms and real-world situations using formal tools of symbolic logic;
 - (B) model computer science problems by using graphs and trees; and
 - (C) calculate the probabilities of events and expectations of random variables for such problems as games of chance.
 - (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
 - (A) convert spoken language statements to appropriate statements in propositional logic;
 - (B) explain basic terminology of sets, functions, and relations;
 - (C) state the definition of the Master theorem;
 - (D) use the context of a particular application to interpret the meaning derived when computing the permutations and combinations of a set;
 - (E) interpret associated operations and terminology in context; and

- (F) define and provide examples of logical equivalence, normal forms, validity, and modus ponens/modus tollens.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
- (A) construct truth tables for negation, conjunction, disjunction, implication, biconditional, and bit operators; and
- (B) use truth tables to demonstrate propositional relations.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
- (A) analyze practical examples using appropriate models of sets, functions, and relations;
- (B) compare and contrast tautology, contradiction, and contingency as related to propositional equivalences;
- (C) compare and contrast examples and use of counterexamples, contrapositions, and contradictions;
- (D) describe the appropriate use and limitations of predicate logic;
- (E) apply formal methods of symbolic propositional and predicate logic;
- (F) use formal logic proofs and logical reasoning to solve problems;
- (G) outline the basic structure of proofs, including direct, indirect, contradiction, induction, existence, and constructive proofs;
- (H) compare and contrast the types of problems best satisfied by direct, indirect, contradiction, induction, existence, and constructive proofs;
- (I) relate mathematical induction to recursion and recursively defined structures;
- (J) compare and contrast weak, strong, and structural induction, including when each is most appropriately used and examples of each;
- (K) compare and contrast dependent and independent events;
- (L) use recurrence equations to analyze algorithms and other practical problems;
- (M) use counting techniques to analyze algorithms and other practical problems;
- (N) apply probability tools to solve problems; and
- (O) define, compare, and contrast simple graphs, multigraphs, and directed and undirected graphs using definitions, properties, and examples, including special cases.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) model ethical acquisition and use of digital information;
- (B) demonstrate proper digital etiquette, responsible use of software, and knowledge of acceptable use policies; and
- (C) investigate how the concepts of discrete mathematics are related to relevant problems and significant questions.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
- (A) perform operations associated with sets, functions, and relations;
- (B) apply basic counting principles, including cardinality and the pigeonhole principle;
- (C) apply appropriate precedence when using logical operators;

- (D) use appropriate strategies, including De Morgan's Laws, to identify propositional equivalences;
- (E) identify and appropriately use predicates, existential and universal quantifiers, and valid arguments;
- (F) identify possible applications of proofs, including evaluating algorithmic complexity;
- (G) state and appropriately use the product and sum rules;
- (H) compute permutations and combinations of a set;
- (I) solve a variety of basic recurrence equations;
- (J) apply the binomial theorem to independent events;
- (K) apply Bayes' theorem to dependent events;
- (L) demonstrate transversal methods for trees and graphs; and
- (M) relate graphs and trees to data structures, algorithms, and counting.

§130.426. Game Programming and Design (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Algebra I. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Game Programming and Design will foster student creativity and innovation by presenting students with opportunities to design, implement, and present meaningful programs through a variety of media. Students will collaborate with one another, their instructor, and various electronic communities to solve gaming problems. Through data analysis, students will include the identification of task requirements, plan search strategies, and use programming concepts to access, analyze, and evaluate information needed to design games. By acquiring programming knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will create a computer game that is presented to an evaluation panel. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student develops products and generates new understanding by extending existing knowledge. The student is expected to:
 - (A) understand the basic game design elements, including conceptual ideas, storyline, visualization, storyboard, game effects, sound elements, game play, game controls, and player tutorial;

- (B) create a design concept document;
 - (C) create a storyboard;
 - (D) demonstrate an understanding of the fundamentals of game art, including the look and feel, graphics coordinate system, basics of color, and color palettes;
 - (E) use bitmap graphics images, including designing, creating, reading, and manipulating images;
 - (F) create backgrounds, including solid, image, and tiled backgrounds;
 - (G) write programs creating images using geometric shapes;
 - (H) create games using sprites by evaluating the role of sprites, creating sprites, and managing sprites;
 - (I) create programs using sprite sheets;
 - (J) demonstrate an understanding of image rendering, including transparency, refresh rate, hardware acceleration, and animation;
 - (K) find, create, and edit game audio sound effects and music; and
 - (L) implement game sound mechanics, including playing, pausing, and looping.
- (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
- (A) design and implement procedures to set timelines for, track the progress of, and evaluate a game product;
 - (B) seek and respond to input from peers and professionals in evaluating a game project;
 - (C) demonstrate knowledge and appropriate use of operating systems, program development tools, and networking resources;
 - (D) use network resources to acquire, organize, maintain, and evaluate information;
 - (E) collaborate to research the business of games, including the roles of developer, marketing, publisher, and retail sales; and
 - (F) demonstrate an understanding of and evaluate online technology, including online interaction and massive multiplayer games.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
- (A) play board games to research and collect game play data;
 - (B) evaluate, analyze, and document game styles and playability; and
 - (C) research the dramatic elements in games, including kinds of fun, player types, and nonlinear storytelling.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
- (A) demonstrate an understanding of the game design process, including generating ideas, brainstorming, and paper prototyping;
 - (B) write programs using variables of different data types;
 - (C) evaluate game rules and instructions;
 - (D) demonstrate an understanding of the user experience by comparing rules and game-play patterns;
 - (E) write game rules and instructions;

- (F) develop game software;
 - (G) write computer game code, resolve game defects, and revise existing game code; and
 - (H) test a finished game product by implementing sound testing techniques.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) explore intellectual property, privacy, sharing of information, copyright laws, and software licensing agreements;
 - (B) model ethical acquisition and use of digital information;
 - (C) demonstrate proper digital etiquette when using networks, responsible use of software, and knowledge of acceptable use policies;
 - (D) model respect of intellectual property, including manipulating graphics, morphing graphics, editing graphics, and editing sound;
 - (E) discuss and evaluate the social issues surrounding gaming; and
 - (F) evaluate the cultural aspects of game design fundamentals, including rationale for games and types of games.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to game programming. The student is expected to:
- (A) identify basic game components, including the game engine, game play subsystems, data structures, models, and interfaces;
 - (B) generate random numbers in a program;
 - (C) create a program implementing conditional statements;
 - (D) develop an appropriate data model;
 - (E) demonstrate an understanding of and apply object-oriented game programming;
 - (F) demonstrate an understanding of game programming essentials, including event-driven programming, communicating with messages, and device management;
 - (G) demonstrate an understanding of the role of game events, the animation loop, and game timing;
 - (H) demonstrate an understanding of the role of game engines;
 - (I) demonstrate an understanding of video display flicker and double buffering;
 - (J) apply basic game screen design and layout, including visual controls, user interfaces, menus, and options;
 - (K) use game control design to understand, access, and control input devices, including keyboard, mouse, and joystick;
 - (L) demonstrate an understanding of and apply game animation, including the principles of animation and frame-based animation;
 - (M) demonstrate an understanding of decision making and types of decisions;
 - (N) demonstrate an understanding of game events, including listeners, triggers, and timed events;
 - (O) demonstrate an understanding of and implement collision detection, including bounding boxes and sprite collisions;
 - (P) implement a tile-based game, including loading tile maps, drawing tile maps, rendering a tile map, and layering sprites;

- (Q) demonstrate an understanding of artificial intelligence and develop and implement artificial intelligence;
- (R) demonstrate an understanding of game balance and tuning; and
- (S) demonstrate an understanding of player progression, including leveling, linear progression, and maintaining high score data.

§130.427. Mobile Application Development (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Prerequisite: Algebra I. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Mobile Application Development will foster students' creativity and innovation by presenting opportunities to design, implement, and deliver meaningful projects using mobile computing devices. Students will collaborate with one another, their instructor, and various electronic communities to solve problems presented throughout the course. Through data analysis, students will identify task requirements, plan search strategies, and use software development concepts to access, analyze, and evaluate information needed to program mobile devices. By using software design knowledge and skills that support the work of individuals and groups in solving problems, students will select the technology appropriate for the task, synthesize knowledge, create solutions, and evaluate the results. Students will learn digital citizenship by researching current laws and regulations and by practicing integrity and respect. Students will gain an understanding of the principles of mobile application development through the study of development platforms, programming languages, and software design standards. The six strands include creativity and innovation; communication and collaboration; research and information fluency; critical thinking; problem solving, and decision making; digital citizenship; and technology operations and concepts.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) Creativity and innovation. The student develops products and generates new understanding by extending existing knowledge. The student is expected to:
 - (A) create effective user interfaces appropriate for a specified mobile device that is best suited for an identified purpose;
 - (B) create effective user interfaces for browser-based, native, and hybrid mobile applications;
 - (C) create mobile application components appropriate for identified needs;
 - (D) create browser-based applications for mobile devices;
 - (E) create native applications that can reside on specified mobile devices; and
 - (F) create mobile applications that combine native and hybrid components.

- (2) Communication and collaboration. The student communicates and collaborates with peers to contribute to his or her own learning and the learning of others. The student is expected to:
- (A) demonstrate an understanding of and discuss how teams function;
 - (B) use teamwork to solve problems;
 - (C) describe the development workflow of mobile applications;
 - (D) use time-management techniques to develop and maintain work schedules, meet deadlines, and establish mobile application project criteria;
 - (E) describe a problem solution; and
 - (F) document and share problem solutions through various media.
- (3) Research and information fluency. The student locates, analyzes, processes, and organizes data. The student is expected to:
- (A) analyze, identify, and describe mobile application project stakeholders and their perspectives;
 - (B) collect and analyze available data to identify mobile application project requirements;
 - (C) analyze, identify, and describe input, output, and processing requirements; and
 - (D) analyze, identify, and define hardware and software specifications.
- (4) Critical thinking, problem solving, and decision making. The student uses appropriate strategies to analyze problems and design algorithms. The student is expected to:
- (A) compare and contrast design decisions based on the hardware considerations of a mobile device;
 - (B) compare and contrast available mobile technologies, including platforms and their operating systems;
 - (C) compare and contrast available development approaches, including application to specific technologies and platforms;
 - (D) determine the most appropriate solution for the development of a given mobile application, including browser-based, native, and hybrid approaches;
 - (E) compare and contrast available programming languages and how their use might be applied to specific technologies and platforms;
 - (F) identify and justify the selection of an appropriate programming language, including available resources and required interfaces;
 - (G) select an appropriate program development environment;
 - (H) identify and use available libraries;
 - (I) evaluate and justify the selection of appropriate options and components;
 - (J) compare and contrast available networks and their implications for mobile application development; and
 - (K) compare and contrast design strategies related to mobile network and device security.
- (5) Digital citizenship. The student explores and understands safety, legal, cultural, and societal issues relating to the use of technology and information. The student is expected to:
- (A) discuss copyright laws and issues;
 - (B) model ethical acquisition and use of digital information;
 - (C) cite sources using established methods;

- (D) demonstrate proper digital etiquette and knowledge of acceptable use policies;
 - (E) investigate mobile device security measures such as passwords, virus detection, and virus prevention;
 - (F) describe potential risks and benefits associated with the use of a mobile application;
 - (G) identify current and emerging technologies related to mobile applications; and
 - (H) evaluate technologies and assess their applicability to current mobile applications.
- (6) Technology operations and concepts. The student understands technology concepts, systems, and operations as they apply to computer science. The student is expected to:
- (A) demonstrate an understanding of the difference between desktop and mobile applications;
 - (B) demonstrate an understanding of hardware and software structures and requirements in the design of mobile applications;
 - (C) recognize multiple platforms and demonstrate an understanding of their associated requirements;
 - (D) recognize various program development environments;
 - (E) demonstrate an understanding of event-based programming and its appropriate use;
 - (F) describe how memory management affects mobile application design;
 - (G) demonstrate an understanding of how low bandwidth and the mobility of a device affect the design of mobile applications;
 - (H) identify applications that are best suited for mobile devices;
 - (I) demonstrate an understanding of the use of libraries when designing mobile applications;
 - (J) use a simulation tool to emulate a mobile device's functionality; and
 - (K) use actual mobile devices to test mobile applications.

§130.428. Foundations of Cybersecurity (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 9-12.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Cybersecurity is an evolving discipline concerned with safeguarding computers, networks, programs, and data from unauthorized access. As a field, it has gained prominence with the emergence of a globally-connected society. As computing has become more sophisticated, so too have the abilities of malicious agents looking to penetrate networks and seize private information. By evaluating prior incidents, cybersecurity professionals have the ability to craft appropriate responses to minimize disruptions to corporations, governments, and individuals.
 - (4) In the Foundations of Cybersecurity course, students will develop the knowledge and skills needed to explore fundamental concepts related to the ethics, laws, and operations of cybersecurity. Students will examine trends and operations of cyberattacks, threats, and vulnerabilities. Students will review and explore security policies designed to mitigate risks. The skills obtained in this course prepare students for additional study in cybersecurity. A variety of courses are available to

students interested in this field. Foundations of Cybersecurity may serve as an introductory course in this field of study.

- (5) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
- (6) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.

(c) Knowledge and skills.

- (1) Employability skills. The student demonstrates necessary skills for career development and successful completion of course outcomes. The student is expected to:
 - (A) identify and demonstrate employable work behaviors such as regular attendance, punctuality, maintenance of a professional work environment, and effective written and verbal communication;
 - (B) identify and demonstrate positive personal qualities such as authenticity, resilience, initiative, and a willingness to learn new knowledge and skills;
 - (C) solve problems and think critically;
 - (D) demonstrate leadership skills and function effectively as a team member; and
 - (E) demonstrate an understanding of ethical and legal responsibilities in relation to the field of cybersecurity.
- (2) Employability skills. The student identifies various employment opportunities and requirements in the cybersecurity field. The student is expected to:
 - (A) identify job and internship opportunities as well as accompanying duties and tasks;
 - (B) research careers in cybersecurity and information assurance along with the education and job skills required for obtaining a job in both the public and private sectors;
 - (C) identify and discuss certifications for cybersecurity-related careers; and
 - (D) research and develop resumes, digital portfolios, or professional profiles in the cybersecurity field.
- (3) Ethics and laws. The student understands ethical and current legal standards, rights and restrictions governing technology, technology systems, digital media, and the use of social media. The student is expected to:
 - (A) demonstrate and advocate for ethical and legal behaviors both online and offline among peers, family, community, and employers;
 - (B) research local, state, national, and international cyber law such as the PATRIOT Act of 2001, General Data Protection Regulation, and Digital Millennium Copyright Act;
 - (C) research historic cases or events regarding cyber;
 - (D) demonstrate an understanding of ethical and legal behavior when presented with various scenarios related to cyber activities;
 - (E) define and identify techniques such as hacking, phishing, social engineering, online piracy, spoofing, and data vandalism; and
 - (F) identify and use appropriate methods for citing sources.
- (4) Ethics and laws. The student identifies the consequences of ethical versus malicious hacking. The student is expected to:
 - (A) identify motivations for hacking;

- (B) identify and describe the impact of cyberattacks on the global community, society, and individuals;
 - (C) distinguish between a cyber attacker and a cyber defender;
 - (D) differentiate types of hackers such as black hats, white hats, and gray hats;
 - (E) determine possible outcomes and legal ramifications of ethical versus malicious hacking practices; and
 - (F) debate the varying perspectives of ethical versus malicious hacking.
- (5) Ethics and laws. The student identifies and defines cyberterrorism and counterterrorism. The student is expected to:
- (A) define cyberterrorism, state-sponsored cyberterrorism, and hacktivism;
 - (B) compare and contrast physical terrorism and cyberterrorism, including domestic and foreign actors;
 - (C) define and explain intelligence gathering and counterterrorism;
 - (D) identify the role of cyber defenders in protecting national interests and corporations;
 - (E) identify the role of cyber defense in society and the global economy; and
 - (F) explain the importance of protecting public infrastructures such as electrical power grids, water systems, pipelines, transportation, and nuclear plants.
- (6) Digital citizenship. The student understands and demonstrates the social responsibility of end users regarding significant issues related to digital technology, digital hygiene, and cyberbullying. The student is expected to:
- (A) identify and understand the nature and value of privacy;
 - (B) analyze the positive and negative implications of a digital footprint and the maintenance and monitoring of an online presence;
 - (C) discuss the role and impact of technology on privacy;
 - (D) identify the signs, emotional effects, and legal consequences of cyberbullying and cyberstalking; and
 - (E) identify and discuss effective ways to prevent, deter, and report cyberbullying.
- (7) Cybersecurity skills. The student understands basic cybersecurity concepts and definitions. The student is expected to:
- (A) define information security and cyber defense;
 - (B) identify basic risk management and risk assessment principles related to cybersecurity threats and vulnerabilities;
 - (C) explain the fundamental concepts of confidentiality, integrity, availability, authentication, and authorization;
 - (D) describe the inverse relationship between privacy and security;
 - (E) identify and analyze cybersecurity breaches and incident responses;
 - (F) identify and analyze security concerns in areas such as physical, network, cloud, and web;
 - (G) define and discuss challenges faced by cybersecurity professionals;
 - (H) identify common risks, alerts, and warning signs of compromised computer and network systems;
 - (I) understand and explore the vulnerability of network-connected devices; and

- (J) use appropriate cybersecurity terminology.
- (8) Cybersecurity skills. The student understands and explains various types of malicious software (malware). The student is expected to:
- (A) define malware, including spyware, ransomware, viruses, and rootkits;
 - (B) identify the transmission and function of malware such as Trojans, worms, and viruses;
 - (C) discuss the impact malware has had on the cybersecurity landscape;
 - (D) explain the role of reverse engineering for detecting malware and viruses;
 - (E) compare free and commercial antivirus software alternatives; and
 - (F) compare free and commercial anti-malware software alternatives.
- (9) Cybersecurity skills. The student understands and demonstrates knowledge of techniques and strategies to prevent a system from being compromised. The student is expected to:
- (A) define system hardening;
 - (B) demonstrate basic use of system administration privileges;
 - (C) explain the importance of patching operating systems;
 - (D) explain the importance of software updates;
 - (E) describe standard practices to configure system services;
 - (F) explain the importance of backup files; and
 - (G) research and understand standard practices for securing computers, networks, and operating systems.
- (10) Cybersecurity skills. The student understands basic network operations. The student is expected to:
- (A) identify basic network addressing and devices, including switches and routers;
 - (B) analyze incoming and outgoing rules for traffic passing through a firewall;
 - (C) identify well known ports by number and service provided, including port 22 (ssh), port 80 (http), and port 443 (https);
 - (D) identify commonly exploited ports and services, including ports 20 and 21 (ftp) and port 23 (telnet); and
 - (E) identify common tools for monitoring ports and network traffic.
- (11) Cybersecurity skills. The student identifies standard practices of system administration. The student is expected to:
- (A) define what constitutes a secure password;
 - (B) create a secure password policy, including length, complexity, account lockout, and rotation;
 - (C) identify methods of password cracking such as brute force and dictionary attacks; and
 - (D) examine and configure security options to allow and restrict access based on user roles.
- (12) Cybersecurity skills. The student demonstrates necessary steps to maintain user access on the computer system. The student is expected to:
- (A) identify the different types of user accounts and groups on an operating system;
 - (B) explain the fundamental concepts and standard practices related to access control, including authentication, authorization, and accounting;

- (C) compare methods for single- and dual-factor authentication such as passwords, biometrics, personal identification numbers (PINs), and security tokens;
 - (D) define and explain the purpose of an air-gapped computer; and
 - (E) explain how hashes and checksums may be used to validate the integrity of transferred data.
- (13) Cybersecurity skills. The student explores the field of digital forensics. The student is expected to:
- (A) explain the importance of digital forensics to law enforcement, government agencies, and corporations;
 - (B) identify the role of chain of custody in digital forensics;
 - (C) explain the four steps of the forensics process, including collection, examination, analysis, and reporting;
 - (D) identify when a digital forensics investigation is necessary;
 - (E) identify information that can be recovered from digital forensics investigations such as metadata and event logs; and
 - (F) analyze the purpose of event logs and identify suspicious activity.
- (14) Cybersecurity skills. The student explores the operations of cryptography. The student is expected to:
- (A) explain the purpose of cryptography and encrypting data;
 - (B) research historical uses of cryptography; and
 - (C) review simple cryptography methods such as shift cipher and substitution cipher.
- (15) Risk assessment. The student understands information security vulnerabilities, threats, and computer attacks. The student is expected to:
- (A) define and describe vulnerability, payload, exploit, port scanning, and packet sniffing as they relate to hacking;
 - (B) define and describe cyberattacks, including man-in-the-middle, distributed denial of service, and spoofing;
 - (C) explain how computer vulnerabilities leave systems open to cyberattacks;
 - (D) identify threats to systems such as back-door attacks and insider threats;
 - (E) differentiate types of social engineering attacks such as phishing, shoulder surfing, hoaxes, and dumpster diving;
 - (F) explain how users are the most common vehicle for compromising a system at the application level; and
 - (G) identify various types of application-specific attacks.
- (16) Risk assessment. The student understands, identifies, and explains the strategies and techniques of both ethical and malicious hackers. The student is expected to:
- (A) identify internal and external threats to computer systems;
 - (B) identify the capabilities of vulnerability assessment tools, including open source tools; and
 - (C) explain the concept of penetration testing, tools, and techniques.
- (17) Risk assessment. The student evaluates the risks of wireless networks. The student is expected to:
- (A) compare risks associated with connecting devices to public and private wireless networks;

- (B) explain device vulnerabilities and security solutions on a wireless network;
 - (C) compare wireless encryption protocols;
 - (D) debate the broadcasting or hiding of a wireless service set identifier (SSID); and
 - (E) research and discuss wireless threats such as MAC spoofing and war driving.
- (18) Risk assessment. The student analyzes threats to computer applications. The student is expected to:
- (A) define application security;
 - (B) identify methods of application security such as secure development practices;
 - (C) discuss methods of online spoofing such as web links in email, instant messaging, social media, and other online communication with malicious links;
 - (D) explain the purpose and function of vulnerability scanners;
 - (E) explain how coding errors may create system vulnerabilities; and
 - (F) analyze the risks of distributing insecure programs.
- (19) Risk assessment. The student understands the implications of sharing information and access with others. The student is expected to:
- (A) describe the impact of granting applications unnecessary permissions;
 - (B) describe the risks of granting third parties access to personal and proprietary data on social media and systems; and
 - (C) describe the risks involved with accepting Terms of Service (ToS) or End User License Agreements (EULA) without a basic understanding of the terms or agreements.

§130.429. Cybersecurity Capstone (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 11 and 12. Recommended prerequisite: Foundations of Cybersecurity.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging foundations.
 - (2) The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.
 - (3) Cybersecurity is an evolving discipline concerned with safeguarding computers, networks, programs, and data from unauthorized access. As a field, it has gained prominence with the emergence of a globally-connected society. As computing has become more sophisticated, so too have the abilities of malicious agents looking to penetrate networks and seize private information. By evaluating prior incidents, cybersecurity professionals have the ability to craft appropriate responses to minimize disruptions to corporations, governments, and individuals.
 - (4) In the Cybersecurity Capstone course, students will develop the knowledge and skills needed to explore advanced concepts related to the ethics, laws, and operations of cybersecurity. Students will examine trends and operations of cyberattacks, threats, and vulnerabilities. Students will develop security policies to mitigate risks. The skills obtained in this course prepare students for additional study toward industry certification. A variety of courses are available to students interested in the cybersecurity field. Cybersecurity Capstone may serve as a culminating course in this field of study.

- (5) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
- (6) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) Employability skills. The student demonstrates necessary skills for career development and successful completion of course outcomes. The student is expected to:
- (A) identify and demonstrate employable work behaviors such as regular attendance, punctuality, maintenance of a professional work environment, and effective written and verbal communication;
 - (B) identify and demonstrate positive personal qualities such as authenticity, resilience, initiative, and a willingness to learn new knowledge and skills;
 - (C) solve problems and think critically;
 - (D) demonstrate leadership skills and function effectively as a team member; and
 - (E) demonstrate an understanding of ethical and legal responsibilities in relation to the field of cybersecurity.
- (2) Employability skills. The student identifies various employment opportunities in the cybersecurity field. The student is expected to:
- (A) develop a personal career plan along with the education, job skills, and experience necessary to achieve career goals;
 - (B) develop a resume or a portfolio appropriate to a chosen career plan; and
 - (C) illustrate interview skills for successful job placement.
- (3) Ethics and laws. The student evaluates ethical and current legal standards, rights and restrictions governing technology, technology systems, digital media and information technology, and the use of social media in the context of today's society. The student is expected to:
- (A) analyze and apply to a scenario local, state, national, and international cyber law such as David's Law and Digital Millennium Copyright Act;
 - (B) evaluate historic cases or events regarding cyber; and
 - (C) explore compliance requirements such as Section 508 of the Rehabilitation Act of 1973, Family Educational Rights and Privacy Act of 1974 (FERPA), Health Insurance Portability and Accountability Act of 1996 (HIPAA), and Gramm-Leach-Bliley Act (GLBA).
- (4) Digital citizenship. The student understands and demonstrates the social responsibility of end users regarding significant issues relating to digital technology, safety, digital hygiene, and cyberbullying. The student is expected to:
- (A) debate the relationship between privacy and security; and
 - (B) identify ethical or unethical behavior when presented with various scenarios related to cyber activities.
- (5) Cybersecurity skills. The student explains the importance and process of penetration testing. The student is expected to:
- (A) define the phases of penetration testing, including plan, discover, attack, and report;
 - (B) develop a plan to gain authorization for penetration testing;
 - (C) identify commonly used vulnerability scanning tools such as port scanning, packet sniffing, and password crackers;

- (D) develop a list of exploits based on results of scanning tool reports; and
- (E) prioritize a list of mitigations based on results of scanning tool reports.
- (6) Cybersecurity skills. The student understands common cryptographic methods. The student is expected to:
 - (A) evaluate symmetric and asymmetric algorithms such as substitution cipher, Advanced Encryption Standard (AES), Diffie-Hellman, and Rivest-Shamir-Adleman (RSA);
 - (B) explain the purpose of hashing algorithms, including blockchain;
 - (C) explain the function of password salting;
 - (D) explain and create a digital signature; and
 - (E) explain steganography.
- (7) Cybersecurity skills. The student understands the concept of cyber defense. The student is expected to:
 - (A) explain the purpose of establishing system baselines;
 - (B) evaluate the role of physical security;
 - (C) evaluate the functions of network security devices such as firewalls, intrusion detection systems (IDS), intrusion prevention systems (IPS), and intrusion detection prevention systems (IDPS);
 - (D) analyze log files for anomalies; and
 - (E) develop a plan demonstrating the concept of defense in depth.
- (8) Cybersecurity skills. The student demonstrates an understanding of secure network design. The student is expected to:
 - (A) explain the benefits of network segmentation, including sandboxes, air gaps, and virtual local area networks (VLAN);
 - (B) investigate the role of software-managed networks, including virtualization;
 - (C) discuss the role of honeypots and honeynets in networks; and
 - (D) create an incoming and outgoing network policy for a firewall.
- (9) Cybersecurity skills. The student integrates principles of digital forensics. The student is expected to:
 - (A) identify cyberattacks by their signatures;
 - (B) explain proper data acquisition;
 - (C) examine evidence from devices for suspicious activities; and
 - (D) research current cybercrime cases involving digital forensics.
- (10) Cybersecurity skills. The student explores emerging technology. The student is expected to:
 - (A) describe the integration of artificial intelligence and machine learning in cybersecurity;
 - (B) investigate impacts made by predictive analytics on cybersecurity; and
 - (C) research other emerging trends such as augmented reality and quantum computing.
- (11) Cybersecurity skills. The student uses various operating system environments. The student is expected to:
 - (A) issue commands via the command line interface (CLI) such as ls, cd, pwd, cp, mv, chmod, ps, sudo, and passwd;

- (B) describe the file system structure for multiple operating systems;
 - (C) manipulate and edit files within the CLI; and
 - (D) determine network status using the CLI with commands such as ping, ifconfig/ipconfig, traceroute/tracert, and netstat.
- (12) Cybersecurity skills. The student clearly and effectively communicates technical information. The student is expected to:
- (A) collaborate with others to create a technical report;
 - (B) create, review, and edit a report summarizing technical findings; and
 - (C) present technical information to a non-technical audience.
- (13) Risk assessment. The student analyzes various types of threats, attacks, and vulnerabilities. The student is expected to:
- (A) differentiate types of attacks, including operating systems, software, hardware, network, physical, social engineering, and cryptographic;
 - (B) explain blended threats such as combinations of software, hardware, network, physical, social engineering, and cryptographic;
 - (C) discuss risk response techniques, including accept, transfer, avoid, and mitigate;
 - (D) develop a plan of preventative measures to address cyberattacks;
 - (E) describe common web vulnerabilities such as cross-site scripting, buffer overflow, injection, spoofing, and denial of service;
 - (F) describe common data destruction and media sanitation practices such as wiping, shredding, and degaussing; and
 - (G) develop an incident response plan for a given scenario or recent attack.
- (14) Risk assessment. The student understands risk management processes and concepts. The student is expected to:
- (A) describe various access control methods such as mandatory access control (MAC), role-based access control (RBAC), and discretionary access control (DAC);
 - (B) develop and defend a plan for multi-factor access control using components such as biometric verification systems, key cards, tokens, and passwords; and
 - (C) review a disaster recovery plan (DRP) that includes backups, redundancies, system dependencies, and alternate sites.
- (15) Risk assessment. The student investigates the role and effectiveness of environmental controls. The student is expected to:
- (A) explain commonly used physical security controls, including lock types, fences, barricades, security doors, and mantraps; and
 - (B) describe the role of embedded systems such as fire suppression; heating, ventilation, and air conditioning (HVAC) systems; security alarms; and video monitoring.

§130.430. Advanced Placement (AP) Computer Science A (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. Recommended prerequisites: Algebra I or a student should be comfortable with functions and the concepts found in the uses of functional notation such as $f(x) = x + 2$ and $f(x) = g(h(x))$.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Computer Science A are prescribed in the College Board Publication Advanced Placement Course Description: Computer Science A, published by The College Board.

§130.431. Advanced Placement (AP) Computer Science Principles (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. Recommended prerequisite: Algebra I.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Computer Science Principles are prescribed in the College Board Publication Advanced Placement® Curriculum Framework: AP Computer Science Principles, published by The College Board.

§130.432. International Baccalaureate (IB) Computer Science Standard Level (Two Credits)

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. Recommended prerequisites: Computer Science I, Algebra II.
- (b) Content requirements. Content requirements for IB Computer Science Standard Level are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§130.433. International Baccalaureate (IB) Computer Science Higher Level (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. Recommended prerequisites: Computer Science I, Algebra II.
- (b) Content requirements. Content requirements for IB Computer Science Higher Level are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§130.434. International Baccalaureate (IB) Information Technology in a Global Society Standard Level (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. Recommended prerequisites: Computer Science I, Algebra II.
- (b) Content requirements. Content requirements for IB Information Technology in a Global Society Standard Level are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§130.435. International Baccalaureate (IB) Information Technology in a Global Society Higher Level (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. Recommended prerequisites: Computer Science I, Algebra II.
- (b) Content requirements. Content requirements for IB Information Technology in a Global Society Higher Level are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

Subchapter Q. Energy

§130.485. Oil and Gas Production I (One Credit).

- (a) General requirements. This course is recommended for students in Grades 9-12. Students shall be awarded one credit for successful completion of this course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) In Oil and Gas Production I, students will identify specific career opportunities and skills, abilities, tools, certification, and safety measures associated with each career. Students will also understand components, systems, equipment, and production and safety regulations associated with oil and gas wells. To prepare for careers in oil and gas production, students must attain academic skills and knowledge, acquire technical knowledge and skills related to oil and gas production and the workplace, and develop knowledge and skills regarding career opportunities, entry requirements, and industry expectations. To prepare for success, students need opportunities to learn, reinforce, apply, and transfer their knowledge and skills and technologies in a variety of settings.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) identify career development, education, and entrepreneurship opportunities in the oil and gas production field;
 - (B) apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation;
 - (C) demonstrate knowledge of personal and occupational safety, environmental regulations, and first-aid policy in the workplace;
 - (D) analyze employers' expectations such as appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills; and
 - (E) demonstrate leadership skills to accomplish organizational goals and objectives.
 - (2) The student understands the history of and process for drilling a well. The student is expected to:
 - (A) describe the history of drilling for petroleum in the United States and abroad;
 - (B) describe and appraise routine drilling operations, offshore drilling, and new drilling technologies;
 - (C) describe the tools and techniques for directional drilling;
 - (D) examine the differences between fishing, retrieving, and repairing pipe;
 - (E) describe the methods for completing a well in order for production to begin;
 - (F) assess fluid pressure;

- (G) determine how the flow is initiated in a new well;
 - (H) differentiate between major components of a well and discuss the purpose, design, and operation of each component;
 - (I) describe activities associated with completing a well;
 - (J) describe the well completion processes and equipment;
 - (K) summarize the instruments and techniques used when logging and testing during the drilling and completion of a well;
 - (L) list the factors that are analyzed when studying a poorly producing well; and
 - (M) identify the responsibilities, characteristics, abilities, and work behaviors of personnel that are involved in well service.
- (3) The student discusses and identifies components, systems, equipment, production, and safety regulations associated with oil and gas wells. The student is expected to:
- (A) identify the major systems and equipment used in the production of oil and gas;
 - (B) identify and describe the wellhead equipment that controls fluid flow;
 - (C) trace the process flow through the oil and gas production systems and equipment;
 - (D) discuss the purpose of the wellhead and identify the major components;
 - (E) describe the purpose, design, and operation of each wellhead component;
 - (F) compare and contrast the major differences in wellhead construction;
 - (G) compare and contrast onshore and offshore facilities;
 - (H) compare and contrast oil and gas regions within the United States;
 - (I) describe the safety, health, and environmental concerns associated with working around a wellhead;
 - (J) explain how the wellhead system affects other production systems tied to the wellhead;
 - (K) describe the activities associated with monitoring and regulating well flow;
 - (L) describe the wellhead maintenance activities performed by the production technician;
 - (M) operate and troubleshoot a wellhead using a computer simulator, pilot plant, or tabletop unit; and
 - (N) identify the operating conditions that would warrant a manual or automatic shut-in of a well and steps involved in a manual shut-in of a well.
- (4) The student discusses safety issues related to the oil and gas industry. The student is expected to:
- (A) describe the safety, health, and environmental concerns associated with drilling, production, and maintenance; and
 - (B) research safety standards in the petroleum industry such as the Bureau of Safety and Environmental Enforcement (BSEE), United States Coast Guard (USCG), American Petroleum Institute (API), Department of Transportation (DOT), Occupational Safety and Health Administration (OSHA), Environmental Protection Agency (EPA), American Society for Testing and Materials (ASTM), American National Standards Institute (ANSI), and others.

§130.486. Oil and Gas Production II (One Credit).

- (a) General requirements. This course is recommended for students in Grades 10-12. Prerequisite: Oil and Gas Production I. Students shall be awarded one credit for successful completion of this course.

(b) Introduction.

- (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
- (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
- (3) In Oil and Gas Production II, students will gain knowledge of the specific requirements for entry into post-secondary education and employment in the petroleum industry; research and discuss petroleum economics; research and discuss the modes of transportation in the petroleum industry; research and discuss environmental, health, and safety concerns; research and discuss different energy sources; and prepare for industry certification. To prepare for careers in oil and gas production, students must attain academic skills and knowledge, acquire technical knowledge and skills related to oil and gas production and the workplace, and develop knowledge and skills regarding career opportunities, entry requirements, and industry expectations. To prepare for success, students need opportunities to learn, reinforce, apply, and transfer their knowledge and skills and technologies in a variety of settings.
- (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
- (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.

(c) Knowledge and skills.

- (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) identify career development, education, and entrepreneurship opportunities in the oil and gas production field;
 - (B) identify careers in oil and gas production with required aptitudes in science, technology, engineering, mathematics, language arts, and/or social studies;
 - (C) apply technology skills to create an electronic portfolio of skills and abilities;
 - (D) apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation;
 - (E) demonstrate knowledge of personal and occupational safety, health, environmental regulations, and first-aid policy in the workplace; and
 - (F) analyze employers' expectations, including appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills.
- (2) The student researches and discusses the modes of transportation and environmental, health, and safety concerns. The student is expected to:
 - (A) describe evolution of transportation in the petroleum industry;
 - (B) research and access the various ground methods of transportation;
 - (C) survey health and safety policies, procedures, regulations, and practices as they relate to transportation in the petroleum industry;
 - (D) research and discuss petroleum economics;
 - (E) compare marketing, sales, and distribution of petroleum products;
 - (F) identify supply chain businesses that create new supplies of oil and gas;
 - (G) identify supply creation companies and how they operate;

- (H) discuss the factors in investment decision making; and
- (I) calculate rates of return to evaluate prospects.
- (3) The student researches the different methods of disposing of oil and gas waste and methods of cleanup. The student is expected to:
 - (A) discuss the disposal methods of exploration and production wastes;
 - (B) identify cleanup methods for blowouts and spills; and
 - (C) identify refining processes that minimize environmental impact.
- (4) The student researches and identifies the different energy sources and priorities for the oil and gas industry. The student is expected to:
 - (A) research the petroleum industry to identify renewable energy sources;
 - (B) present the challenges and priorities of the petroleum industry;
 - (C) research the critical technologies needed in the future; and
 - (D) research the nontechnical solutions to energy needs.

§130.487. Oil and Gas Production III (One Credit).

- (a) General requirements. This course is recommended for students in Grades 11 and 12. Prerequisite: Oil and Gas Production II. Students shall be awarded one credit for successful completion of this course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) In Oil and Gas Production III, students will gain knowledge of hydraulic and pneumatic systems and skill requirements to work in oil and gas and related industries. Students complete an advance core curriculum that includes hydraulic and pneumatic systems involved in oil and gas production. This program is designed to train students in all areas of down and mid-stream operation skills.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) identify career development, education, and entrepreneurship opportunities in the oil and gas production field;
 - (B) identify careers in oil and gas production with required aptitudes in science, technology, engineering, mathematics, language arts, and/or social studies;
 - (C) apply technology skills to create an electronic portfolio of skills and abilities;
 - (D) apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation;

- (E) demonstrate knowledge of personal and occupational safety, health, environmental regulations, and first-aid policy in the workplace; and
 - (F) analyze employers' expectations, including appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills.
- (2) The student identifies the importance of oil field hydraulics and its contributions to the oil and gas industry. The student is expected to:
- (A) identify companies that contributed to oil field hydraulics and fracturing and discuss those contributions;
 - (B) explain the history of hydraulic fracturing and its importance to the oil field industry and the process of producing wells in North America;
 - (C) describe the impact of hydraulics on energy in North America; and
 - (D) explain the impact on new oil and natural gas production in North America as it relates to technology.
- (3) The student demonstrates an understanding of pneumatics and hydraulics and their significance and application in the petroleum engineering industry. The student is expected to:
- (A) describe and define the basic functional components of the pneumatic system and the function of a pneumatic schematic;
 - (B) explain pneumatic pressure and identify its unit of measure during application procedures;
 - (C) explain the importance of a hydraulic system and identify the hydraulic system's five basic components (hydraulic pump, control valves, actuators, reservoir, and accumulators), including the hydraulic system's significance in the petroleum engineering industry; and
 - (D) define hydraulics and identify its unit of measure during application procedures.
- (4) The student explains and demonstrates the six pneumatic safety rules and the importance of the rules in the petroleum industry. The student is expected to:
- (A) explain the six pneumatic safety rules, including wearing safety glasses when building and operating pneumatics, keeping fingers clear of piston rods, never blowing compressed air at anyone, not turning the main air supply on until a circuit is connected, turning the air off if air is leaking from a joint, and turning the air off before altering a circuit;
 - (B) demonstrate safety precaution measures in pneumatics and discuss the importance of safety equipment during this process; and
 - (C) demonstrate and explain the importance of a pressure regulator in pneumatics, including the historical significance.
- (5) The student demonstrates an understanding of basic cylinder circuits and pneumatic cylinder circuits and their significance and applications in the petroleum engineering industry. The student is expected to:
- (A) explain the functions of the operation of a double acting pneumatic cylinder and each of its functions;
 - (B) describe the operation of five-way three-position directional control valves (DCV);
 - (C) describe the function of a pneumatic quick-connect fitting; and
 - (D) demonstrate how to safely connect the pneumatic circuit with a quick-connect fitting.
- (6) The student understands the impact of a hydraulic schematic in oil field applications. The student is expected to:

- (A) describe ISO symbols and appropriately use them to draw a hydraulic schematic; and
- (B) create a hydraulic schematic.
- (7) The student identifies the principles of hydraulic pressure and flow and discusses the basic hydraulic cylinder circuits and their application. The student is expected to:
 - (A) calculate the force output of an extending cylinder and the retraction force of a cylinder;
 - (B) explain the relevance of Pascal's Law to hydraulics;
 - (C) identify and discuss hydraulic motors and pumps; and
 - (D) identify hydraulic cylinders and their impact on single and double acting circuits.

§130.488. Oil and Gas Production IV (One Credit).

- (a) General requirements. This course is recommended for students in Grades 11 and 12. Prerequisite: Oil and Gas Production III. Students shall be awarded one credit for successful completion of this course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content alignment with challenging academic standards and relevant knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) Oil and Gas Production IV is designed to extend training for future petroleum engineering technicians in all areas of down and mid-stream operations. Students complete an intense core curriculum in areas that include hydrocarbon safety, drilling, petroleum geology, oil and gas exploration and production, reservoir operations, well head completions, petroleum data management operations and analysis, natural gas production, and economics. In conjunction with this course, students employ the latest computer software in engineering and petroleum, operations, data mining, and geological mapping.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) identify career development, education, and entrepreneurship opportunities in the oil and gas production field;
 - (B) identify careers in oil and gas production with required aptitudes in science, technology, engineering, mathematics, language arts, and/or social studies;
 - (C) apply technology skills to create an electronic portfolio of skills and abilities;
 - (D) apply competencies related to resources, information, interpersonal skills, problem solving, critical thinking, and systems of operation;
 - (E) demonstrate knowledge of personal and occupational safety, health, environmental regulations, and first-aid policy in the workplace; and
 - (F) analyze employers' expectations, including appropriate work habits, ethical conduct, legal responsibilities, and good citizenship skills.

- (2) The student explains the phases of well construction. The student is expected to:
- (A) describe the function of the well completion phase and the different hole tests used in well completions;
 - (B) design the completion of the reservoir using technology such as computer designing software;
 - (C) describe the open hole completion and sand control completion processes; and
 - (D) describe conventional completions and their components and how they relate to production tubing.
- (3) The student explains the concepts of safety in well completions and indicates tools and procedures for completing a drilled wellbore. The student is expected to:
- (A) research health and safety standards for the workplace and environment such as Standards and Wireline Operations and Procedures and Occupational Safety and Health Administration (OSHA) and standards provided by professional organizations in the oil and gas industry such as the American Chemical Society, American Institute of Chemical Engineers, Center for the Advancement of Process Technology, Gulf Coast Process Technology Alliance, and American Petroleum Institute (API);
 - (B) identify well completion tools and equipment and their use during each well completion phase; and
 - (C) analyze the cost of safety during well completions.
- (4) The student explains the concepts of hydraulic fracturing and its role during the well completion phase. The student is expected to:
- (A) describe how the generic well design and drilling mud systems impact drilling;
 - (B) interpret ways in which generic platform wells, cuttings disposal routes, and drilling fluid design impact the generic well design; and
 - (C) evaluate the significance of reservoir formations.
- (5) The student discusses the potential hazards and possible solutions of well and equipment testing. The student is expected to:
- (A) evaluate potential hazards and formulate a safety plan that covers safety guidelines and equipment, including first-aid and safety uniforms;
 - (B) describe and accurately measure the flow of oil, gas, and water in real time;
 - (C) ensure precautions and measures are considered during the surface well testing; and
 - (D) discuss the importance of knowing the surrounding environment when well testing.
- (6) The student researches the different types of coring and core analysis used in well completions and how they play an important role in well completion. The student is expected to:
- (A) describe the role of coring and core analysis in well completions;
 - (B) identify the relationship between the factors such as core analysis and well logging that play an active role in well completions;
 - (C) explain well logging and its importance in formation evaluation;
 - (D) research different methods of formation testing by acquiring core samples;
 - (E) research drill stem testing;
 - (F) explain drill stem tests and their importance in measuring the flow of oil and gas in well completions; and
 - (G) evaluate the cost of completion operations for well completion.

§130.489. Introduction to Process Technology (One Credit).

- (a) General requirements. This course is recommended for students in Grades 11 and 12. Students shall be awarded one credit for successful completion of this course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) In Introduction to Process Technology, students will learn the social significance and workforce impact of process technology in industry and the opportunities available at various levels of education and training in industries using process technology.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) demonstrate skills related to health and safety in the workplace as specified by appropriate government regulations;
 - (B) demonstrate the standards required in the workplace such as interviewing skills, flexibility, willingness to learn new skills and acquire knowledge, self-discipline, self-worth, positive attitude, and integrity in a work situation;
 - (C) collaborate with others to solve problems;
 - (D) identify employers' work expectations; and
 - (E) research, evaluate, and apply various time-management techniques to develop work schedules.
 - (2) The student understands common definitions, terminology, and the basic foundations related to process technology. The student is expected to:
 - (A) describe the types of industry utilizing process technology and identify fields related to process technology;
 - (B) identify and describe the career opportunities in process technology, pathways to career development, and certification requirements of industries utilizing process technology, including job responsibilities, typical work schedules, and career opportunities;
 - (C) demonstrate the use of content such as technical concepts and vocabulary when analyzing information and following directions;
 - (D) identify currently emerging issues in process technology; and
 - (E) identify principles of instruments and instrument technology used in industrial process technology.
 - (3) The student identifies and discusses types of industrial piping, valves, and basic process equipment. The student is expected to:
 - (A) discuss the basics of piping, valves, and equipment used in industry; and

- (B) demonstrate the ability to read and interpret the various types of industrial drawings, diagrams, and data sheets related to industrial piping, valves, and equipment.
- (4) The student identifies and discusses the types of industrial electrical equipment and instrumentation used in process technology. The student is expected to:
 - (A) demonstrate the ability to read and interpret the various types of industrial drawings, diagrams, charts, and data sheets related to industrial electrical equipment;
 - (B) interpret industry standard circuit schematics;
 - (C) identify areas where quality, reliability, and safety can be integrated into a product; and
 - (D) describe the principles of electricity as applied in industrial process technology.
- (5) The student discusses safety issues related to industrial process technology. The student is expected to:
 - (A) describe the safety, health, and environmental concerns and requirements for industries using process technology along with the history that led to modern standards;
 - (B) analyze and execute safety guidelines as described in various manuals, instructions, and regulations;
 - (C) describe the implications of negligent or improper maintenance;
 - (D) discuss and demonstrate how precision measuring instruments are used in industrial process technology; and
 - (E) research agencies that govern safety in industrial process technology, including their authority and requirements.
- (6) The student demonstrates understanding of basic industrial mathematics. The student is expected to:
 - (A) perform common computations required in industrial process technology using mastered calculator skills;
 - (B) determine when to convert between fractions, decimals, whole numbers, and percentages mentally, on paper, or with a calculator when required in industrial process technology;
 - (C) identify and quantify causes and effects of uncertainties in measured data;
 - (D) demonstrate how exponents, symbols, and the order of operations are used to solve real world word problems commonly seen in process technology;
 - (E) determine appropriate formulas to compute cross sections, surface areas, and volumes of geometric figures such as circles, squares, and cylinders;
 - (F) estimate measurements and solve application problems involving industry drawings and data sheets using consistent units for all measurements and computation;
 - (G) describe and discuss how to use scientific notation and International System (SI) units to gather and record data with accuracy and precision;
 - (H) organize and evaluate data and make inferences from data, including the use of tables, charts, and graphs;
 - (I) determine a dimension of an object given a scaled drawing having no dimensions; and
 - (J) represent and solve problems involving proportional relationships, including conversions between measurement systems using multiplication by a given constant factor such as unit rate.
- (7) The student applies concepts of critical thinking and problem solving. The student is expected to:
 - (A) analyze elements of a problem to develop innovative solutions;

- (B) critically analyze information to determine value to the problem-solving task;
 - (C) analyze a variety of problem-solving strategies and critical-thinking skills; and
 - (D) conduct technical research to gather information necessary for decision making.
- (8) The student applies comprehensive knowledge in a simulation environment to demonstrate the mastery of the concepts covered in this course. The student is expected to:
- (A) represent or simulate a portion of a process system by generating an appropriate drawing, diagram, or data sheet;
 - (B) demonstrate how to achieve a specific goal with the use of a simple mockup of a process system;
 - (C) execute a simple mockup of a process system to achieve a specified goal;
 - (D) demonstrate appropriate safety equipment selection for use in a variety of assigned tasks;
 - (E) identify and apply mathematical operations to complete calculations and specified computations, including unit conversions for a simulated process system;
 - (F) explain how visual depictions, data readouts, and trends in a computer-based process simulator relate to actual valves, piping, equipment, electrical gear, and instrumentation in a process system; and
 - (G) develop critical-thinking skills using simulations to identify and solve problems associated with process technology.
- (9) The student presents conclusions, research findings, and designs using a variety of media throughout the course. The student is expected to:
- (A) discuss and critique the validity of conclusions supported by the data through various methods such as lab reports, labeled drawings, graphic organizers, journals, summaries, oral reports, and technology-based reports; and
 - (B) record, express, and manipulate relationships among data using graphs, charts, and equations.

§130.490. Foundations of Energy (One Credit).

- (a) General requirements This course is recommended for students in Grades 9-12. Students shall be awarded one credit for successful completion of the course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and success in current or emerging energy professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) In Foundations of Energy, students will conduct laboratory and field investigations, use scientific practices during investigations, and make informed decisions using critical thinking and scientific problem solving. Various systems will be described in terms of energy. Students will study a variety of topics that include energy transformation, the law of conservation of energy, energy efficiency, interrelationships among energy resources and society, and sources and flow of energy through the production, transmission, processing, and use of energy. Students will apply these concepts and perform investigations and experiments at least 40% of the time using safe practices.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.

- (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
- (A) evaluate the importance of dressing appropriately, speaking politely, and conducting oneself in a manner appropriate for the profession;
 - (B) cooperate, contribute, and collaborate as a member of a group in an effort to achieve a positive collective outcome;
 - (C) present written and oral communication in a clear, concise, and effective manner;
 - (D) demonstrate time-management skills by prioritizing tasks, following schedules, and performing goal-relevant activities in a way that produces efficient results;
 - (E) demonstrate punctuality, dependability, reliability, and responsibility in performing assigned tasks as directed;
 - (F) discuss and exhibit teamwork and leadership skills necessary for the workplace;
 - (G) define and demonstrate effective problem-solving skills; and
 - (H) apply computer-based skills and other technologies relevant to the energy industry.
- (2) The student analyzes current and future career opportunities in the energy sector, including oil and gas exploration and production, refining and chemical processing, and renewable energy. The student is expected to:
- (A) evaluate energy systems and identify careers within those systems;
 - (B) examine past market and employment trends in the energy sector;
 - (C) discuss current issues in energy production and predict future needs and employment opportunities in this field;
 - (D) identify career development, education, credentialing, and entrepreneurship opportunities in the energy sector; and
 - (E) apply competencies related to resources, information, and systems of operation in the energy sector.
- (3) The student conducts laboratory and field investigations using safe, environmentally appropriate, and ethical practices. The student is expected to:
- (A) demonstrate safe practices during laboratory and field investigations;
 - (B) use a wide variety of additional course apparatuses, equipment, techniques, and procedures as appropriate such as satellite imagery and other remote sensing data, Geographic Information Systems (GIS), Global Positioning System (GPS), scientific probes, microscopes, telescopes, modern video and image libraries, weather stations, fossil and rock kits, tectonic plate models, and planetary globes;
 - (C) engage in meaningful hands-on, minds-on conceptual activities in the areas of energy; and
 - (D) demonstrate an understanding of the use and conservation of resources and proper disposal or recycling of materials.
- (4) The student uses critical thinking and problem solving to make informed decisions within and outside the classroom. The student is expected to:

- (A) communicate and present valid conclusions from energy information extracted from various sources such as current events, news reports, published journal articles, and marketing materials;
 - (B) explain the impacts of energy discoveries by a variety of historical and contemporary scientists and entrepreneurs on current societal attitudes;
 - (C) compare advantages and disadvantages in the use of the various energy sources; and
 - (D) distinguish between scientific decision making (scientific methods) and ethical and social decisions that involve science (the application of scientific information).
- (5) The student presents conclusions, research findings, and designs using a variety of media throughout the course. The student is expected to:
- (A) develop written and oral presentation skills related to energy issues and solutions by researching and describing the history of energy production in Texas and contributions of scientists and entrepreneurs; and
 - (B) develop data retrieval and analysis skills related to energy production and use by researching information about energy sources, including renewable and non-renewable sources, and energy efficiency and how each source is used to produce electrical energy.
- (6) The student examines and explains concepts and procedures related to energy. The student is expected to:
- (A) identify general purposes for energy, including transportation, light, cooking, heating or cooling, entertainment, and cleaning;
 - (B) explain and demonstrate transformations among various energy forms, including potential, kinetic, chemical, mechanical, electrical, and light energy;
 - (C) analyze the role of gravity in transforming energy;
 - (D) investigate and calculate the relationship between work, potential energy, and kinetic energy;
 - (E) examine various types of energy transfer mechanisms, determine the original form of energy and what form that energy is being transformed into, and use examples to analyze and calculate the relationships among work, kinetic energy, and potential energy;
 - (F) describe and apply the law of conservation of energy; and
 - (G) use basic calorimetry to determine the amount of energy stored in substances such as coal.
- (7) The student understands the basics of fluid mechanics related to energy discovery, production, and transportation. The student is expected to:
- (A) identify fluids used as fuels, including liquids and gases;
 - (B) identify fluids used in the discovery, production, and transportation of energy sources;
 - (C) explain capillary action and relate it to energy production; and
 - (D) explain, using formulas, how pressure and temperature affect the behavior of fluids.
- (8) The student understands how and where energy is produced and identifies Texas energy resources. The student is expected to:
- (A) research the location of energy resources and power production plants in Texas;
 - (B) compile information on the history of energy production in Texas and describe its past and current importance to the U.S. economy;
 - (C) investigate the role of technology in the future development of energy usage;

- (D) identify ways to conserve energy;
 - (E) map the major sources of energy used in Texas;
 - (F) assess the impact of the various energy sources on the economy in Texas;
 - (G) analyze how supply and demand impacts Texas's economy in relation to energy; and
 - (H) compare and contrast the impact of energy sources and supply and demand in Texas with national and global data.
- (9) The student investigates how energy resources such as water, oil, and natural gas are stored underground in rock formations. The student is expected to:
- (A) assess the properties and geological histories of rocks and rock formations that enable energy storage;
 - (B) determine the physical properties of permeability and porosity of rock formations and relate these properties to the amount of water, oil, and natural gas held in these formations;
 - (C) explain how aquifers function and locate major aquifers in Texas; and
 - (D) investigate how innovations such as hydraulic fracturing and high-power transmission lines have made massive energy resources such as oil, gas, wind, and electricity available in Texas.
- (10) The student knows differences between renewable and non-renewable resources. The student is expected to:
- (A) identify and describe various renewable and non-renewable resources;
 - (B) describe and compare the energy efficiency of renewable and non-renewable energy derived from natural and alternative sources such as oil, natural gas, coal, nuclear, solar, geothermal, hydroelectric, and wind;
 - (C) examine the benefits and hazards of using renewable and non-renewable energy sources;
 - (D) research methods by which benefits can be increased and hazards reduced in the use of renewable and non-renewable energy sources;
 - (E) examine different viewpoints of an energy source regarding availability, cost, potential pollution, impact to plant and animal habitat, and sustainability;
 - (F) analyze an energy source's relative availability and renewability and discuss how these factors inform decision making regarding a source's use; and
 - (G) analyze changing social perspectives and how they can influence scientific practices.
- (11) The student knows how energy impacts the student's life and the role energy plays in international relations, the environment, standards of living, and the economy. The student is expected to:
- (A) analyze the impact energy has on the environment;
 - (B) research and discuss the ethical and social issues surrounding Earth's energy resources;
 - (C) analyze the advantages and disadvantages of an energy source's long-term use;
 - (D) explain the relationship between energy and quality of life;
 - (E) research and describe the connection between energy production, transmission, processing, and marketing; and
 - (F) analyze the impact and effectiveness of the measures taken by the United States and other countries to use energy to reduce greenhouse gases, improve water and air quality, and extend life expectancy.

- (12) The student investigates extended learning experiences such as career and technical student organizations and area energy museums and displays. The student is expected to:
 - (A) identify a minimum of three energy professionals for potential speaking invitations either in person or via the Internet;
 - (B) research and describe an energy-related organization such as a museum or local business; and
 - (C) compare educational requirements for different energy industry jobs in Texas.

§130.491. Petrochemical Safety, Health, and Environment (One Credit).

- (a) General requirements. The course is recommended for students in Grades 11 and 12. Students shall be awarded one credit for successful completion of this course.
- (b) Introduction.
 - (1) Career and technical education instruction provides content aligned with challenging academic standards and relevant technical knowledge and skills for students to further their education and succeed in current or emerging professions.
 - (2) The Energy Career Cluster focuses on Texas's diverse economic landscape, geography and natural resources, including renewable energy potential, transportation system, labor force, and leadership in environmental research.
 - (3) Petrochemical Safety, Health, and Environment addresses the shortage of process technology operators/technicians by educating students on the safety rules, regulations, and operations of the petrochemical process technology operator. Students enrolled in this course will learn about the knowledge and skills required in occupational safety, health, and environment as well as the governing regulatory authorities and the legal aspects of the industry in order to maintain a safe work environment.
 - (4) Students are encouraged to participate in extended learning experiences such as career and technical student organizations and other leadership or extracurricular organizations.
 - (5) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
 - (1) The student demonstrates professional standards/employability skills as required by business and industry. The student is expected to:
 - (A) research the three major roles of safety, health, and environment as it pertains to process technology operators/technicians;
 - (B) describe the role of process technicians in relation to safety, health, and environmental issues;
 - (C) identify the importance of safety, health, and environment as they relate to the performance of all job tasks and regulatory compliance issues within the industries, including, but not limited to, petrochemical plants, refineries, oil and gas production, and power generation; and
 - (D) explain the importance of interpreting the safety, health, and environmental procedures standards, requirements, and regulations as a process technology operator/technician.
 - (2) The student examines compliance standards to ensure safe work practices as they relate to safety, health, and environmental regulations. The student is expected to:
 - (A) identify the legal governing agencies and describe regulatory requirements as they apply to the petrochemical industry, its employees, and the community;

- (B) identify specific state and federal regulations and the related specific tasks performed by process technology operators/technicians;
 - (C) identify safety programs used in the gulf coast area;
 - (D) determine types of administrative controls and permitting systems to ensure safe work practices, especially as the controls relate to confined spaces and log-out and tag-out (LOTO);
 - (E) demonstrate the proper usage of typical safety equipment and systems used in local plants;
 - (F) describe how engineering controls are designed to allow process technology operators/technicians to operate equipment with system safeguards;
 - (G) describe the different types of personal protective equipment (PPE), including fire resistant clothing (FRC), hard hats, safety shoes, hearing protection, safety glasses, and acid suits;
 - (H) evaluate the types of monitors that measure exposure ratings for noise, heat, and radiation;
 - (I) describe the different types of respiratory protection according to their levels of protection, including air purifying, air supply, escape packs, and self-contained breathing apparatus (SCBA); and
 - (J) identify the types of monitoring instruments that process operators/technicians use to monitor the atmosphere, oxygen content, explosive atmosphere, and toxicity.
- (3) The student summarizes the environmental requirements that are designed to safeguard society. The student is expected to:
- (A) describe the types of spills and releases and the environmental factors that can impact them;
 - (B) identify specific systems that are in place to mitigate or prevent hazards to the environment and to individuals, including safe disposal of hazardous materials;
 - (C) identify the regulatory governmental agencies, including Occupational Safety and Health Administration (OSHA), Mining Safety and Health Administration (MSHA), Texas Commission on Environmental Quality (TCEQ), and the Environmental Protection Agency (EPA), that protect our safety, health, and environment;
 - (D) identify the Hazard Communication (HAZCOM) program and its components, including written Emergency Response Plans (ERPs), labeling containers that contain hazardous chemicals, and Safety Data Sheets (SDS) for hazardous chemicals produced or imported;
 - (E) describe the different types of hazards, including fire and explosions, ergonomic, biological, and blood borne pathogens; and
 - (F) describe the Maritime Security Act (MARSEC), which protects against terroristic threats.
- (4) The student describes equipment and energy and work surface hazards. The student is expected to:
- (A) define the types of equipment and energy and work surface hazards, including electrical, rotating equipment, thermal, elevation/heights/fall protection, chemical, slip and trips, and machine guarding;
 - (B) identify hazards as they pertain to construction, vehicles, weather, and security, and describe how to protect the point of access and the site, including contractors who might have limited safety knowledge, new equipment installation, traffic control, and training on heavy machinery; and

- (C) determine how weather conditions can adversely impact safety at a petrochemical plant or other process industry, including heat stress, hurricanes, freeze precautions, adverse weather conditions, lightning, and wind.
- (5) The student identifies environmental pollutants as well as regulations to protect the environment. The student is expected to:
 - (A) describe environmental pollutants, including toxic chemicals;
 - (B) identify the Material Safety Data Sheet (MSDS) manual list of the hazardous and toxic chemicals for process control sites;
 - (C) summarize the EPA petition process for approval of chemicals created by a plant;
 - (D) determine the permissions that must be acquired before site production begins, including a toxicology report such as a Chemical Inventory Management System (CIMS) for a local plant; and
 - (E) describe the types of environmental controls that are in place to protect the environment such as monitoring and air and water permits.

**Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses
(Second Reading and Final Adoption)**

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION
STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item presents for second reading and final adoption proposed revisions to 19 Texas Administrative Code (TAC) Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, to add Texas Essential Knowledge and Skills (TEKS) for a new African American studies ethnic studies course, to renumber sections, and to update references to course numbers and titles to reflect recent revisions to the social studies TEKS.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(4); 28.002(a) and (c); and 28.025(a).

TEC, §7.102(c)(4), requires the State Board of Education (SBOE) to establish curriculum and graduation requirements.

TEC, §28.002(a), identifies the subjects of the required curriculum.

TEC, §28.002(c), requires the SBOE to by rule identify the essential knowledge and skills of each subject in the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials and addressed on the state assessment instruments.

TEC, §28.025(a), requires the SBOE to by rule determine the curriculum requirements for the foundation high school graduation program that are consistent with the required curriculum under TEC, §28.002.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed revisions is August 1, 2020. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2020-2021 school year. The earlier effective date will allow districts of innovation that begin school prior to the statutorily required start date to implement the proposed rulemaking when they begin their school year.

PREVIOUS BOARD ACTION: The SBOE adopted the TEKS for social studies effective September 1, 1998. Amendments to the social studies TEKS were adopted effective August 23, 2010. Amendments to the social studies TEKS were last adopted effective August 1, 2019. A discussion item regarding proposed revisions to 19 TAC Chapter 113 was included on the agenda for the Committee of the Full Board during the November 2019 SBOE meeting. At that time, the board requested that staff develop a proposal for TEKS for an ethnic studies course in African American studies based on the currently approved innovative course, African American Studies. At the January 2020 SBOE meeting, the board approved for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Subchapters C and D.

BACKGROUND INFORMATION AND JUSTIFICATION: The 83rd Texas Legislature, 2013, passed House Bill (HB) 5, amending TEC, §28.025, to transition from three high school graduation programs to one foundation high school program with endorsements to increase flexibility in graduation requirements for students. In August 2013, the SBOE held a work session to discuss changes to the graduation requirements in order to align with the requirements of HB 5, including discussion of courses required by HB 5.

There are currently state-approved TEKS for general social studies elective courses that allow educators to select specific historical, cultural, or research topics in social studies to address in greater depth. In social studies, these courses include Special Topics in Social Studies, Social Studies Research Methods, Social Studies Advanced Studies, and Ethnic Studies: Mexican American Studies.

In June 2019, a new African American Studies innovative course was approved by the commissioner of education for use beginning with the 2019-2020 school year. School districts and open-enrollment charter schools may offer any state-approved innovative course for elective credit with the approval of the local board of trustees. In accordance with SBOE rules regarding innovative courses, the newly approved African American Studies innovative course was presented to the SBOE at its November 2019 meeting for discussion and consideration for inclusion in the TEKS. At that time, the board requested that a proposal for TEKS for the course be presented at a subsequent meeting. At the January 2020 SBOE meeting, the board approved for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Subchapters C and D, including TEKS for the proposed new Ethnic Studies: African American Studies course.

Proposed new §113.51 would add TEKS for a new ethnic studies course in African American studies. Existing §§113.51-113.68 and 113.71-113.80 would be repealed and proposed with new section numbers in order to move Social Studies Advanced Studies and Economics Advanced Studies from Subchapter D to the high school courses in Subchapter C and to group the ethnic studies courses together. The content of the renumbered sections would not change except to update references to course numbers and titles in proposed new §§113.102, 113.104-113.106, 113.111, 113.114, and 113.115 to reflect recent revisions to the social studies TEKS. In addition, the implementation language in §113.30 and proposed new §113.101 would be updated to remove outdated references to section numbers and school years.

The attachment to this item reflects the text of the proposed revisions to 19 TAC Chapter 113 for consideration by the SBOE for second reading and final adoption.

FISCAL IMPACT: No changes have been made to this section since published as proposed.

The Texas Education Agency (TEA) has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed.

The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed.

The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed.

The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed.

The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed.

TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed new rule would create a new regulation by adding a new TEKS-based course option for students.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not expand, limit, or repeal an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: No changes have been made to this section since published as proposed.

The proposed new rule would add a new TEKS-based course option for students and increase flexibility in meeting graduation requirements. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed.

The proposal would have no data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed.

The TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: Following the January 2020 SBOE meeting, notice of the proposed revisions to 19 TAC Chapter 113 was filed with the Texas Register, initiating the public comment period. The public comment period on the proposal began March 6, 2020, and ended April 10, 2020. No comments had been

received at the time this item was prepared. A summary of any public comments received regarding the proposal will be provided to the SBOE prior to and during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposal at the appropriate committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for second reading and final adoption proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses; and

Make an affirmative finding that immediate adoption of the proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, is necessary and shall have an effective date of August 1, 2020. *(Per TEC, §7.102(f), a vote of two-thirds of the members of the board is necessary for an earlier effective date.)*

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services
Shelly Ramos, Senior Director, Curriculum Standards and Student Support

Attachment: Text of Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses

ATTACHMENT
Text of Proposed Revisions to 19 TAC

Chapter 113. Texas Essential Knowledge and Skills for Social Studies

Subchapter C. High School

§113.30. Implementation of Texas Essential Knowledge and Skills for Social Studies, High School [~~Adopted 2018~~].

- (a) Implementation of the provisions of this subchapter begins with the effective date of the provision unless otherwise noted.
- (b) ~~(a)~~ Implementation of the [The] provisions of [~~§113.31 and §§113.41-113.44 of~~] this subchapter adopted in 2018 begins [~~shall be implemented by school districts beginning~~] with the 2019-2020 school year.
- ~~(b) The provisions of §§113.45-113.48 of this subchapter shall be implemented by school districts beginning with the 2011-2012 school year.~~

§113.51. Ethnic Studies: African American Studies (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 10-12.
- (b) Introduction.
 - (1) In Ethnic Studies: African American Studies, an elective course, students learn about the history and cultural contributions of African Americans. This course is designed to assist students in understanding issues and events from multiple perspectives. This course develops an understanding of the historical roots of African American culture, especially as it pertains to social, economic, and political interactions within the broader context of United States history. It requires an analysis of important ideas, social and cultural values, beliefs, and traditions. Knowledge of past achievements provides citizens of the 21st century with a broader context within which to address the many issues facing the United States.
 - (2) To support the teaching of the essential knowledge and skills, the use of a variety of rich primary and secondary source material such as biographies, autobiographies, landmark cases of the U.S. Supreme Court, novels, speeches, letters, diaries, poetry, songs, and artwork is encouraged. Resources are available from museums, historical sites, presidential libraries, and local and state preservation societies.
 - (3) The eight strands of the essential knowledge and skills for social studies are intended to be integrated for instructional purposes. Skills listed in the social studies skills strand in subsection (c) of this section should be incorporated into the teaching of all essential knowledge and skills for social studies. A greater depth of understanding of complex content material can be attained when integrated social studies content from the various disciplines and critical-thinking skills are taught together.
 - (4) Students identify the role of the U.S. free enterprise system within the parameters of this course and understand that this system may also be referenced as capitalism or the free market system.
 - (5) Throughout social studies in Kindergarten-Grade 12, students build a foundation in history; geography; economics; government; citizenship; culture; science, technology, and society; and social studies skills. The content, as appropriate for the grade level or course, enables students to understand the importance of patriotism, function in a free enterprise society, and appreciate the basic democratic values of our state and nation as referenced in the Texas Education Code (TEC), §28.002(h).
 - (6) Students understand that a constitutional republic is a representative form of government whose representatives derive their authority from the consent of the governed, serve for an established tenure, and are sworn to uphold the constitution.

- (7) State and federal laws mandate a variety of celebrations and observances, including Celebrate Freedom Week.
- (A) Each social studies class shall include, during Celebrate Freedom Week as provided under the TEC, §29.907, or during another full school week as determined by the board of trustees of a school district, appropriate instruction concerning the intent, meaning, and importance of the Declaration of Independence and the U.S. Constitution, including the Bill of Rights, in their historical contexts. The study of the Declaration of Independence must include the study of the relationship of the ideas expressed in that document to subsequent American history, including the relationship of its ideas to the rich diversity of our people as a nation of immigrants, the American Revolution, the formulation of the U.S. Constitution, and the abolitionist movement, which led to the Emancipation Proclamation and the women's suffrage movement.
- (B) Each school district shall require that, during Celebrate Freedom Week or other week of instruction prescribed under subparagraph (A) of this paragraph, students in Grades 3-12 study and recite the following text: "We hold these Truths to be self-evident, that all Men are created equal, that they are endowed by their Creator with certain unalienable Rights, that among these are Life, Liberty and the Pursuit of Happiness--That to secure these Rights, Governments are instituted among Men, deriving their just Powers from the Consent of the Governed."
- (8) Students identify and discuss how the actions of U.S. citizens and the local, state, and federal governments have either met or failed to meet the ideals espoused in the founding documents.
- (9) Statements that contain the word "including" reference content that must be mastered, while those containing the phrase "such as" are intended as possible illustrative examples.
- (c) Knowledge and skills.
- (1) History. The student understands the influential historical points of reference in African history prior to 1619. The student is expected to:
- (A) identify the major eras, civilizations, and contributions of African history that are foundational to humanity and predate American slavery;
- (B) describe and compare the various pre-colonial, indigenous, and ancestral roots of African Americans such as educational systems, social and political developments, family structures, global trade, and exchange; and
- (C) analyze the effects of dehumanization through the capture, trade, and enslavement of Africans, within a regional and global context, including the Atlantic Slave Trade.
- (2) History. The student understands the economic, political, and social development of slavery during the American colonial period, 1619 to 1775. The student is expected to:
- (A) analyze the economic, political, and social reasons for the African diaspora, including the role of Africans and Europeans;
- (B) compare and contrast the colonization of North, Central, and South America and the West Indies and neighboring islands and analyze the interactions among enslaved Africans and Native Americans;
- (C) describe and explain the impact of the Middle Passage on African American culture; and
- (D) explain the causes for the growth and development of slavery, primarily in the Southern colonies.
- (3) History. The student understands the rationalization and ramifications for the continuation and growth of slavery and the anti-slavery movement in the United States from independence (1776) through the Emancipation Proclamation (1863). The student is expected to:

- (A) analyze and evaluate the economic, social, religious, and legal rationalization used by Americans to continue and expand slavery after declaring independence from Great Britain;
 - (B) describe the impact of the Three-Fifths Compromise and the Fugitive Slave Act;
 - (C) analyze the role that slavery played in the development of nationalism and sectionalism during the early 19th century;
 - (D) analyze and evaluate various forms of individual and group resistance against the enslavement of African Americans;
 - (E) analyze the influence of significant individuals and groups prior to and during the abolitionist movement to determine their impact on ending slavery, including the work of David Walker, Elijah P. Lovejoy, John Brown, Sojourner Truth, Frederick Douglass, the American Anti-Slavery Society, and the Underground Railroad; and
 - (F) analyze national and international abolition efforts, including the U.S. ban on the slave trade (1808) and the abolition of slavery in Mexico (1829) and Great Britain (1833) and the significance of the Guerrero Decree in the Texas Revolution.
- (4) History. The student understands African American life from the Civil War through World War I. The student is expected to:
- (A) summarize the roles and experiences of African American soldiers and spies in both the North and South during the Civil War;
 - (B) describe and analyze the successes and failures of Reconstruction;
 - (C) compare the opportunities and challenges faced by African Americans from post-Reconstruction to the early 20th century and viewpoints and actions of African Americans, including Ida B. Wells, W.E.B. Du Bois, Booker T. Washington, Marcus Garvey, the National Association for the Advancement of Colored People (NAACP), Freedmen's Towns, and the Exodusters;
 - (D) explain the circumstances surrounding increased violence and extremism such as the Ku Klux Klan (KKK), the Colfax Massacre, lynchings, race riots, and the Camp Logan Mutiny (The Houston Riot of 1917);
 - (E) analyze how the rise of Jim Crow laws affected the life experiences of African Americans in the late 19th and early 20th centuries;
 - (F) describe the impact of the U.S. Supreme Court decision Plessy v. Ferguson (1896);
 - (G) analyze the social, economic, and political actions of African Americans in response to the Jim Crow era during the early 20th century such as the Great Migration, civil rights organizations, social organizations, political organizations, and organized labor unions;
 - (H) examine the experiences of African American soldiers during and after World War I; and
 - (I) evaluate the impact of African American military service from Reconstruction through World War I, including the role of the Buffalo Soldiers.
- (5) History. The student understands change and continuity in the African American cultural identity during the Great Depression, World War II, and the Civil Rights Movement. The student is expected to:
- (A) compare the positive and negative effects of the Great Depression and New Deal on the social and economic status of African Americans in various geographic regions;
 - (B) describe the continued struggle for civil rights in America during this time in history, including the notable works of the NAACP, National Urban League, Jackie Robinson, Martin Luther King Jr., Daisy Bates and the Little Rock Nine, and local leaders;

- (C) describe the interactions of the people of the diaspora relative to the struggle for civil rights;
 - (D) describe the impact of racism during World War II;
 - (E) explain the contributions of significant African American individuals and groups during World War II, including Doris "Dorie" Miller, the Tuskegee Airmen, and the 761st Tank Battalion;
 - (F) analyze how the effects of World War II laid the groundwork for the Civil Rights Movement, including Harry S. Truman's Executive Order 9981 and the contributions of A. Phillip Randolph, Mary McLeod Bethune, and Thurgood Marshall;
 - (G) analyze the successes and failures of the Civil Rights Movement, including methods such as sit-ins, boycotts, marches, speeches, music, and organizations; and
 - (H) evaluate the extent to which the Civil Rights Movement transformed American politics and society.
- (6) History. The student understands the progress made and challenges faced by African Americans from the post-Civil Rights Era to contemporary times. The student is expected to:
- (A) identify and explain the issues confronting African Americans in the continuing quest for equality;
 - (B) describe the major contributions of contemporary African Americans and how their contributions have shaped the American experience such as John H. Johnson, Muhammad Ali, Shirley Chisholm, Earl G. Graves, Barbara Jordan, Colin Powell, Condoleezza Rice, and Barack Obama; and
 - (C) analyze the progress and challenges for African American men and women socially, economically, and politically from 1970 to the present such as the evolving role of education in the African American community.
- (7) Geography. The student understands the impact of geographic factors on major events related to African Americans over time. The student is expected to:
- (A) explain the causes and effects of forced and voluntary migration on individuals, groups, and societies throughout African American history;
 - (B) compare and contrast the physical and human geographic factors in the North and South related to the Atlantic Slave Trade, the plantation system, the expansion of slavery, and the Industrial Revolution;
 - (C) explain the westward movement and the Great Migration and summarize their impact on African Americans; and
 - (D) analyze how environmental changes impacted African American communities such as land use, settlement patterns, and urban development.
- (8) Economics. The student understands ways in which African Americans have addressed opportunities, challenges, and strategies concerning economic well-being over time. The student is expected to:
- (A) describe the development of the plantation system and slave labor in the American colonies;
 - (B) identify the groups that participated in the transatlantic triangular trade system and explain how the system worked;
 - (C) analyze the effects of the Industrial Revolution and the cotton gin on the economies of the United States and the world;
 - (D) explain how economic policies such as sharecropping, Jim Crow economics, and redlining impacted the standard of living of African Americans;

- (E) explain how unsatisfactory economic opportunities in the South and increased economic opportunities in cities of the North and West caused the Great Migration;
 - (F) evaluate the economic impact of the American labor movement and unionism on African Americans from the late nineteenth century to today;
 - (G) analyze how various geographic, cultural, social, political, and financial factors influenced the economic mobility of African Americans such as skin color, wealth, and educational background;
 - (H) evaluate the effectiveness of various approaches African Americans have used to solve economic issues;
 - (I) trace the rise and development African American businesses and entrepreneurship from the late 19th century to today; and
 - (J) examine the contributions of African American and Black American Business entrepreneurship such as Black Wall Street, black inventors, and the black experience in business and the economic contributions of individuals such as Madame C. J. Walker and Fannie Lou Hamer.
- (9) Government. The student understands the significant impact of political decisions on African Americans throughout history. The student is expected to:
- (A) compare the effects of revolutionary ideologies such as life, liberty, and the pursuit of happiness on political perspectives of African Americans;
 - (B) explain the regional perspectives toward political rights of African American men and women from the early years of the republic through 1877;
 - (C) analyze the construction, interpretation, and implementation of the 13th, 14th, and 15th Amendments to the U.S. Constitution and the effects on African American men and women between 1877 and 1920;
 - (D) analyze how government policies, court actions, and legislation impacted African Americans from the 1920s through the 1950s;
 - (E) analyze the causes and effects of government actions and legislation addressing racial and social injustices from 1960 to the present day such as the issues of voting rights, civil rights, fair housing, education, employment, affirmative action, and health and nutrition; and
 - (F) analyze how the changing political environment has impacted civil rights from the late 20th century to the present.
- (10) Government. The student understands the impact of political interactions on the African American struggle for human rights over time. The student is expected to:
- (A) analyze examples of conflict and cooperation between African Americans and other groups in the pursuit of individual freedoms and civil rights such as the Freedom Riders and the Memphis Sanitation Workers Strike;
 - (B) explain how various philosophies and ideologies influenced the African American experience for social, political, and legal equality such as fair housing, equal opportunity, affirmative action, and voting rights; and
 - (C) identify and analyze the contributions of African American leadership roles at local, state, and national levels of government, including U.S. Supreme Court cases.
- (11) Citizenship. The student understands the importance of multiple and changing points of view regarding citizenship of African Americans. The student is expected to:

- (A) trace how perceptions of the rights and civic responsibilities of African Americans have changed over time, including the idea of being considered property with no rights under slavery;
 - (B) analyze how regional differences influenced political perspectives of African American communities;
 - (C) analyze the significance and associations of identity nomenclature relevant to African Americans such as Negro and Black; and
 - (D) analyze selected contemporary African American issues that have led to diverse points of view in public discourse, including rights and activism.
- (12) Culture. The student understands the development of African American culture and society and the impact of shared identities and differing experiences. The student is expected to:
- (A) analyze the impact of assimilation, stereotypes, de facto practices, and oppression on the lives of African Americans;
 - (B) analyze ways in which African Americans have retained cultural identity over time while adapting to and contributing to mainstream American culture; and
 - (C) analyze the various cultural practices that have shaped the individual and collective identity of African Americans over time to understand shared and differing experiences.
- (13) Culture. The student understands the cultural traditions and contributions of African Americans from the colonial era through Reconstruction. The student is expected to:
- (A) identify and describe the influence of African oral traditions, visual art, literary art, theater, music, and dance on African American culture;
 - (B) describe the influence of enslavement on African American culture;
 - (C) identify the contributions of early African American literature, including the works of Jupiter Hammon and Phillis Wheatley;
 - (D) explain the origins and characteristics of different musical genres and traditions of African Americans; and
 - (E) describe the expanding influence of African American music through the work of performers such as the Fisk Jubilee Singers.
- (14) Culture. The student understands the influence of artistic expression on the African American experience and American culture from Reconstruction to the present. The student is expected to:
- (A) describe the development of blues, ragtime, and jazz music, including the achievements of composers such as Scott Joplin and James Reese Europe;
 - (B) describe how various African American expressions of dance forms such as tap dance, step dance, hip hop, and modern dance and the contributions of African American dancers such as the Dance Theater of Harlem, Katherine Dunham, Bill "Bojangles" Robinson, Alvin Ailey, and Misty Copeland have contributed to the shared identity of various groups;
 - (C) explain the lasting impact of the Harlem Renaissance on American culture and society, including the achievements of individuals such as Louis Armstrong, Josephine Baker, Duke Ellington, Langston Hughes, Sargent Johnson, Jules Bledsoe, Paul Robeson, Augusta Savage, and James VanDerZee;
 - (D) describe the reactions to and the influence of selected works by African American authors such as The Souls of Black Folk by W.E.B. Du Bois, Native Son by Richard Wright, Their Eyes Were Watching God by Zora Neale Hurston, and Eyes on the Prize by Henry Hampton;

- (E) describe storytelling, literary, filmmaking, and visual arts contributions related to self-identity made by African Americans such as Oscar Micheaux, John T. Biggers, Lorraine Hansberry, Amiri Baraka, Sidney Poitier, Maya Angelou, Faith Ringgold, August Wilson, bell hooks, Spike Lee, John Singleton, and Oprah Winfrey;
 - (F) describe how characteristics of African American history and culture have been reflected in various genres of art, music, film, theatre, visual arts, and dance; and
 - (G) analyze the impact of popular culture on African Americans during significant eras.
- (15) Science, technology, and society. The student understands how African American achievements in science and technology have contributed to economic and social development in the United States. The student is expected to:
- (A) identify examples of how advances made by African civilizations in areas such as astronomy, mathematics, architecture, and engineering have contributed to science and technology in the United States;
 - (B) identify examples of how industrialization was influenced by African Americans over time; and
 - (C) describe the contributions of significant African American individuals to science, philosophy, mathematics, and technology, including Benjamin Banneker, George Washington Carver, Granville Woods, Mary Jackson, Katherine Johnson, Henrietta Lacks, Dorothy Vaughan, Mae Jemison, and Neil deGrasse Tyson.
- (16) Social studies skills. The student understands how historians use historiography to interpret the past and applies critical-thinking skills to organize and use information acquired from a variety of valid sources, including technology. The student is expected to:
- (A) analyze primary and secondary sources such as maps, graphs, speeches, political cartoons, and artifacts to acquire information to answer historical questions;
 - (B) analyze information by applying absolute and relative chronology through sequencing, categorizing, identifying cause-and-effect relationships, comparing and contrasting, finding the main idea, summarizing, making generalizations, making predictions, drawing inferences, and drawing conclusions;
 - (C) apply the process of historical inquiry to research, interpret, and use multiple types of sources of evidence;
 - (D) evaluate the validity of a source based on corroboration with other sources and information about the author, including points of view, frames of reference, and historical context; and
 - (E) identify bias and support with historical evidence a point of view on a social studies issue or event.
- (17) Social studies skills. The student communicates in written, oral, and visual forms. The student is expected to:
- (A) create written, oral, and visual presentations of social studies information using effective communication skills, including proper citations and avoiding plagiarism; and
 - (B) use social studies terminology correctly.
- (18) Social studies skills. The student uses geographic tools to collect, analyze, and interpret data. The student is expected to:
- (A) create a visual representation of historical information such as thematic maps, graphs, and charts; and
 - (B) pose and answer questions about geographic distributions and patterns shown on maps, graphs, charts, and available databases.

- (19) Social studies skills. The student uses problem-solving and decision-making skills, working independently and with others. The student is expected to use problem-solving and decision-making processes to identify a problem, gather information, list and consider options, consider advantages and disadvantages, choose and implement a solution, and evaluate the effectiveness of the solution.

§113.60. Social Studies Advanced Studies (One-Half Credit).

- (a) General requirements. Students shall be awarded one-half unit of credit for successful completion of this course. Students may take this course with different course content for a maximum of two credits.
- (b) Introduction. In Social Studies Advanced Studies, an elective course, students conduct in-depth research, prepare a product of professional quality, and present their findings to appropriate audiences. Students, working independently or in collaboration with a mentor, investigate a problem, issue, or concern; research the topic using a variety of technologies; and present a product of professional quality to an appropriate audience.
- (c) Knowledge and skills.
- (1) The student will investigate, independently or collaboratively, a problem, issue, or concern within a selected profession or discipline. The student is expected to:
- (A) analyze the relationship between his or her interests and career/discipline;
 - (B) review literature from varied sources from the selected career or discipline;
 - (C) identify a problem, issue, or concern;
 - (D) survey and/or interview professionals to determine the appropriateness of a project; and
 - (E) develop a proposal that includes well-defined questions, goals and objectives, rationale, and procedures for the project.
- (2) The student will demonstrate understanding of the research methods and/or technologies used in a selected profession or discipline. The student is expected to:
- (A) develop an understanding of the requirements and practices of the profession in the selected career or discipline through observation;
 - (B) simulate the methods and/or technologies used in the research process particular to the selected field or discipline; and
 - (C) review and revise the original proposal to reflect changes needed based upon preliminary research and practices.
- (3) The student will develop products that meet standards recognized by the selected profession or discipline. The student is expected to:
- (A) collaborate with the appropriate professionals to define the product;
 - (B) develop a plan for product completion;
 - (C) develop assessment criteria for successful completion of the project;
 - (D) establish the appropriateness of the product for the intended audience;
 - (E) implement the plan for product completion; and
 - (F) maintain a journal to document all phases of the implementation of the plan and reflections on learning experiences and processes.
- (4) The student will demonstrate an understanding of the selected problem, issue, or concern by explaining or justifying findings to an appropriate audience for public comment or professional response. The student is expected to:
- (A) review and revise the plan to present the findings;

- (B) make arrangements for the presentation of findings to an appropriate audience;
- (C) present findings, simulating the skills used by professionals;
- (D) consider feedback received from the audience;
- (E) reflect on the study and its potential for impact on the field; and
- (F) reflect on personal learning experiences of the study.

§113.61. Economics Advanced Studies (One-Half Credit).

- (a) General requirements. Students may take this course with different course content for a maximum of one credit. Students who are pursuing the Distinguished Achievement Program may take Economics Advanced Studies to earn state credit for developing, researching, and presenting their mentorship or independent study advanced measure.
- (b) Introduction. In Economics Advanced Studies, an elective course, students conduct in-depth research, prepare a product of professional quality, and present their findings to appropriate audiences. Students, working independently or in collaboration with a mentor, investigate a problem, issue, or concern; research the topic using a variety of technologies; and present a product of professional quality to an appropriate audience.
- (c) Knowledge and skills.
 - (1) The student will investigate, independently or collaboratively, a problem, issue, or concern within a selected profession or discipline. The student is expected to:
 - (A) analyze the relationship between his or her interests and career/discipline;
 - (B) review literature from varied sources from the selected career or discipline;
 - (C) identify a problem, issue, or concern;
 - (D) survey and/or interview professionals to determine the appropriateness of a project; and
 - (E) develop a proposal that includes well-defined questions, goals and objectives, rationale, and procedures for the project.
 - (2) The student will demonstrate understanding of the research methods and/or technologies used in a selected profession or discipline. The student is expected to:
 - (A) develop an understanding of the requirements and practices of the profession in the selected career or discipline through observation;
 - (B) simulate the methods and/or technologies used in the research process particular to the selected field or discipline; and
 - (C) review and revise the original proposal to reflect changes needed based upon preliminary research and practices.
 - (3) The student will develop products that meet standards recognized by the selected profession or discipline. The student is expected to:
 - (A) collaborate with the appropriate professionals to define the product;
 - (B) develop a plan for product completion;
 - (C) develop assessment criteria for successful completion of the project;
 - (D) establish the appropriateness of the product for the intended audience;
 - (E) implement the plan for product completion; and
 - (F) maintain a journal to document all phases of the implementation of the plan and reflections on learning experiences and processes.

- (4) The student will demonstrate an understanding of the selected problem, issue, or concern by explaining or justifying findings to an appropriate audience for public comment or professional response. The student is expected to:
- (A) review and revise the plan to present the findings;
 - (B) make arrangements for the presentation of findings to an appropriate audience;
 - (C) present findings, simulating the skills used by professionals;
 - (D) consider feedback received from the audience;
 - (E) reflect on the study and its potential for impact on the field; and
 - (F) reflect on personal learning experiences of the study.

Subchapter D. Other Social Studies Courses

§113.101. Implementation of Texas Essential Knowledge and Skills for Social Studies, Other Social Studies Courses.

Implementation of the provisions of this subchapter begins with the effective date of the provision unless otherwise noted.

§113.102. Advanced Placement (AP) United States History (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course may be used to meet either the course requirement for U.S. History for state graduation or elective course requirements.
- (b) Content requirements. Content requirements for Advanced Placement (AP) United States History are prescribed in the College Board Publication *Advanced Placement Course in United States History*, published by The College Board and in §113.41 of this title (relating to United States History Studies Since 1877 (One Credit), Adopted 2018).

§113.103. Advanced Placement (AP) European History (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course may not be used as a substitute for World History Studies.
- (b) Content requirements. Content requirements for Advanced Placement (AP) European History are prescribed in the College Board Publication *Advanced Placement Course in European History*, published by The College Board.

§113.104. Advanced Placement (AP) World History (One Credit).

- (a) General requirements. Students shall be awarded one credit for successful completion of this course. This course may be used as a substitute for World History Studies.
- (b) Content requirements. Content requirements for Advanced Placement (AP) World History are prescribed in the College Board Publication *Advanced Placement Course Description in World History*, published by The College Board and in §113.42 of this title (relating to World History Studies (One Credit), Adopted 2018).

§113.105. Advanced Placement (AP) Human Geography (One-Half to One Credit).

- (a) General requirements. Students shall be awarded either one-half credit or one credit for successful completion of this course. When completed for one credit, this course may be used as a substitute for World Geography Studies. When completed for one-half credit, this course may be used to meet only elective course requirements.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Human Geography are prescribed in the College Board Publication *Advanced Placement Course Description in Human Geography*, published by The College Board and in §113.43 of this title (relating to World Geography Studies (One Credit), Adopted 2018) when taught as a one credit course. Content requirements for AP Human Geography are prescribed in the College Board Publication *Advanced Placement Course Description in Human Geography*, published by The College Board when taught as a one-half credit course.

§113.106. Advanced Placement (AP) U.S. Government and Politics (One-Half Credit).

- (a) General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet the course requirement in Government for state graduation.
- (b) Content requirements. Content requirements for Advanced Placement (AP) U.S. Government and Politics are prescribed in the College Board Publication *Advanced Placement Course in U.S. Government and*

Politics, published by The College Board and in §113.44 of this title (relating to United States Government (One-Half Credit), Adopted 2018).

§113.107. Advanced Placement (AP) Comparative Government and Politics (One-Half Credit).

- (a) General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Comparative Government and Politics are prescribed in the College Board Publication *Advanced Placement Course in Comparative Government and Politics*, published by The College Board.

§113.108. Advanced Placement (AP) Psychology (One-Half Credit).

- (a) General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Psychology are prescribed in the College Board Publication *Advanced Placement Course in Psychology*, published by The College Board.

§113.109. International Baccalaureate (IB) History Standard Level (SL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB History SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.110. International Baccalaureate (IB) History of Africa and the Middle East Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB History of Africa and the Middle East HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.111. International Baccalaureate (IB) History of the Americas Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. One credit may be used to meet the course requirement in United States history for state graduation; the other credit may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB History of the Americas HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.41 of this title (relating to United States History Studies Since 1877 (One Credit), Adopted 2018).

§113.112. International Baccalaureate (IB) History of Asia and Oceania Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB History of Asia and Oceania HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.113. International Baccalaureate (IB) History of Europe Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB History of Europe HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.114. International Baccalaureate (IB) Geography Standard Level (SL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet required course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Geography SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.43 of this title (relating to World Geography Studies (One Credit), Adopted 2018).

§113.115. International Baccalaureate (IB) Geography Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. One credit may be used to meet the course requirement in World Geography Studies for state graduation; the other credit may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Geography HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.43 of this title (relating to World Geography Studies (One Credit), Adopted 2018).

§113.116. International Baccalaureate (IB) Psychology Standard Level (SL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Psychology SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.117. International Baccalaureate (IB) Psychology Higher Level (HL) (Two Credits).

- (a) General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Psychology HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.118. International Baccalaureate (IB) Social and Cultural Anthropology Standard Level (SL) (Two Credits).

- (a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Social and Cultural Anthropology SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.

§113.119. International Baccalaureate (IB) Social and Cultural Anthropology Higher Level (HL) (Two Credits).

- (a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.

- (b) Content requirements. Content requirements for IB Social and Cultural Anthropology HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.

§113.120. International Baccalaureate (IB) World Religions Standard Level (SL) (Two Credits).

- (a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB World Religions SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.

§113.121. International Baccalaureate (IB) Global Politics Standard Level (SL) (Two Credits).

- (a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Global Politics SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.

§113.122. International Baccalaureate (IB) Global Politics Higher Level (HL) (Two Credits).

- (a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Global Politics HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.

§113.123. Advanced Placement (AP) Microeconomics (One-Half Credit).

- (a) General requirements. This course may be used to meet required course requirements for state graduation. If Microeconomics is used to meet the required course requirement for state graduation, Macroeconomics may be used as a state-approved elective.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Microeconomics are prescribed in the College Board Publication *Advanced Placement Course in Microeconomics* published by The College Board.

§113.124. Advanced Placement (AP) Macroeconomics (One-Half Credit).

- (a) General requirements. This course may be used to meet required course requirements for state graduation. If Macroeconomics is used to meet the required course requirement for state graduation, Microeconomics may be used as a state-approved elective.
- (b) Content requirements. Content requirements for Advanced Placement (AP) Macroeconomics are prescribed in the College Board Publication *Advanced Placement Course in Macroeconomics* published by The College Board.

§113.125. International Baccalaureate (IB) Economics Standard Level (SL) (Two Credits).

- (a) General requirements. One-half credit may be used to meet the course requirement in Economics for state graduation and one and one-half credits may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Economics SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.126. International Baccalaureate (IB) Economics Higher Level (HL) (Two Credits).

- (a) General requirements. One-half credit may be used to meet the course requirement in Economics for state graduation and one and one-half credits may be used to meet only elective course requirements for state graduation.
- (b) Content requirements. Content requirements for IB Economics HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.51. Implementation of Texas Essential Knowledge and Skills for Social Studies, Other Social Studies Courses.

- (a) The provisions of §§113.52-113.75 of this subchapter shall be implemented by school districts beginning September 1, 1998.
- (b) The provisions of §§113.76-113.80 of this subchapter shall be implemented by school districts beginning with the 2019-2020 school year.

§113.52. Social Studies Advanced Studies (One Half Credit).

- (a) General requirements. Students shall be awarded one-half unit of credit for successful completion of this course. Students may take this course with different course content for a maximum of two credits.
- (b) Introduction. In Social Studies Advanced Studies, an elective course, students conduct in-depth research, prepare a product of professional quality, and present their findings to appropriate audiences. Students, working independently or in collaboration with a mentor, investigate a problem, issue, or concern; research the topic using a variety of technologies; and present a product of professional quality to an appropriate audience.
- (c) Knowledge and skills.
 - (1) The student will investigate, independently or collaboratively, a problem, issue, or concern within a selected profession or discipline. The student is expected to:
 - (A) analyze the relationship between his or her interests and career/discipline;
 - (B) review literature from varied sources from the selected career or discipline;
 - (C) identify a problem, issue, or concern;
 - (D) survey and/or interview professionals to determine the appropriateness of a project; and
 - (E) develop a proposal that includes well-defined questions, goals and objectives, rationale, and procedures for the project.
 - (2) The student will demonstrate understanding of the research methods and/or technologies used in a selected profession or discipline. The student is expected to:
 - (A) develop an understanding of the requirements and practices of the profession in the selected career or discipline through observation;
 - (B) simulate the methods and/or technologies used in the research process particular to the selected field or discipline; and
 - (C) review and revise the original proposal to reflect changes needed based upon preliminary research and practices.
 - (3) The student will develop products that meet standards recognized by the selected profession or discipline. The student is expected to:
 - (A) collaborate with the appropriate professionals to define the product;
 - (B) develop a plan for product completion;
 - (C) develop assessment criteria for successful completion of the project;

- ~~(D) — establish the appropriateness of the product for the intended audience;~~
- ~~(E) — implement the plan for product completion; and~~
- ~~(F) — maintain a journal to document all phases of the implementation of the plan and reflections on learning experiences and processes.~~
- ~~(4) — The student will demonstrate an understanding of the selected problem, issue, or concern by explaining or justifying findings to an appropriate audience for public comment or professional response. The student is expected to:~~
 - ~~(A) — review and revise the plan to present the findings;~~
 - ~~(B) — make arrangements for the presentation of findings to an appropriate audience;~~
 - ~~(C) — present findings, simulating the skills used by professionals;~~
 - ~~(D) — consider feedback received from the audience;~~
 - ~~(E) — reflect on the study and its potential for impact on the field; and~~
 - ~~(F) — reflect on personal learning experiences of the study.]~~

§113.53. Advanced Placement (AP) United States History (One Credit).]

- ~~(a) — General requirements. Students shall be awarded one credit for successful completion of this course. This course may be used to meet either the course requirement for U.S. History for state graduation or elective course requirements.~~
- ~~(b) — Content requirements. Content requirements for Advanced Placement (AP) United States History are prescribed in the College Board Publication *Advanced Placement Course in United States History*, published by The College Board and in §113.41 of this title (relating to United States History Studies Since 1877 (One Credit), Beginning with School Year 2011–2012).]~~

§113.54. Advanced Placement (AP) European History (One Credit).]

- ~~(a) — General requirements. Students shall be awarded one credit for successful completion of this course. This course may not be used as a substitute for World History Studies.~~
- ~~(b) — Content requirements. Content requirements for Advanced Placement (AP) European History are prescribed in the College Board Publication *Advanced Placement Course in European History*, published by The College Board.]~~

§113.55. Advanced Placement (AP) World History (One Credit).]

- ~~(a) — General requirements. Students shall be awarded one credit for successful completion of this course. This course may be used as a substitute for World History Studies.~~
- ~~(b) — Content requirements. Content requirements for Advanced Placement (AP) World History are prescribed in the College Board Publication *Advanced Placement Course Description in World History*, published by The College Board and in §113.42 of this title (relating to World History Studies (One Credit), Beginning with School Year 2011–2012).]~~

§113.56. Advanced Placement (AP) Human Geography (One-Half to One Credit).]

- ~~(a) — General requirements. Students shall be awarded either one-half credit or one credit for successful completion of this course. When completed for one credit, this course may be used as a substitute for World Geography Studies. When completed for one-half credit, this course may be used to meet only elective course requirements.~~
- ~~(b) — Content requirements. Content requirements for Advanced Placement (AP) Human Geography are prescribed in the College Board Publication *Advanced Placement Course Description in Human Geography*, published by The College Board and in §113.43 of this title (relating to World Geography Studies (One Credit), Beginning with School Year 2011–2012) when taught as a one-credit course. Content~~

requirements for AP Human Geography are prescribed in the College Board Publication *Advanced Placement Course Description in Human Geography*, published by The College Board when taught as a one-half credit course.]

§113.57. Advanced Placement (AP) U.S. Government and Politics (One Half Credit):

- [(a) — General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet the course requirement in Government for state graduation.]
- [(b) — Content requirements. Content requirements for Advanced Placement (AP) U.S. Government and Politics are prescribed in the College Board Publication *Advanced Placement Course in U.S. Government and Politics*, published by The College Board and in §113.44 of this title (relating to United States Government (One Half Credit), Beginning with School Year 2011-2012).]

§113.58. Advanced Placement (AP) Comparative Government and Politics (One-Half Credit):

- [(a) — General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.]
- [(b) — Content requirements. Content requirements for Advanced Placement (AP) Comparative Government and Politics are prescribed in the College Board Publication *Advanced Placement Course in Comparative Government and Politics*, published by The College Board.]

§113.59. Advanced Placement (AP) Psychology (One-Half Credit):

- [(a) — General requirements. Students shall be awarded one-half credit for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.]
- [(b) — Content requirements. Content requirements for Advanced Placement (AP) Psychology are prescribed in the College Board Publication *Advanced Placement Course in Psychology*, published by The College Board.]

§113.60. International Baccalaureate (IB) History Standard Level (SL) (Two Credits):

- [(a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.]
- [(b) — Content requirements. Content requirements for IB History SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.]

§113.61. International Baccalaureate (IB) History of Africa and the Middle East Higher Level (HL) (Two Credits):

- [(a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.]
- [(b) — Content requirements. Content requirements for IB History of Africa and the Middle East HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.]

§113.62. International Baccalaureate (IB) History of the Americas Higher Level (HL) (Two Credits):

- [(a) — General requirements. Students shall be awarded two credits for successful completion of this course. One credit may be used to meet the course requirement in United States history for state graduation; the other credit may be used to meet only elective course requirements for state graduation.]
- [(b) — Content requirements. Content requirements for IB History of the Americas HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.41 of this title (relating to United States History Studies Since 1877 (One Credit), Beginning with School Year 2011-2012).]

§113.63. International Baccalaureate (IB) History of Asia and Oceania Higher Level (HL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB History of Asia and Oceania HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.64. International Baccalaureate (IB) History of Europe Higher Level (HL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB History of Europe HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.65. International Baccalaureate (IB) Geography Standard Level (SL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet required course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB Geography SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.43 of this title (relating to World Geography Studies (One Credit), Beginning with School Year 2011-2012).

§113.66. International Baccalaureate (IB) Geography Higher Level (HL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. One credit may be used to meet the course requirement in World Geography Studies for state graduation; the other credit may be used to meet only elective course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB Geography HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America and in §113.43 of this title (relating to World Geography Studies (One Credit), Beginning with School Year 2011-2012).

§113.67. International Baccalaureate (IB) Psychology Standard Level (SL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB Psychology SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.68. International Baccalaureate (IB) Psychology Higher Level (HL) (Two Credits):

- (a) — General requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.
- (b) — Content requirements. Content requirements for IB Psychology HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.

§113.71. International Baccalaureate (IB) Social and Cultural Anthropology Standard Level (SL) (Two Credits):

- (a) — General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.

~~(b) Content requirements. Content requirements for IB Social and Cultural Anthropology SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.]~~

§113.72. International Baccalaureate (IB) Social and Cultural Anthropology Higher Level (HL) (Two Credits):

~~(a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.~~

~~(b) Content requirements. Content requirements for IB Social and Cultural Anthropology HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.]~~

§113.73. International Baccalaureate (IB) World Religions Standard Level (SL) (Two Credits):

~~(a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.~~

~~(b) Content requirements. Content requirements for IB World Religions SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.]~~

§113.74. International Baccalaureate (IB) Global Politics Standard Level (SL) (Two Credits):

~~(a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.~~

~~(b) Content requirements. Content requirements for IB Global Politics SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.]~~

§113.75. International Baccalaureate (IB) Global Politics Higher Level (HL) (Two Credits):

~~(a) General Requirements. Students shall be awarded two credits for successful completion of this course. This course may be used to meet only elective course requirements for state graduation.~~

~~(b) Content requirements. Content requirements for IB Global Politics HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from the International Baccalaureate of North America.]~~

§113.76. Economics Advanced Studies (One Half Credit):

~~(a) General requirements. Students may take this course with different course content for a maximum of one credit. Students who are pursuing the Distinguished Achievement Program may take Economics Advanced Studies to earn state credit for developing, researching, and presenting their mentorship or independent study advanced measure.~~

~~(b) Introduction. In Economics Advanced Studies, an elective course, students conduct in depth research, prepare a product of professional quality, and present their findings to appropriate audiences. Students, working independently or in collaboration with a mentor, investigate a problem, issue, or concern; research the topic using a variety of technologies; and present a product of professional quality to an appropriate audience.~~

~~(c) Knowledge and skills:~~

~~(1) The student will investigate, independently or collaboratively, a problem, issue, or concern within a selected profession or discipline. The student is expected to:~~

~~(A) analyze the relationship between his or her interests and career/discipline;~~

~~(B) review literature from varied sources from the selected career or discipline;~~

- ~~(C) — identify a problem, issue, or concern;~~
- ~~(D) — survey and/or interview professionals to determine the appropriateness of a project; and~~
- ~~(E) — develop a proposal that includes well-defined questions, goals and objectives, rationale, and procedures for the project.~~
- ~~(2) — The student will demonstrate understanding of the research methods and/or technologies used in a selected profession or discipline. The student is expected to:~~
 - ~~(A) — develop an understanding of the requirements and practices of the profession in the selected career or discipline through observation;~~
 - ~~(B) — simulate the methods and/or technologies used in the research process particular to the selected field or discipline; and~~
 - ~~(C) — review and revise the original proposal to reflect changes needed based upon preliminary research and practices.~~
- ~~(3) — The student will develop products that meet standards recognized by the selected profession or discipline. The student is expected to:~~
 - ~~(A) — collaborate with the appropriate professionals to define the product;~~
 - ~~(B) — develop a plan for product completion;~~
 - ~~(C) — develop assessment criteria for successful completion of the project;~~
 - ~~(D) — establish the appropriateness of the product for the intended audience;~~
 - ~~(E) — implement the plan for product completion; and~~
 - ~~(F) — maintain a journal to document all phases of the implementation of the plan and reflections on learning experiences and processes.~~
- ~~(4) — The student will demonstrate an understanding of the selected problem, issue, or concern by explaining or justifying findings to an appropriate audience for public comment or professional response. The student is expected to:~~
 - ~~(A) — review and revise the plan to present the findings;~~
 - ~~(B) — make arrangements for the presentation of findings to an appropriate audience;~~
 - ~~(C) — present findings, simulating the skills used by professionals;~~
 - ~~(D) — consider feedback received from the audience;~~
 - ~~(E) — reflect on the study and its potential for impact on the field; and~~
 - ~~(F) — reflect on personal learning experiences of the study.]~~

§113.77. Advanced Placement (AP) Microeconomics (One Half Credit):

- ~~[(a) — General requirements. This course may be used to meet required course requirements for state graduation. If Microeconomics is used to meet the required course requirement for state graduation, Macroeconomics may be used as a state approved elective.~~
- ~~[(b) — Content requirements. Content requirements for Advanced Placement (AP) Microeconomics are prescribed in the College Board Publication *Advanced Placement Course in Microeconomics* published by The College Board.]~~

§113.78. Advanced Placement (AP) Macroeconomics (One Half Credit):

- ~~[(a) — General requirements. This course may be used to meet required course requirements for state graduation. If Macroeconomics is used to meet the required course requirement for state graduation, Microeconomics may be used as a state approved elective.~~

~~(b) — Content requirements. Content requirements for Advanced Placement (AP) Macroeconomics are prescribed in the College Board Publication *Advanced Placement Course in Macroeconomics* published by The College Board.]~~

~~§113.79. International Baccalaureate (IB) Economics Standard Level (SL) (Two Credits.)~~

~~(a) — General requirements. One half credit may be used to meet the course requirement in Economics for state graduation and one and one half credits may be used to meet only elective course requirements for state graduation.~~

~~(b) — Content requirements. Content requirements for IB Economics SL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.]~~

~~§113.80. International Baccalaureate (IB) Economics Higher Level (HL) (Two Credits.)~~

~~(a) — General requirements. One half credit may be used to meet the course requirement in Economics for state graduation and one and one half credits may be used to meet only elective course requirements for state graduation.~~

~~(b) — Content requirements. Content requirements for IB Economics HL are prescribed by the International Baccalaureate Organization. Subject guides may be obtained from International Baccalaureate of North America.]~~

Proclamation 2022 of the State Board of Education Advertising for Bids on Instructional Materials

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item provides an opportunity for the State Board of Education (SBOE) to issue *Proclamation 2022*, calling for instructional materials for health and physical education. Instructional materials submitted in response to *Proclamation 2022* would be scheduled for adoption by the SBOE in November 2021.

STATUTORY AUTHORITY: Texas Education Code (TEC), [§31.022](#).

TEC, §31.022 requires the SBOE to adopt rules to provide for a full and complete investigation of instructional materials for each subject in the foundation curriculum and for each subject in the enrichment curriculum.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: Health instructional materials were last adopted by the SBOE under *Proclamation 2002* for implementation in the 2005–06 school year. Health instructional materials under *Proclamation 2002* were readopted 2011–15 and 2015–19. There are currently no health or physical education instructional materials adopted by the SBOE. *Proclamation 2010* was issued by the SBOE in November 2007. *Proclamation 2011* was issued by the SBOE in May 2008. In May 2010, the board voted to postpone *Proclamation 2012* indefinitely. In its place, the board issued a Request for Supplemental Science Materials for science, grades 5–8, Biology, Chemistry, Integrated Physics and Chemistry (IPC), and Physics. *Proclamation 2014* was issued by the SBOE in April 2012. *Proclamation 2015* was issued by the SBOE in April 2013. At the July 2014 meeting, the board took action to delay the effective date of *Proclamation 2016* for one calendar year and to combine the subject areas that were scheduled to be included in *Proclamation 2016* with those that were scheduled to be included in *Proclamation 2017*. *Proclamation 2017* was issued by the SBOE in April 2015. *Proclamation 2018* was issued by the SBOE in November 2016. *Proclamation 2019* was issued by the SBOE in April 2017. *Proclamation 2020* was issued by the SBOE in April 2018. *Proclamation 2021* was issued by the SBOE in June 2019.

BACKGROUND INFORMATION AND JUSTIFICATION: A revised adoption cycle for instructional materials was approved by the SBOE in January 2012. The cycle was adjusted in July 2017. The SBOE most recently revised the adoption cycle in September 2019.

PUBLIC BENEFIT AND COST TO PERSONS: Benefits include the availability of instructional materials aligned to new and revised standards in the year in which new and revised standards are implemented. There is no anticipated economic cost to persons who are required to comply with the proposal.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve *Proclamation 2022* of the State Board of Education Advertising for Bids for Instructional Materials.

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services

Kelly Callaway, Senior Director, Instructional Materials

Attachment:

Proclamation 2022 of the State Board of Education Advertising for Bids on Instructional Materials

Proclamation 2022

To Be Issued April 2020

DRAFT

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Introduction

This proclamation serves as a notice to publishers, the public, and education service centers (ESCs) that the State Board of Education (SBOE) is inviting bids to furnish instructional materials for the following courses:

Chapter 115. Texas Essential Knowledge and Skills for Health Education

- Kindergarten
- Grade 1
- Grade 2
- Grade 3
- Grade 4
- Grade 5
- Grade 6
- Grades 7–8
- Health I, Grades 9–10*
- Advanced Health, Grades 11–12*

Chapter 116. Texas Essential Knowledge and Skills for Physical Education

- Kindergarten
- Grade 1
- Grade 2
- Grade 3
- Grade 4
- Grade 5
- Grade 6
- Grade 7
- Grade 8
- Foundations of Personal Fitness*
- Adventure/Outdoor Education*
- Aerobic Activities*
- Individual Sports*
- Team Sports*

*Course title is subject to change and will be updated once the new standards are adopted by the SBOE.

In this proclamation you will find an [adoption timeline](#), [list of deliverables and requirements](#), [enrollment information](#), a link to the Texas Essential Knowledge and Skills (TEKS), and a [glossary of terms](#). Additional information and specific instructions for publishers can be found in the *Publisher Handbook*, which will be available on the [Texas Education Agency \(TEA\) website](#).

To be eligible for adoption, instructional materials submitted in response to this proclamation must cover at least 50% of the TEKS for the subject and grade level for which the materials are intended in both the material intended for student use and intended for teacher use. All materials submitted must also be suitable for the subject and grade level and reviewed by academic experts. Additionally, the materials must comply with applicable manufacturing standards and be free from factual errors at the time they are delivered to schools.

Instructional materials submitted in response to this proclamation may be

- new instructional materials developed to align to the TEKS, or
- existing instructional materials that have been aligned to the revised TEKS.

Publishers with materials on the current adopted list for the courses included in this proclamation can also submit supplemental materials to address the new or expanded TEKS. Publishers that submit new products must also provide new correlations to any currently adopted materials if they plan to continue selling those materials.

The submission of [open-education-resource materials](#) is welcome under this proclamation (TAC §66.27(g)(9)).

Instructional materials submitted in response to this proclamation will be reviewed by the state review panels (SRPs) to determine the extent to which the materials meet the required TEKS and to identify factual errors. At the completion of the review, the panels will report their findings to the commissioner of education.

The panels' findings serve as the basis for the commissioner of education's report to the SBOE regarding instructional materials eligible for adoption. Instructional materials found to have extensive errors or to be of a quality not acceptable in schools at initial review may be rejected by the SBOE (TAC §66.66(e)). The SBOE is scheduled to vote on *Proclamation 2022* materials at its November 2021 meeting. The SBOE's determination is final.

Instructional materials adopted under this proclamation are scheduled to be implemented beginning in the 2022–23 school year. Adopted materials can be purchased using technology and instructional materials allotment funds and can be ordered by Texas public schools through EMAT, the Texas instructional materials ordering system. Publishers cannot make changes to adopted materials without the prior review and consent by the commissioner of education or the SBOE (TAC §§66.75 and 66.76). Publishers can make technical enhancements to adopted electronic programs that do not affect content.

Publishers are responsible for all expenses incurred by their participation in this proclamation (TAC §66.28(b)).

All documents and forms must be submitted in a format approved by the commissioner of education.

All publishers should carefully read and fully understand the requirements listed in this proclamation as well as both the state statutes and the administrative rules that govern the review and adoption of instructional materials process.

Chapter 31 of the Texas Education Code (TEC) is available at <https://statutes.capitol.texas.gov/Docs/ED/htm/ED.31.htm>.

Chapter 66 of the Texas Administrative Code (TAC), Title 19, is available at <http://ritter.tea.state.tx.us/rules/tac/chapter066/index.html>.

























Adoption Timeline





























This adoption timeline includes deadlines and information that is applicable to publishers, the public, education service centers, districts and charter schools, the SBOE, and the agency. Please use the icons in the legend to identify the responsible parties for each applicable deliverable.

Legend						
Responsible Party:	Publishers	Public	ESCs	TEA	Districts and Charter Schools	SBOE
Icon:						


























Please see the *Deliverables and Requirements* sections in this proclamation for further details on specific deliverables and requirements for publishers and ESCs.


























2020			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
January 28–31	<i>Proclamation 2022</i> is presented to the SBOE for discussion.		
February–April	TEA conducts a webinar to introduce <i>Proclamation 2022</i> and solicit feedback.		
April	Nominations to the SRP are accepted via the Education Committee Application .		
April 14–17	<i>Proclamation 2022</i> is presented to the SBOE for action.		
May–September	TEA releases the <i>Proclamation 2022 Publisher Handbook</i> .		
September 8–11	<i>Proclamation 2022 Questions and Answers</i> is presented to the SBOE for approval.		














2020 (continued)			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
October–November	TEA conducts a webinar for publishers interested in participating in <i>Proclamation 2022</i> .		
Monday, December 7	The Company Information Form and Statement of Intent to Bid are due to TEA.		
2021			
Monday, January 11	The Complete Description is due to TEA.		
	Each ESC must designate the person who will supervise the sample materials and publish a news release notifying area districts about the availability of materials .		 
Monday, January 25	Preliminary correlation document for one course is due to TEA.		
March	TEA notifies education committee candidates of their appointment to the SRP.		 
Monday, April 5	Pre-adoption samples are due to TEA.		  
	Pre-adoption samples are due to each of the twenty ESCs.		
	Final correlation documents are due to TEA.		
	Final correlation documents are due to each of the twenty ESCs.		

2021 (continued)			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
Monday, April 5 (continued)	The Certification of Editorial Review is due to TEA.		
	The Affidavit of Authorship or Contribution is due to TEA.		
	The Report on Interoperability and Ease of Use is due to TEA.		 
Monday, April 12	ESCs must notify TEA of any irregularities in sample materials submitted by publishers.		 
April–May	TEA provides details (dates/location) of upcoming SRP meetings to publishers.		
June–July	TEA hosts SRP meetings .		 
August	TEA releases the preliminary report on instructional materials under consideration.		   
Monday, August 16	Requests for show-cause hearings are due to TEA from eligible publishers that elect to protest the preliminary report.		
Monday, August 23	Electronic samples of new content provided to and approved by the SRP are due to TEA.		
	The List of Corrections and Editorial Changes is due to TEA.		
	The Application for Texas Identification Number is due to TEA from publishers without EMAT username and password.		











2021 (continued)















Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
September	TEA posts public and SRP comments and lists of alleged errors, editorial changes, and new content to the agency website.		   
	The SBOE holds a public hearing on instructional materials under consideration for adoption.		 
Monday, September 20	The Order Processing Information Form and initial official bids are due to TEA.		
October	TEA posts the <i>Report of Required Corrections and Approved New Content</i> to the agency website.		  
	TEA posts the <i>List of Instructional Materials Eligible for Adoption</i> to the agency website.		   
Monday, October 18	The Certification of Intent to Correct is due to TEA.		
	The Disclosure of Campaign Contributions and Gifts is due to TEA.		
Monday, fourteen days prior to the vote by SBOE at November meeting; actual date TBA	Official written comments and alleged factual errors from Texas residents concerning materials under consideration are due to TEA.		

2021 (continued)			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
Tuesday, seven business days prior to the vote by SBOE at November meeting; actual date TBD	Content changes made in materials under consideration in response to public comment are due to TEA.		  
	An updated List of Corrections and Editorial Changes is due to TEA.		  
Thursday, five business days prior to the vote by SBOE at November meeting; actual date TBD	TEA posts content changes to materials made by publishers in response to public comment to the agency website.		 
Wednesday prior to the vote by SBOE at November meeting; actual date TBD	Content changes made to materials under consideration in response to public testimony are due to TEA.		  
November	The SBOE votes regarding materials under consideration.		   
Wednesday, December 1	TEA posts the <i>List of Instructional Materials Adopted</i> on the agency website.		   

2021 (continued)			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
Monday, December 6	The Register of Contact is due to TEA.		
	Additional official bids are due to TEA.		 
	The Direct Deposit Form is due to TEA from those who don't have direct deposit established (optional).		
2022			
Monday, February 7	Three preliminary copies of adopted print student materials, one high-quality PDF, one copy of NIMAS files , and a screenshot from the NIMAC Validation Wizard showing that each file has passed validation is due to designated braille producer.		braille producer
	Three preliminary print copies, one high-quality PDF, and NIMAS files of blackline masters and any other materials included in the teacher component that are intended for student use are due to designated braille producer.		braille producer
	Form 1295 Certificate of Interested Parties is due to TEA.		
Monday, March 28	One complete, post-adoption sample that incorporates all required corrections and approved new content is due to TEA.		

2022 (continued)

Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
Monday, March 28 (continued)	One complete, post-adoption sample that incorporates all required corrections and approved new content is due to each of the twenty ESCs.		
	The Affidavit of Corrections and New Content is due to TEA.		
	The Certification of Compliance with Manufacturing Standards is due to TEA.		
	The Accessibility Compliance Report , along with the coversheet is due to TEA.		
	If changes were made to instructional materials between Monday, February 7, and Monday, March 28, three final complete copies of adopted print student materials, one high-quality PDF, one copy of NIMAS files, a side-by-side list of changes, and a screenshot from the NIMAC Validation Wizard showing that each file has passed validation due to the designated braille producer. If no changes were made, notice must be provided to the designated braille producer.		braille producer
	One copy of adopted print student materials , blackline masters, and any other materials included in the teacher component(s) that are intended for student use; one high-quality PDF ; one copy of NIMAS files ; and a screenshot from NIMAC Validation Wizard showing that the file passed validation are due to the designated audio producer.		audio producer

2022 (continued)			
Date	Activity or Deliverable	Responsible Party	Recipient and/or Audience
Monday, March 28 (continued)	One copy of adopted print student materials , blackline masters, and any other materials included in the teacher component(s) that are intended for student use; one high-quality PDF ; one copy of NIMAS files ; and a screenshot from NIMAC Validation Wizard showing that the file passed validation are due to the designated large-print producer.		large-print producer
	Final NIMAS files and a side-by-side list of changes made between Monday, February 7, and Monday, March 28, or notice that no changes were made are due to TEA.		
	Final NIMAS files are due to NIMAC.		NIMAC
May	TEA sends executed contracts to publishers.		
	Texas public schools that have funding available can begin submitting orders for new materials through EMAT.		 
June–August	Publishers distribute adopted materials to Texas public schools.		
	TEA conducts a confirmation of adopted materials to ensure publishers have made all corrections on the <i>Report of Required Corrections and Approved New Content</i> .		 

All deliverables due to TEA are due by 5:00 p.m. Central Time. Failure to meet any of the deadlines can result in the product's removal from consideration ([TAC §66.66\(g\)](#)).

Deliverables and Requirements for Publishers

Below is a list of deliverables and requirements that each publisher participating in this proclamation will be expected to meet. The deadline for each deliverable is provided in the [Adoption Timeline](#), and further details can be found in the *Publisher Handbook*.

A publisher's inability to meet any of the requirements by the deadline in this proclamation can result in that publisher's materials being removed from consideration for adoption ([TAC §66.66\(g\)](#)).

Accessibility Compliance Report and Cover Sheet

Publishers with adopted electronic instructional materials are required to contract with an independent third party to review each electronic student and teacher component included on official bids for compliance with WCAG 2.1 AA standards and technical standards required by the Federal Rehabilitation Act, Section 508 ([TAC §66.28\(a\)\(2\)](#)). The selected vendor must provide a compliance report that includes the *Accessibility Compliance Report Cover Sheet*.

When testing the accessibility of the materials, the auditor must take the following steps:

- Use automated web-accessibility-evaluation tools to analyze the selected pages and note any problems indicated by the tools
- Manually check pages to determine that form labels and alternative text on images and graphs is appropriate
- Manually check pages with dynamic content, forms, or other applications
- Determine whether page content and controls can be accessed, operated, and reset when necessary using only a keyboard
- Examine pages with graphical user interface (GUI) browser (e.g., Internet Explorer, Firefox, Chrome) while listening to the page with screen-reader software
- Employ and include documentation of the experience of real users with disabilities for manual testing
- Test a random sample of each different type of electronic component

The final report provided to TEA must include, at a minimum, the audit results from the following pages:

- The home page people use to enter the site
- One page with at least one table or form
- One page with at least one informational image (e.g., a diagram, map, or graph)
- One page from each component of the product
- One page with interactive content

Accessibility Compliance Report and Cover Sheet (continued)

Publishers can determine the total number of pages included in the testing. Failure to provide a report with a cover sheet and/or material that is found to not meet the required accessibility standards will result in that product's removal from the adopted list and the publisher's contract may be presented to the SBOE for termination. If the contract has not yet been terminated, the product will be returned to the adopted list (and EMAT) when the publisher certifies that the product meets the required accessibility standards and submits an updated cover sheet.

Accessibility Requirements for Electronic Materials

Publishers that offer electronic materials (e.g., CD-ROMs, DVDs, or web-based materials) are required to offer these materials in an accessible format in accordance with the technical standards of the Federal Rehabilitation Act, Section 508. The standards are available at <http://www.section508.gov/summary-section508-standards>.

Web content in materials adopted under this proclamation must be created to conform to the WCAG 2.1, Level AA, standards available at <https://www.w3.org/TR/WCAG21/>. Electronic materials that are not compliant with WCAG 2.1, Level AA, standards and with technical standards of the Federal Rehabilitation Act, Section 508, will be removed from the EMAT system and the publisher's contract may be presented to the SBOE for termination (TAC §66.28(a)(6)).

A publisher that provides access to materials to students with disabilities through an alternate format must include a link to that material on the entrance page of the main product.

Accessibility Requirements for Print Materials

Publishers that don't have an existing account with NIMAC must email nimac@aph.org to request a publisher account. The NIMAC will provide instructions to set up an account, correctly prepare metadata, and submit files. A new publisher may be required to provide a sample NIMAS file to the NIMAC for review before establishing an account.

Specific information and resources, including a list of frequently asked questions, can be found at the NIMAC website, <http://www.nimac.us/publishers-conversion-houses/>.

Please see [Certification of Compliance with Manufacturing Standards](#) for additional information.

Affidavit of Authorship or Contribution

Publishers must list everyone whose name is listed as an author or contributor and include in general terms the involvement of each author or contributor to the development of the material (TAC §66.28(h)).

Publishers cannot submit instructional materials that have been authored or contributed to by a current employee of TEA (TAC §66.28(i)). Publishers must submit one signed affidavit for each product.

Affidavit of Corrections and New Content

Publishers must verify that all corrections of factual errors have been made and confirm that all approved new content has been added to the final material. This is required as a condition of adoption by the SBOE.

Publishers must submit one signed affidavit for each adopted product (TAC §[66.28\(h\)\(1\)\(C\)](#)).

Application for Texas Identification Number

The Texas Comptroller of Public Accounts uses the Texas Identification Number (TIN) to track and process all payments made to a payee. Each publisher with adopted materials is required to have a TIN.

This TIN is also required when a publisher applies for access to the EMAT system. If a publisher already has EMAT access and there are no changes, a new application is not required.

Certification of Compliance with Manufacturing Standards

Publishers must certify that all materials meet applicable manufacturing standards in the latest edition of *Manufacturing Standards and Specifications for Textbooks*, approved by the Advisory Commission on Textbook Specifications.

The form is required for all print student materials used to demonstrate TEKS coverage and all electronic components submitted for adoption. Publishers must submit one signed form for each adopted product and component (TAC §§[66.28\(a\)\(1\)](#) and [66.66\(b\)\(2\)](#)).

Certification of Editorial Review

Publishers must affirm that all instructional materials have been edited for accuracy, content, and compliance with the requirements of the proclamation.

Publishers must submit one signed form for each product (TAC §[66.28\(m\)](#)).

Certification of Intent to Correct

Publishers must affirm that they intend to make all required corrections of factual errors and add approved new content in the final adopted material.

Publishers must submit one signed form for each product (TAC §[66.66\(b\)\(4\)](#)).

Company Information Form

Publishers must provide the contact information for individuals who will be managing their participation in this proclamation and for phone calls or emails related to deliverables, bids and contracts, accessible materials, customer service, and new sales.

Only those publishers that submit a completed form by the deadline will be allowed to participate in this proclamation process.

Complete Description

Publishers must submit information regarding each component that will be used to demonstrate standards alignment. This information will be used by TEA staff to plan for the state review meetings.

Publishers must submit one *Complete Description* for each product and each media format (TAC [§66.28\(d\)\(6\)](#)).

Content Changes in Response to Public Comment and/or Testimony

Publishers that wish to make content changes based on public comment and/or public testimony provided at the SBOE hearings are required to submit changes to TEA (TAC [§66.43](#)). TEA posts all changes to the agency website.

Correlation Document (Preliminary and Final)

Publishers must provide correlations that indicate where in each product they believe the required standards are addressed. The correlation must be submitted on a form provided by TEA (TAC [§66.28\(k\)](#)).

Correlation documents for electronic products must also include a link to the exact location where each expectation is addressed.

Publishers with electronic programs (not currently adopted) are required to embed the *Correlations to the TEKS* in the pre-adoption sample program.

Instructional materials must cover at least 50% of the TEKS in materials intended for student use and materials intended for teacher use as specified in TAC [§66.27\(h\)](#). In determining the percentage of the TEKS covered by the material, each student expectation counts as an independent element of the standards (TAC [§66.66\(b\)\(1\)](#)).

A student expectation is subdivided into constituent parts called *breakouts*. Each individual breakout must be sufficiently covered for the expectation to be considered covered and counted toward the 50% minimum requirement.

Correlation Document (Preliminary and Final) (continued)

A publisher can solicit feedback from TEA regarding the completion of their correlations by submitting preliminary correlations. Preliminary correlations should include at least two completed pages.

Direct Deposit Form

Publishers that wish to receive payments from the state of Texas directly into their checking accounts must submit the *Direct Deposit Form*. If a publisher declines this option, payments will be made by a warrant (state check) sent via the U.S. Postal Service.

Direct deposit is strongly recommended but not required. Publishers that already have direct deposit established do not have to submit a form unless payee information has changed.

If banking information changes during the adoption period, publishers must notify TEA.

Disclosure of Campaign Contributions and Gifts

Publishers must list any political contributions made by any individual or entity in the preceding four years to a candidate or member of the SBOE.

One form is required from each publisher ([SBOE Operating Rule 4.3](#)).

Electronic Copies of New Content Reviewed and Approved by the SRP

Publishers must provide electronic copies of all new content reviewed and approved by the SRP (TAC [§66.41\(f\)](#)) and confirm that final products will be updated to include all approved new content. If provided in a PDF format, copies must be fully accessible. TEA posts new content on the agency website.

Please see [Samples](#) for additional information.

Form 1295 Certification of Interested Parties

Publishers must meet reporting requirements with the Texas Ethics Commission before entering into a contract and conducting business with the state of Texas.

One form is required from each publisher each time the publisher enters into a contract with the agency (HB 1295, 84th Texas Legislature, 2015). An additional form may be required by each district a publisher does business with.

High-Quality PDF

Publishers must provide a high-quality PDF (i.e., high-resolution PDF) of their print student materials along with their print sample copies and NIMAS files to each of the designated producer(s). High-quality PDFs can be created through Adobe Acrobat DC.

Instructional Materials Contract

Publishers with materials adopted by the SBOE enter into a contract to provide the materials to all Texas public schools that order them for an initial contract period of eight years with the possibility of one contract extension for a period of no more than four years (TAC §66.72). Publishers that do not return signed contracts to TEA will have materials removed from the adopted list and the EMAT system.

List of Corrections and Editorial Changes

Publishers must provide a list of all corrections, editorial changes, and approved new content made to each component after pre-adoption samples were submitted. Publishers should include responses to errors identified by the SRP and the public and editorial changes made in response to comments from the SRP and the public.

If no changes or corrections are required, the publisher must notify TEA (TAC §66.28(l)). All errors must be corrected before adopted materials are delivered to schools (TAC §66.66(b)(4)).

Publishers must submit one document for each product.

NIMAS Files for the Production of Braille, Large-Print, and Audio Materials

Publishers must submit electronic NIMAS files and agree to allow TEA or its agents to reproduce adopted materials in a format suitable for students and teachers with visual impairments and students with other learning disabilities (TAC §66.27(g)(6)–(7)). The NIMAS Technical Specifications v1.1 can be found at <http://aem.cast.org/creating/nimas-technical-specification-annotated.html#.WG1HgU3fOrR>.

Publishers must adhere to all NIMAS guidelines that have been approved by NIMAC on or before November 30, 2020.

If the requirements for NIMAS files are not met for any specific product, that product will be removed from the adopted list and the EMAT system (TAC §66.66(g)).

Please see [Samples](#) for additional information.

Official Bids

Publishers must submit at least one bid for each product eligible for adoption, listing each component that will be offered along with the price of the material by the initial deadline. A separate bid is required for each package option a publisher wishes to include in EMAT. Each component or subcomponent offered as part of the bundle must also be available for purchase individually (TAC [§66.28\(f\)–\(g\)](#)).

Publishers can add to or replace initial bids after the initial deadline; however, additional bids may not be submitted for prices higher than were provided in the initial bids. Additional bids can only be submitted if a correct initial bid was received by the deadline.

Bids of adopted materials become *Exhibit A* of the instructional materials contract.

Order Processing Information Form

Publishers must provide information regarding how orders for adopted materials will be processed.

Register of Contact

Publishers must submit a register listing all visits, meetings, or contacts of any employee for any reason with SBOE members between January 31, 2020, and December 6, 2021, including the date, time, location, and purpose of the communication (TAC [§66.4\(b\)](#)).

Publishers must submit at least one signed form per registrant.

Report on Interoperability and Ease of Use

Publishers must provide information regarding their products' interoperability and ease of use for review by the SBOE and districts.

Publishers must submit one signed form for each product. The information from each publisher's report will be posted to the agency website.

Request for Show-Cause Hearing

Publishers that are eligible for a show-cause hearing will be notified by TEA.

Eligible publishers that elect to protest the preliminary findings of the SRP must file a request for a show-cause hearing with TEA (TAC [§66.63\(d\)](#)).

Samples

All sample materials must be provided at no cost to TEA and each of the twenty ESCs. If requested, samples must be provided to SBOE members and districts at no cost. All samples, except those provided to the SRP, are required to be submitted in electronic format. Samples provided to the SRP may be in print or electronic format. The agency does not guarantee return of samples.

Please review the specific features for pre- and post-adoption samples below.

Feature	Sample Type
Accessible to individuals with disabilities	Pre-adoption PDFs and all post-adoption
Complete and fully functional	Pre- and post-adoption
Draft watermark (suggested)	Pre-adoption
Electronic versions	Pre- and post-adoption
Embedded <i>Correlations to the TEKS</i>	Pre-adoption (electronic products only)
	Post-adoption (suggested for final electronic products)
Machine-readable TEKS	Post-adoption (electronic products only)
Multiple simultaneous users	Pre-adoption (electronic products only)
Static (Unchanged) Version	Pre-adoption
Word Search	Pre-adoption (electronic products only)
	Post-adoption (suggested for final electronic products)

Please review the additional details regarding the specific types of samples on the following page.

Samples (continued)

ESC Samples (Pre- and Post-Adoption)

Publishers must supply each of the twenty ESCs with pre- and post-adoption electronic samples.

Publishers must supply all information, including locator information and passwords, required to access the pre- and post-adoption samples. The original pre-adoption samples must remain available and unchanged until final (post-adoption) samples are submitted in March 2022 (TAC §[66.28\(d\)](#)). Access to the post-adoption sample must remain active throughout the life of the adoption (TAC §[66.39\(g\)](#)).

Public Access Samples (Pre- and Post-Adoption)

Publishers must supply TEA with all information, including locator information and passwords, required to ensure public access to their pre-adoption materials (TAC §[66.28\(d\)](#)). The access must be granted until final post-adoption samples are submitted in March 2022. TEA will post access information or accessible PDFs of the pre-adoption sample to the agency website. Publishers that wish to protect content such as test questions and answers may provide TEA with two versions—a public-facing version that does not include protected content and a full version that will not be posted online.

The original version of the pre-adoption sample must remain static and be available throughout the entire adoption process, even if updated versions become available.

Publishers are encouraged to add a draft watermark throughout pre-adoption samples to protect copyright information.

Publishers must supply TEA with all information, including locator information and passwords, required to ensure public access to their post-adoption samples for the duration of the contract period. The public can access post-adoption samples by making an appointment at the nearest ESC or through the Instructional Materials Division at TEA located in Austin, Texas.

Samples for Braille, Large-Print, and Audio Producers (Post-Adoption)

Publishers must submit three print post-adoption sample copies of adopted student materials to the designated braille, large-print, and audio material producers. Publishers must also include blackline masters or any other materials included in the teacher materials that are intended for student use.

Should a braille or large-print teacher edition be required by a district, a publisher must provide two printed teacher editions to the designated producer(s).

Samples (continued)

Samples for Braille, Large-Print, and Audio Producers (Post-Adoption) (continued)

Publishers must mark up print materials eligible for NIMAS submission that contain mathematical or scientific instructional content by using the latest applicable version of the MathML 3 module of the DAISY/NIMAS Structure Guidelines as posted and maintained at the DAISY Consortium website, available at <http://www.daisy.org/z3986/structure/SG-DAISY3/part2-math.html>.

If the requirements for samples to the designated producer(s) are not met for any specific product, that product will be removed from the adopted list and the EMAT system.

SBOE Samples (Pre-Adoption)

If requested, publishers must supply SBOE members with print samples of materials under consideration or adopted (TAC §[66.28\(a\)\(7\)](#)).

SRP Samples (Pre-Adoption)

Samples can be provided in either print or electronic format at the SRP meetings. SRP samples must be fully functional. Ancillary materials are not permitted at the SRP meetings. Samples must also be free of sales or marketing materials (TAC §[66.28\(d\)\(3\)](#)).

Publishers that provide electronic samples must provide the appropriate hardware or equipment for the review (TAC §[66.28\(d\)\(9\)](#)).

TEA will provide shipping instructions for publishers that wish to mail print samples to the location of the SRP meeting. TEA does not guarantee the return of print materials (TAC §[66.28\(d\)\(8\)](#)).

TEA Samples (Pre- and Post-Adoption)

Publishers must supply TEA with electronic pre- and post-adoption samples.

Publishers must supply TEA with all information, including locator information and passwords, required to access the pre- and post-adoption samples. The original pre-adoption samples must remain available and unchanged until final post-adoption samples are submitted in March 2022 (TAC §[66.28\(d\)\(1\)](#)). Access to electronic post-adoption samples must remain active for the duration of the contract period. Publishers are required to notify TEA if user access information changes. Publishers that do not maintain proper access for TEA and the ESCs may have materials removed from the adopted list and the EMAT system.

Post-adoption samples of electronic products must be designed to use the machine-readable TEKS provided by TEA.

TEA Samples (Pre- and Post-Adoption) (continued)

TEA will conduct random audits of final electronic post-adoption sample access information.

TEA may request additional samples if they are needed (TAC §[66.28\(e\)](#)).

Texas Public School Samples (Pre- and Post-Adoption)

At the request of a Texas school district, publishers must supply a pre- and/or post-adoption sample (TAC §[66.28\(d\)\(7\)](#)). Samples must be provided at no cost.

If samples must be returned, the publisher must notify the district in advance and provide a shipping label and date by which the sample should be shipped back (TAC §[66.101](#)).

Side-by-Side List of Changes to Braille Producer(s)

Publishers must provide a side-by-side list of changes made to pre-adoption samples when submitting corrected post-adoption sample materials to the designated braille producer(s).

Statement of Intent to Bid

Publishers interested in participating in the SBOE's process must submit one *Statement of Intent to Bid* for each product for each course for which it is intended. A publisher that does not submit a *Statement of Intent to Bid* by the deadline is not eligible to participate in the process (TAC §[66.28\(c\)](#)).

Deliverables and Requirements for ESCs

Below is a list of requirements that each of the twenty ESCs will be expected to fulfill. The deadline for each deliverable is provided in the *Adoption Timeline*.

Report of Sample Irregularities

ESCs are required to ensure public and district access to pre- and post-adoption samples. To that end, ESCs are required to notify TEA of any irregularities in electronic or sample print materials (TAC [§66.39\(b\)](#)).

ESCs may link to the pre-adoption samples on the TEA website but must also designate a time for onsite viewing. Post-adoption samples can only be viewed in person.

ESC Samples (Pre- and Post-Adoption)

Each ESC is required to provide public access to materials under consideration and adopted materials. Each ESC should designate one person to supervise access to all samples and establish reasonable public access, including access outside of normal working hours that can be scheduled by appointment. Each ESC is required to notify districts in its region and publicize the date on which samples materials will be available for review (TAC [§66.39](#)).

TEKS and Course Enrollment

The TEKS describe what students should know and be able to do for each grade level and course in the required curriculum. The table that follows provide links to the TEKS for the courses included in *Proclamation 2022* and reported course enrollment for the 2018–19 school year.*

Chapter 115. Texas Essential Knowledge and Skills for Health Education	
§115.2. Health Education, Kindergarten	42,280
§115.3. Health Education, Grade 1	85,864
§115.4. Health Education, Grade 2	89,254
§115.5. Health Education, Grade 3	91,813
§115.6. Health Education, Grade 4	94,233
§115.7. Health Education, Grade 5	92,863
§115.22. Health Education, Grade 6	23,050
§115.23. Health Education, Grades 7–8	30,533
§115.32. Health I, Grades 9–10 (One-Half Credit)	106,223
§115.33. Advanced Health, Grades 11–12	754

Chapter 116. Texas Essential Knowledge and Skills for Physical Education	
§116.2. Physical Education, Kindergarten	299,001
§116.3. Physical Education, Grade 1	2,138,074
§116.4. Physical Education, Grade 2	
§116.5. Physical Education, Grade 3	
§116.6. Physical Education, Grade 4	
§116.7. Physical Education, Grade 5	
§116.22. Physical Education, Grade 6	
§116.23. Physical Education, Grade 7	629,506
§116.24. Physical Education, Grade 8	
§116.52. Foundations of Personal Fitness (One-Half Credit)	102,349
§116.53. Adventure/Outdoor Education (One-Half Credit)	21,113
§116.54. Aerobic Activities (One-Half Credit)	34,311
§116.55. Individual Sports (One-Half Credit)	94,063
§116.56. Team Sports (One-Half Credit)	94,063

*Enrollment data will be updated to totals from the 2019–20 once the information is available.

Ethical Standards

Texas administrative rules dictate requirements and standards of publishers and appointed SRP members (Government Code, [§572.051](#) (relating to Standards of Conduct) and Texas Penal Code, [§36.02](#) (relating to Bribery)).

Publishers and SRP members are required to maintain a no-contact period that begins at appointment to the panel and ends once the preliminary report of materials under consideration is announced (TAC [§66.36\(h\)](#)).

To be eligible to serve on the SRP, nominees may not be employed by or have received funds from an individual or publishing company involved or connected to the adoption process; owned or controlled any interest valued at more than \$5,000 in a privately owned publishing company or an entity receiving funds from a publishing company involved or connected to the adoption process; or been employed by an institution of higher education that has submitted open education resources or is a publisher of materials (TAC [§66.30\(d\)](#)).

Publishers or authors may not solicit input, directly or indirectly, on original or new content from a member of the SRP for any product. This includes products under consideration and adopted products. (TAC [§66.28\(j\)](#)).

Glossary of Proclamation Terms

Below are words and terms commonly used in this proclamation.

Accessibility

Design features of products and services that ensure equitable access for people with and without disabilities

Publishers are required to ensure all materials are made accessible for all students.

Adopted Materials

Instructional materials formally adopted by the SBOE in an open meeting

Publishers are encouraged to view SBOE meeting webcasts on the agency [website](#) or attend in person.

Adoption Timeline

Schedule of adoption procedures, deadlines, and requirements of publishers, the public, ESCs, and the agency

Ancillaries

Components that are not reviewed by the SRP, are not adopted by the SBOE, and are offered for free to school districts

Breakouts

The separate parts of a student expectation

The breakouts are shown on the correlations and evaluation forms.

Citation

The identification of one specific example of content that covers one element of the TEKS

Consumable

Any instructional material component that is intended to be written in, depleted, or otherwise consumed during the first year of use

Depository

Any entity through which publishers receive and fill orders for instructional materials

Depositories must be EMAT and Electronic Data Interchange (EDI) compliant. Publishers are not required to use a depository.

EMAT

TEA's statewide electronic instructional materials management system that processes all requisitions and payments for adopted instructional materials

Texas public schools also use EMAT to requisition adopted materials and request disbursements from their technology and instructional materials allotment.

Education Service Centers (ESCs)

Public entities created by state statute (TEC, [§8.001](#)) to provide educational support programs and services to local schools and districts

Each of the twenty ESCs serves districts in a [specific geographic area](#).

Education Committee Application

Application that educators, parents, business and industry representatives complete to serve on the SRP

Enrichment Subjects

Languages other than English, health, physical education, fine arts, career and technical education, technology applications, and religious literature, including Hebrew Scriptures (Old Testament) and New Testament, and its impact on history and literature

Evaluation Instrument

A document that the SRP completes detailing where the instructional material addresses the standards and lists any errors found

Exhibit A

A document that is part of the instructional materials contract listing adopted materials and corresponding fixed prices

Foundation Subjects

English and Spanish language arts and reading, mathematics, science, and social studies

Instructional Materials

Content that conveys the essential knowledge and skills of a subject in the public-school curriculum through a medium or a combination of media for conveying information to a student

The term includes books, supplemental materials, a combination of a book, workbook, and supplemental materials, computer software, magnetic media, DVD, CD-ROM, computer courseware, online services, or an electronic medium or other means of conveying information to the student or otherwise contributing to the learning process through electronic means, including open education resources (TEC, [§31.002](#)).

Instructional Materials Division

The division of TEA that coordinates the SBOE's review and adoption of instructional materials, provides accessible instructional materials for students with disabilities, manages funds, facilitates the distribution of SBOE approved instructional materials in various media, and provides districts with access to allotment funds for allowable expenditures

International Standard Book Number (ISBN)

A unique number that identifies books and book-like products internationally

An ISBN should be assigned to each edition and variation of a book. ISBNs are issued by the registration agency that is responsible for that country or territory. In the United States, R.R Bowker is the only company authorized to administer ISBNs.

Machine-Readable TEKS

A technical format by which all standards are formatted that can be easily processed

Manufacturing Standards and Specifications for Textbooks (MSST)

The physical standards of quality and performance for K–12 instructional materials

These standards and specifications are developed by the State Instructional Material Review Association, in consultation with the American Publishers and Book Manufacturers' Institute.

Markup

A sequence of characters or other symbols that are inserted at specific places in a text file to indicate how the file is produced when it is printed or displayed or to describe the document's logical structure

The markup indicators are often called "tags."

MathML

An XML application that describes mathematical notation and captures structure and content

MathML enables mathematics to be served, received, and processed on the World Wide Web.

Multiple Simultaneous Users

Access granted to a program by several individuals at the same time

National Instructional Materials Accessibility Standard (NIMAS)

A technical standard used to produce XML-based source files, from which accessible, student-ready alternate-format versions of textbooks and core materials (e.g., braille, etextbooks, electronic talking book, large-print, etc.) can be created and distributed to students with print disabilities

No-Contact Period

The time during which SRP members are not permitted to have either direct or indirect communication with any person having an interest in the adoption process regarding the content of the instructional materials under evaluation by the panel

New Content

Content that was created in response to the report from the SRP meeting that has been reviewed and approved by the SRP only

Publishers must use a specific template to provide new content for the SRP to review.

New Citations

Citations of content in a product that was not initially cited on the correlation document and is provided to the SRP in response to the panel's report

Nonconsumable

Any instructional material component that is intended for use during the entire period of the adoption

Open Education Resource Material

Material that is freely accessible, openly licensed, and available to Texas school districts, including those available through the [Texas Gateway](#)

Proclamation

The document issued by the SBOE calling for bids for instructional materials that identifies subject areas and courses/grade levels scheduled for review and outlines requirements for participation

Proclamations are named for the year in which the materials are intended to be made available in the classroom.

Publisher Handbook

A proclamation-specific guidance document issued by TEA that contains detailed requirements and additional information about each publisher deliverable

Questions and Answers Document

A proclamation-specific document issued by the SBOE that consists of questions presented by publishers and answers provided by TEA

Show-Cause Hearing

An opportunity for eligible publishers to present evidence of required TEKS content provided to the SRP but not accurately reflected in the preliminary report

Specialized Format Materials

Published material converted into an alternative medium, such as braille, large-print, audio, or electronic text, which is exclusively for use by persons with print disabilities, as authorized by the *Vocational-Rehabilitation Act* and the *Americans with Disabilities Act*

State Review Panel (SRP)

A group of public-school teachers, university professors, parents, business and industry representatives, and other content experts that reviews instructional materials submitted for adoption to determine the extent to which the TEKS are covered and to identify factual errors

State Technology and Instructional Materials Fund

A reserve of capital comprised of an amount set aside by the SBOE from the available school fund and any amounts lawfully paid into the fund from any other source and appropriated by the Legislature

Money from the fund is used to finance the technology and instructional materials allotment.

Student Component

Any print or electronic instructional material component that is specifically intended for use by the student

Teacher Component

Any print or electronic resource that is specifically intended for use by the teacher

Teacher components may also include materials intended for use by the students.

Technology and Instructional Materials Allotment

A biennial allotment of money from the state technology and instructional materials fund to Texas public schools

Texas Education Agency (TEA)

The agency that oversees primary and secondary public education in the state of Texas

Texas Essential Knowledge and Skills (TEKS)

The state standards for foundation and enrichment curriculum, adopted by the SBOE, that identify what students should know and be able to do at the end of each grade level or course

Texas Resource Review

The online review that provides Texas educators with free, transparent, and user-friendly information about the quality of materials

Word Search

Feature in a program that allows for keywords to be located

Perkins Reauthorization and Approval of State Plan

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item provides the opportunity for the board to hear an update on the reauthorization of federal Perkins funding and approve the four-year career and technical education plan for the state of Texas in compliance with the reauthorization.

STATUTORY AUTHORITY: The statutory authority for this action is the Texas Education Code (TEC), §7.109.

TEC, §7.109 designates the State Board of Education (SBOE) as the State Board for Career and Technology Education. The commissioner is the executive officer through whom the State Board for Career and Technology Education shall carry out its policies and enforce its rules.

TEC, §7.109(d) permits the State Board for Career and Technology Education to allocate funds appropriated to the board by the legislature or federal funds received by the board under the Carl D. Perkins Vocational Education Act (20 U.S.C. Section 2301 et seq.) or other federal law to an institution or program approved by the State Board of Education, the Texas Higher Education Coordinating Board, or another state agency specified by law.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: In April 2019, the SBOE approved the Texas Perkins V Transition Plan. The SBOE discussed the draft of the Perkins State Plan in January 2020.

BACKGROUND INFORMATION AND JUSTIFICATION: On July 31, 2018, the president signed the *Strengthening Career and Technical Education for the 21st Century Act* into law. Commonly referred to as Perkins V, Section 122 (a) of the law requires each state to prepare and submit to the United States Department of Education Secretary a State plan for a four-year period, except that, during the first fiscal year following the enactment of the Act, each eligible agency may fulfill its obligation by submitting a one-year transition plan. In April 2019, the SBOE approved the Texas Perkins V Transition Plan.

The requirements in the Perkins Act support a renewed vision of career and technical education (CTE) programs for the 21st century. The Act envisions that all students will achieve challenging academic, technical, and employability skills and be prepared for high-skill, high-wage, and in-demand occupations in current or emerging professions. The Act provides an increased focus on the academic achievement of career and technical education students, alignment with regional labor market needs, and improves state and local accountability, and strengthens the connections between secondary and postsecondary education.

The required state plan narrative includes seven key areas: planning, coordination, and collaboration prior to state plan submission; program administration; provision of services to special populations; accountability and evaluation; financial requirements; and EDGAR certifications and other assurances.

The four-year career and technical education plan must be approved by the SBOE in order to meet the April 2020 submission deadline set by the United States Department of Education.

PUBLIC BENEFIT AND COST TO PERSONS: Students will achieve challenging academic, technical, and employability skills and be prepared for high-skill, high-wage, and in-demand occupations in current or emerging professions.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve the Texas State Plan for Strengthening Career and Technical Education for the 21st Century Act (Perkins V)

Staff Members Responsible:

Heather Justice, Director, College, Career, and Military Preparation

Attachment: Four-year Career and Technical Education State Plan

TEXAS STATE PLAN FOR STRENGTHENING CAREER AND TECHNICAL EDUCATION FOR THE 21ST CENTURY ACT (PERKINS V)



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U. S. Department of Education
Office of Career, Technical, and Adult Education
Strengthening Career and Technical Education for the 21st Century Act
(Perkins V) State Plan

A. State Name: Texas

B. Eligible Agency (State Board) Submitting Plan on Behalf of State: Texas Education Agency on behalf of the Texas State Board of Education

C. Person at, or officially designated by, the eligible agency, identified in Item B above, who is responsible for answering questions regarding this plan. This is also the person designated as the “authorized representative” for the agency.

1. Name: Heather Justice
2. Official Position Title: Division Director
3. Agency: Teaxs Education Agency
4. Telephone: (512) 463-9253
5. Email: Heather.Justice@tea.texas.gov

D. Individual serving as the State Director for Career and Technical Education:

Check here if this individual is the same person identified in Item C above and then proceed to Item E below.

1. Name:
2. Official Position Title:
3. Agency:
4. Telephone: ()
5. Email:

E. Type of Perkins V State Plan Submission - FY 2019 (Check one):

- 1-Year Transition Plan (FY2019 only) – *if an eligible agency selects this option, it will then complete Items G and J*
- State Plan (FY 2019-23) – *if an eligible agency selects this option, it will then complete Items G, I, and J*

F. Type of Perkins V State Plan Submission - Subsequent Years (Check one):4

- State Plan (FY 2020-23) - *if an eligible agency selects this option, it will then complete Items H, I, and J*
- State Plan Revisions (Please indicate year of submission:) - *if an eligible agency selects this option, it will then complete Items H and J*

G. Submitting Perkins V State Plan as Part of a Workforce Innovation and Opportunities Act (WIOA) Combined State Plan – FY 2019 (Check one):

- Yes
- No

H. Submitting Perkins V State Plan as Part of a Workforce Innovation and Opportunities Act (WIOA) Combined State Plan – *Subsequent Years (Check one):*

- Yes (*If yes, please indicate year of submission:*)
- No

I. Governor's Joint Signatory Authority of the Perkins V State Plan (*Fill in text box and then check one box below*):


Date Governor was sent State Plan for signature: March 25, 2020

The Governor has provided a letter that he or she is jointly signing the State plan for submission to the Department.

The Governor has not provided a letter that he or she is jointly signing the State plan for submission to the Department.

J. By signing this document, the eligible entity, through its authorized representative, agrees:

1. To the assurances, certifications, and other forms enclosed in its State plan submission; and
2. That, to the best of my knowledge and belief, all information and data included in this State plan submission are true and correct.

Authorized Representative Identified in Item C Above (Printed Name) Heather Justice	Telephone:512-463-9253
Signature of Authorized Representative 	Date: March 23, 2020

II. NARRATIVE DESCRIPTIONS

A. PLAN DEVELOPMENT AND CONSULTATION

- 1. Describe how the State plan was developed in consultation with the stakeholders and in accordance with the procedures in section 122(c)(2) of Perkins V. See Text Box 1 for the statutory requirements for State plan consultation under section 122(c)(1) of Perkins V.**

The Texas Education Agency (TEA), in collaboration with its system partners, embarked on a collaborative process to develop the Perkins V State Plan. Utilizing the framework and outcomes of the State's Workforce Board Strategic Plan, the Higher Education 60x30 plan, and the State Board of Education's Long-Range Plan for Public Education, TEA developed a process to gather information on issues and opportunities that are of strategic significance to the state of Texas.

The following activities identified key areas of focus for the Perkins V plan. These key areas of focus served as the basis of the planning process and are the backbone of the Perkins V plan. These activities included:

- Listening sessions with state agencies, local education agencies, education service centers, institutions of higher education, workforce development boards, parents, community partners, institutions, and associations.
- See TEA Appendix 1 for Perkins V Stakeholder Engagement Meetings
- See TEA Appendix 1 and THECB Appendix 1 for Perkins V Stakeholder Engagement Meetings
- Training and feedback sessions at state conferences and associations
- See TEA Appendix 1 for Perkins V Stakeholder Engagement Meetings
- Established Perkins V writing team comprised of the Texas Education Agency (TEA), Texas Workforce Commission (TWC), Texas Higher Education Coordinating Board (THECB), and the Texas Workforce Investment Council (TWIC).

Key Areas of Focus:

- Align CTE programs with high-wage, in-demand, and high skill occupations in the state of Texas
- Provide funding and opportunities for students to earn credentials (industry-based certifications, level I and II certifications, associate and bachelor's degrees)
- Reduce the burden of CTE reporting structures at the district level
- Provide opportunities for work-based learning in rural, suburban, and urban settings
- Construct, support and promote meaningful and effective CTE cross sector collaboration in Texas across secondary, postsecondary and the workforce.
- Continually improve the academic and technical content of CTE postsecondary programs as well as their administration, to reflect and respond to local, regional, and state workforce needs.
- Ensure equitable access to postsecondary CTE programs and credentials through multiple on and off-ramps for all students, with particular attention to Perkins special populations.

- The THECB and the TEA collaborated on regional focus groups and a statewide listening tour. A list of locations and events can be found in Appendix 1.

All meetings featured Perkins V context setting and information on the formation of the Perkins V State Plan. Each stakeholder session included a structured discussion designed to solicit input and feedback on questions consistent with the requirements of Perkins V, as well as participants in secondary meetings were provided a survey to select program quality indicators.

The state plan incorporated input from all stakeholders listed in section 122 (c)(2) of the Perkins V Act.

- 2. Consistent with section 122(e)(1) of Perkins V, each eligible agency must develop the portion of the State plan relating to the amount and uses of any funds proposed to be reserved for adult career and technical education, postsecondary career and technical education, and secondary career and technical education after consultation with the State agencies identified in section 122(e)(1)(A)-(C) of the Act. If a State agency, other than the eligible agency, finds a portion of the final State plan objectionable, the eligible agency must provide a copy of such objections and a description of its response in the final plan submitted to the Secretary. (Section 122(e)(2))**

The Perkins V writing team comprised of the Texas Education Agency, Texas Workforce Commission, Texas Higher Education Coordinating Board, and the Texas Workforce Investment Council. Funding conversations as well as the development and writing of the plan were discussed with this group. No objections are identified.

- 3. Describe opportunities for the public to comment in person and in writing on the State plan. (Section 122(d)(14) of Perkins V)**

- Listening Tour conducted December 2018-May 2019
- See TEA Appendix 1 and THECB Appendix 1 for Perkins V Stakeholder Engagement Meetings
- Public comment on industry-based certifications conducted January 2019-February 2019
- See TEA Appendix 1 for Perkins V Stakeholder Engagement Meetings
- Public comment on Perkins V transition plan conducted March 2019 – April 2019
- See TEA Appendix 1 for Perkins V Stakeholder Engagement Meetings
- Public comment on CTE programs of study conducted June 2019-July 2019
- See TEA Appendix 2 for Program of Study Public Comment Highlights
- Public comment on the Perkins V State Plan conducted January 2020- March 2020
- See TEA Appendix 2 for Public Comment responses
- Postsecondary Stakeholder Outreach conducted June-October 2019
- See THECB Appendix 1- Postsecondary Statewide Stakeholder Consultation Meetings

B. PROGRAM ADMINISTRATION AND IMPLEMENTATION

- 1. State's Vision for Education and Workforce Development**

- a. Provide a summary of State-supported workforce development activities (including education and training) in the State, including the degree to which the State's career and technical education programs and programs of study are aligned with and address the education and skill needs of the employers in the State identified by the State workforce development board. (Section 122(d)(1) of Perkins V)**

- The Texas Workforce System is comprised of the following entities:
- Governor’s Office of Economic Development and Tourism
- Texas Education Agency
- Texas Workforce Commission
- Texas Higher Education Coordinating Board
- Texas Veterans Commission
- Texas Juvenile Justice Department
- Texas Department of Criminal Justice (TDCJ) and its Windham School District
- Texas Health and Human Services Commission
- The Texas Association of Workforce Boards,
- Local workforce development boards,
- Community and technical colleges,
- Local adult education providers,
- Independent Local Education Agencies (LEA).

System partners serve a critical role in the development of a world-class workforce that enjoys a higher quality of life through economic, employment, and educational success by delivering programs, services, and initiatives that help Texas’ current and future workers secure competitive and sustainable employment.

Texas Workforce System Strategic Plan Vision and Mission

Vision: An innovative, world-class Texas workforce system ensures success in the dynamic global economy.

Mission: The mission of the Texas workforce system is to position Texas as a global economic leader by:

- Growing and sustaining a competitive workforce
- Aligning programs with employer needs
- Integrating system services
- Leveraging partnerships

The Texas Workforce System Strategic Plan focuses on four goals:

1. Focus on Employers
2. Engage in Partnerships
3. Align System Elements
4. Improve and Integrate Programs

Workforce system partners own components and implementation of the strategic plan (WIOA). The tables below provide the strategies for which the Texas Education Agency (TEA) is accountable. TEA holds responsibilities in goals 1, 2 and 3. TEA Appendix 3 provides the vision, mission, and goals of the Texas Workforce System Strategic Plan which also include specific activities as well as metrics for each.

Goal 1: Focus on Employers		
System Partner Strategy	Agency	System Objective
Involve business and industry in Texas Essential Knowledge and Skills review and programs of study.	TEA	Increase business and industry involvement
Use third-party, industry- based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.	TWC TEA THECB TVC TDCJ	Expand licensure and industry certification
Align career and technical education program content and outcomes with third- party, industry-based certifications.	TEA THECB	
Goal 2: Engage in Partnerships		
System Partner Strategy	Agency	System Objective
Increase access to, referral between, and outcomes of adult education programs and services.	TWC THECB	Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.
Goal 3: Align System Elements		
System Partner Strategy	Agency	System Objective
Develop and implement programs of study in community and technical colleges and align with secondary programs of study.	TEA THECB	Improve and enhance services, programs, and policies to facilitate effective and efficient transitions.

In addition to the Texas Workforce System Plan, the State Board of Education (SBOE) has developed a Long-Range Plan for Public Education which addresses the strengths, challenges, and opportunities for action across the Texas public education system. The SBOE plan highlights four focus areas of equity and access, student engagement and empowerment, family engagement and empowerment, and educator preparation, recruitment, and retention. These focus areas, when addressed by education officials, policymakers, and stakeholders, will significantly impact education in Texas. The Long-Range plan for Public Education helped shape the goals and vision of the Texas State Plan for the Strengthening Career and Technical Education for the 21st Century Act (Perkins V).

As a part of the work outlined in the State’s workforce strategic plan, The TEA engaged members of the workforce, secondary education, and higher education to advise on the development of programs of study, including coherent sequences of courses, industry-based certifications, and work-based learning to ensure students are prepared for high-skill, high-wage, and in-demand careers in Texas. The results of this work established 53 Statewide programs of study which include occupations that meet Texas labor market criteria including projected job growth, annual job openings, and the state median wage. Each program of study leads to postsecondary education, training opportunities, and aligns to statewide graduation endorsements.



Skilled Talent Pool Development Model

Similarly, the Texas Higher Education Coordinating Board (THECB) established an agency advisory committee to implement industry-driven revisions to the Workforce Education Course Manual (WECM) that is utilized by colleges statewide in development of local career and technical education programs. The committee incorporates recommendations for industry-based certifications as part of the course review process. THECB also engages advisory committees to develop statewide postsecondary programs of study. Nineteen programs of study have been approved across three career clusters: Architecture and Construction, Health Sciences, and Information Technology. Representatives from secondary education, postsecondary institutions, and relevant workforce sectors composed each advisory committee.


THECB’s Accelerate Texas program supports the strategic plan through the integration of basic skills education with career and technical training to help adults acquire skills and certificates in high-demand occupations, including Occupational Skills Awards, Level 1 Certificates, and local certifications.





- b. Describe the State’s strategic vision and set of goals for preparing an educated and skilled workforce (including special populations) and for meeting the skilled workforce needs of employers, including in existing and emerging in-demand industry sectors and occupations as identified by the State, and how the State’s career and technical education programs will help to meet these goals. (Section 122(d)(2) of Perkins V)**

The Texas Education Agency, in coordination with the Texas Workforce Commission and the Texas Higher Education Coordinating Board make up the Tri-Agency partnership. The Tri-Agency partnership works to improve outcomes for the secondary and postsecondary students of Texas by making recommendations that build the skills of the Texas workforce and advance regional economic expansion, job creation and the goals of the 60x30TX plan. 60x30TX was launched in 2015 with a clear and bold vision: to be among the highest-achieving states in the country. 60x30TX is a roadmap to help Texas reach that future through higher education.

By the year 2030, projections indicate that most jobs will require some training beyond high school. Training could include a traditional 4-year degree, a 2-year associate's, or an industry credential. Initiated by the Texas Higher Education Coordinating Board, the 60x30TX Plan is designed to ensure that a competitive and prosperous future is available for students seeking to better their lives and the lives of their families. The state has adopted 60x30TX as a collective goal.

60X30TX Goals

The four goals in the 60x30TX Plan are essential to the future prosperity of Texas. 

-  **THE OVERARCHING GOAL: 60x30**
At least 60 percent of Texans ages 25-34 will have a certificate or degree.
■ *Supports the economic future of the state*
-  **THE SECOND GOAL: COMPLETION**
At least 550,000 students in 2030 will complete a certificate, associate, bachelor's, or master's from an institution of higher education in Texas.
■ *Requires large increases among targeted groups*
-  **THE THIRD GOAL: MARKETABLE SKILLS**
All graduates from Texas public institutions of higher education will have completed programs with identified marketable skills.
■ *Emphasizes the value of higher education in the workforce*
-  **THE FOURTH GOAL: STUDENT DEBT**
Undergraduate student loan debt will not exceed 60 percent of first-year wages for graduates of Texas public institutions.
■ *Helps students graduate with manageable debt*

THECB supports achievement of the 60x30TX goals by analyzing policy and resources and providing assistance to institutions and organizations that work directly with students. Four priority strategies are highlighted in THECB's annual report:

1. Improve academic preparation for students to enter and complete higher education.
2. Promote college enrollment and completion to students and parents before high school graduation.
3. Support completion by improving the ability of students to transfer credits.
4. Mobilize education and workforce stakeholders to achieve the goals of 60x30TX.

In support of the goals of 60x30TX, THECB implemented regional targets for each of the 10 statewide higher education regions. The goal of these regional targets is to build regional infrastructure and programs with secondary districts and workforce partners. THECB provided data on student outcomes, coaching and guidance, and supportive webinars and onsite conferences. Updates on initiative outcomes and development of best practices will continue through 2020.

THECB additionally supports the goals of 60x30TX with the following THECB resources for students and parents:

- College for All Texans: A portal for students and parents seeking information about going to college. It contains information such as what students need to do to prepare for college and financial aid available to Texas students

- Grad TX: a program designed to help adults return to college and finish their bachelor’s degrees
- GenTX: Guidance on the steps students need to follow to enter college and career education, from taking the right classes and tests, to applying to colleges, and then finding the money to pay for school
- Texas CREWS: Allows users to compare wages related to various degree programs/training and career choices with the wages earned by former graduates in those fields

These 60x30TX publications further support the 60x30TX strategic plan:

- 60x30TX & Internship Programs is a toolkit for businesses and employers for integrating the goals and targets of 60x30TX into employer internship programs
- Career Readiness Guide, prepared jointly with the Texas Workforce Commission, provides guidance on preparing for a career while still in college

The vision of the Texas Education Agency’s division of College, Career and Military Preparation (CCMP) aligns Texas’s education goals with its diverse industry needs and opportunities; ensuring that all Texas high school students have access to high-quality pathways to career and college and that 65% of Texas public high school students enroll directly into postsecondary by 2030.

The mission of the CCMP Division at TEA is to collaborate with institutions of higher education and workforce partners to build pathways for student success; providing best practices to support students through pathways to college, career, and/or the military. The TEA CCMP division believes in creating generational changes for all students. This will be achieved by providing districts with effective evidence-based school models and resources and by identifying and promoting pathways that connect college to career starting in early grades. The theory of action graphic below illustrates this mission and vision.

Division of College, Career and Military Preparation Division: Theory of Action



To achieve these goals, the TEA partnered with an economist to conduct an analysis of high wage, high-skill, and in-demand occupations across the state. The work allowed the TEA to establish the 53 statewide programs of study which prepare students for occupations that meet Texas labor market criteria including projected job growth, annual job openings, and the state median wage. A list of the 53 statewide programs of study can be found in appendix XX. Texas supports all students, including special populations, with multiple workforce development strategies. Texas will provide career exploration activities and resources that are free of bias and incorporate Universal Design for Learning, comprehensive career development for academic counseling and career guidance that includes assistive technology, office of disability services information, and ADA/Section 504 requirements, equitable access to quality work-based learning opportunities and career development. Texas will provide information on nontraditional occupations in high-wage, high-skill, and in-demand fields.

Throughout the great state of Texas, companies and their workforce have boundless opportunities for success. Texas specializes in its own unique array of advanced industries such as Advanced Tech &

Manufacturing, Aerospace, Aviation & Defense, Biotechnology & Life Sciences, Energy, Information & Computer Technology and Petroleum Refining & Chemical Products.

c. Describe the State’s strategy for any joint planning, alignment, coordination, and leveraging of funds between the State’s career and technical education programs and programs of study with the State’s workforce development system, to achieve the strategic vision and goals described in section 122(d)(2) of Perkins V, including the core programs defined in section 3 of the Workforce Innovation and Opportunity Act (29 U.S.C. 3102) and the elements related to system alignment under section 102(b)(2)(B) of such Act (29 U.S.C. 3112(b)(2)(B)); and for programs carried out under this title with other Federal programs, which may include programs funded under the Elementary and Secondary Education Act of 1965 and the Higher Education Act of 1965. (Section 122(d)(3) of Perkins V)

Texas utilizes the Tri-Agency partnership to leverage funding across programs to support the goals of 60x30TX and the state’s strategic plan. The table below lists the different programs in which funding is utilized.

Agency	Initiative	State or Federal	Source of Funding
Texas Education Agency	Career and Technical Education	Federal	Perkins V
	College and Career Readiness School Models (Early College High Schools, Pathways in Technology Early College High Schools, and Texas STEM Academies)	State	Article III Rider 48; Article III Rider 47
	Texas Regional Pathways Network	Federal	Perkins V Reserve Grant Funding
	Systems of Great Schools	State	Article III Rider 41; Article III Rider 44
	Math Innovation Zones	State	Article III Rider 41
	Grow Your Own Initiatives	State	Article III Rider 41
	Beyond Grad	Federal	GEAR UP
	College and Career Readiness Outcomes Bonus	State	House Bill 3, 86th Legislative Session
	College Preparation Exam Reimbursement	State	House Bill 3, 86th Legislative Session
	Industry-Based Certification Exam Reimbursement	State	House Bill 3, 86th Legislative Session
Agency	Initiative	State or Federal	Source of Funds
Texas Higher Education Coordinating Board	Career and Technical Education	Federal, State	Perkins V, ongoing state formula funding
	Texas Affordable Baccalaureate Program	State	Legislative appropriation
	Work Study Mentorship	State	Legislative appropriation
	Perkins Leadership Grants	Federal	Perkins V
	Texas Regional Alignment Network (TXRAN)	State	Legislative appropriation
	Advise Texas	State	Legislative appropriation

Agency	Initiative	State or Federal	Source of Funding
Texas Workforce Commission	WIOA Eligible Trainer Provider System	Federal	WIOA
	Jobs for Education for Texans Grant (JET)	State	Texas Education Code, Ch. 134
	Skills Development Fund	State	Labor Code, Ch. 303
	Registered Apprenticeships	State	Texas Education Code, Ch. 133
	Local Workforce Development Board Workforce Specialists	Federal	TANF
	Internship Challenge	State	State General Revenue
	Texas Talent Connection Grants	Federal	Wagner-Peyser 7(b)

d. Describe how the eligible agency will use State leadership funds made available under section 112(a)(2) of Perkins V for each of the purposes under section 124(a) of the Act. See Text Box 2 for the required uses of State leadership funds under section 124(a) of Perkins V. (Section 122(d)(7) of Perkins V)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
Non-TRADITIONAL FIELDS in current & emerging professions	<ul style="list-style-type: none"> -Equity Association Membership and Equity Training scheduled for College, Career and Military Preparation staff and Education Service Center CTE staff; (Secondary) -Work-based learning resources, toolkit and training for all student populations(Secondary) -The CTE nontraditional and special populations recruitment contract provides services, activities, and professional development that address the promotion and understanding of non-traditional fields and employment activities for nontraditional students as well as address equity in access. (Secondary) - Study of best practices for nontraditional recruitment and success with development of field resources.(Postsecondary) -Study of best practices for special populations success with development of field resources (Postsecondary) 	<ul style="list-style-type: none"> -Equity Association Membership (Secondary) -Work-based learning resources, toolkit and training for all student populations (Secondary) -training for ESC CTE staff and CTE district administrators on addressing equity gaps in their CTE data (Secondary) -Nontraditional success projects (Postsecondary) -Special populations success projects (Postsecondary) 	<ul style="list-style-type: none"> -Equity Association Membership (Secondary) -Work-based learning resources, toolkit and training for all student populations (Secondary) -integration of GIS data to research equity in access to high wage, in-demand occupations in regions of the state (Secondary) -Nontraditional success projects (Postsecondary) -Special populations success projects (Postsecondary) 	<ul style="list-style-type: none"> -Equity Association Membership (Secondary) -Work-based learning resources, toolkit and training for all student populations (Secondary) -middle school curriculum on career exploration focusing on recruitment of non-trad and special populations (Secondary) -Nontraditional success projects (Postsecondary) -Special populations success projects (Postsecondary)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
<p>Exposure of Students to high-skill, high-wage and in-demand occupations</p>	<ul style="list-style-type: none"> -Programs of Study Regional Applications (Secondary) -The TEA to contract with economist to provide support for labor market information. (Secondary) -The regional labor market dashboards will provide LMI data related to high-skill, high-wage and in-demand occupations (Secondary) -Programs of Study Implementation Training Session (recorded webinar) (Secondary) -Comprehensive Local Needs Assessment Training Session (recorded webinar) (Secondary) -Labor Market Information training (in collaboration with Texas Workforce Commission) (Secondary) -Career and Technical Student Organization grant contributes to meeting this goal (Secondary) -Presentations and participation with Industry professional organizations to foster collaboration (braiding) of industry and education to deliver a skilled talent pool (Secondary) -Industry-based certification 1-page documents help students understand the experience and certifications needed for specific occupations (Secondary) -Pilot for Virtual Work Based Learning Opportunities (Secondary) - Projects to improve credential completion; improve career guidance, academic support, and counseling programs; develop competency-based education (CBE) curricula; develop public/private rural nursing education consortium; and embed workplace success skills into career and technical education curricula (Postsecondary) 	<ul style="list-style-type: none"> - POS Regional Applications (Secondary) -Implementation of middle school curriculum on college and career preparation; exposing students to occupations in high wage, in-demand occupations (Secondary) -Implementation of Advisor training, to build counselor and advisor capacity in career exploration aligned to high-skill, high-wage and in-demand occupations (Secondary) - postsecondary student success, programs of study, and essential workplace skills projects (Postsecondary) 	<ul style="list-style-type: none"> - POS Regional Applications (Secondary) -Implementation of online access to career exploration tools and employer outreach (Secondary) -Implementation of Effective Advising Framework, designed to strengthen local advising programs and build capacity to guide students through career exploration aligned to high-skill, high-wage and in-demand occupations (Secondary) - postsecondary student success, programs of study, and essential workplace skills projects (Postsecondary) 	<ul style="list-style-type: none"> - POS Regional Applications (Secondary) -Implementation of work-based learning continuum in early and middle grades (Secondary) - postsecondary student success, programs of study, and essential workplace skills projects (Postsecondary)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
<p>Technical assistance to Local Education Agencies</p>	<ul style="list-style-type: none"> -Labor Market Information Data Curation & Technical Assistance for Regional POS (Secondary) -Texas CTE Resource Center provides a wealth of helpful, refreshed instructional materials and professional development content. (Secondary) -IBC One page resource documents (Secondary) -POS Framework Documents updated annually (or biannual) (Secondary) -POS Justification Documents (Secondary) -POS Parent/Student Documents -POS Implementation Toolkit -Advisory Board Toolkit (Secondary) -Beyond Grad (counseling support work) (Secondary) -Postsecondary Prep Programs convenings (training) (Secondary) -Development of STEM framework, pilot, and administrator training. STEM modules will be created, and ESC staff trained on effective STEM implementation. (Secondary) -Work Based Learning training for intermediaries and CCRSM designees -Develop a pilot program for regional intermediaries (Secondary) - Technical assistance provided to CCRSM designees on blueprint implementation, including pathways, course crosswalks, work based learning, business partnerships, IHE partnerships and LMI data. (Secondary) -Launch of Effective Advising Framework (Secondary) -The CTE Administrator Professional Development will provide professional development for CTE administrators. This includes module creation for new CTE administrators as well as professional development sessions for experienced CTE administrators. (Secondary) --Landscape analysis of current CTE Administrator offerings and projected needs. (Secondary) 	<ul style="list-style-type: none"> -LMI Data Curation & Technical Assistance for Regional POS (Secondary) -Districts will receive professional development and technical assistance as a part of the STEM pilot. (Secondary) -Additional WBL training related to student and employer insurance (Secondary) -CCRSM designee training for new campuses and leadership teams to account for turn over (Secondary) -Continuation of CCRSM technical assistance for designees (Secondary) -Training and fidelity of implementation monitoring for middle school curriculum implementation (Secondary) 	<ul style="list-style-type: none"> -LMI Data Curation & Technical Assistance for Regional POS (Secondary) -Districts will receive professional development and technical assistance as a part of the STEM pilot. (Secondary) -Training for WBL data collection system (Secondary) -CCRSM designee training for new campuses and leadership teams to account for turn over (Secondary) -Continuation of CCRSM technical assistance for designees (Secondary) - Training and fidelity of implementation monitoring for Effective Advising Framework implementation (Secondary) 	<ul style="list-style-type: none"> -LMI Data Curation & Technical Assistance for Regional POS (Secondary) -Training for WBL data collection system (Secondary) -CCRSM designee training for new campuses and leadership teams to account for turn over (Secondary) -Continuation of CCRSM technical assistance for designees (Secondary)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
<p>Technical assistance to Local Education Agencies</p>	<ul style="list-style-type: none"> -Development of training modules to be delivered regionally in six to ten statewide regions. (Secondary) -Train the Trainer (TOT) sessions conducted. (Secondary) -Update existing CTE 101 online course (Secondary) -Develop CTE Administrator Guidebook (reference for CTE Administrators) (Secondary) - Award contract for CTE teacher professional development (Secondary) -The CTE Teacher Professional Development will provide professional development for CTE teachers, both new and experienced with a focus on student achievement. (Secondary) -Landscape analysis of current CTE teacher training offerings and projected needs (Secondary) -Reviews CTE Support Personnel Professional Development (Secondary) 	<ul style="list-style-type: none"> -Training Modules Implementation (Secondary) -Evaluation, review, and revision of existing training module (update and add new modules as needed) (Secondary) -Roll out CTE 101 course for CTE administrators (Secondary) -Review contact deliverables and make changes as necessary (Secondary) -Develop a coaching style follow up process to evaluate individualized results of training and provide support as needed. (Secondary) -Develop RFP for CTE support personnel PD (Secondary) Work in partnership with Special Education associations to develop guidance and tools for ensuring equitable access to Career and Technical Education (Secondary) 	<ul style="list-style-type: none"> -Training Modules Implementation for Administrators (S) -Evaluation, review, and revision of existing training modules (S) -Review contact deliverables and make changes as necessary (S) -Implement coaching style follow up process to evaluate individualized results of training and provide support as needed for teacher training (S) -Training Modules Implementation for teachers and counselors (S) -Award contract for CTE support personnel (S) -Development of training modules to be delivered regionally (six to ten statewide regions) (S) -Train the Trainer (TOT) sessions delivered (S) -Continued support and guidance for tools related to equitable access (S) 	<ul style="list-style-type: none"> -Training Modules Implementation (S) -Evaluation, review, and revision of existing training modules (S) -Review and award contract deliverables and make changes as necessary (S) -Implement coaching style follow up process to evaluate individualized results of training and provide support as needed. (S) -Training Modules Implementation (S) -Training Modules Implementation (S) -Review and award contract deliverables and make changes as necessary (S) -Training Modules Implementation (S) -Evaluation, review, and revision of existing training modules content (S) Continued support and guidance for tools related to equitable access (S)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
<p>Recruiting, preparing or retaining CTE Teachers</p>	<ul style="list-style-type: none"> -Revision of CTE teacher certifications to align with POS and to reduce barriers to entry for industry professionals and to balance entry requirements with quality measures. (Secondary) -Streamlined T&I certification requirements to reduce barriers to entry for industry professionals (Secondary) -CTE teacher technical assistance will provide services, activities, and professional development for CTE teachers that will allow all Texas LEAs to deliver quality CTE programs. (Secondary) -Grow Your Own grants awarded to applicants to design solutions for recruiting and retaining teachers (Secondary) -Grants for P-TECH priority points for Education and Training programs within the Grow your Own grants (Secondary) - Professional development projects in postsecondary advising, CTE pedagogies and modes of delivery; student equity; and other statewide professional development projects (Postsecondary) 	<ul style="list-style-type: none"> As data is collected from PD RFP, restructure new teacher induction programs (Secondary) -Release resources on teacher externships in partnership with TWC (Secondary) -Professional development projects in postsecondary advising, CTE pedagogies and modes of delivery; student equity; and other statewide professional development projects (Postsecondary) 	<ul style="list-style-type: none"> Extend supports and mentorship opportunities throughout the first year for new teachers and provide a continuum of supports for veteran teachers. (Secondary) -Professional development projects in postsecondary advising, CTE pedagogies and modes of delivery; student equity; and other statewide professional development projects (Postsecondary) 	<ul style="list-style-type: none"> -Professional development projects in postsecondary advising, CTE pedagogies and modes of delivery; student equity; and other statewide professional development projects (Postsecondary)

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
Career and Technical Student Organizations	<p>--CTSO Leadership Grant provides funding to plan and carry out elements that support the implementation of career and technical education programs and programs of study. (Secondary)</p> <p>-State CTE leadership serve on Board of Directors of CTSOs and communicate State CTE vision and mission via updates (Secondary)</p> <p>-State CTE staff will facilitate a Landscape Analysis for CTSO State performance measurements (Secondary)</p>	<p>--CTSO Leadership Grant provides funding to plan and carry out elements that support the implementation of career and technical education programs and programs of study. (Secondary)</p> <p>-State CTE leadership serve on Board of Directors of CTSOs and communicate State CTE vision and mission via updates (Secondary)</p> <p>- Evaluation, review, and revision of existing training module content (Secondary)</p>	<p>--CTSO Leadership Grant provides funding to plan and carry out elements that support the implementation of career and technical education programs and programs of study. (Secondary)</p> <p>-State CTE leadership serve on Board of Directors of CTSOs and communicate State CTE vision and mission via updates (Secondary)</p> <p>- Evaluation, review, and revision of existing training module content (Secondary)</p>	<p>--CTSO Leadership Grant provides funding to plan and carry out elements that support the implementation of career and technical education programs and programs of study. (Secondary)</p> <p>-State CTE leadership serve on Board of Directors of CTSOs and communicate State CTE vision and mission via updates to new board members (Secondary)</p> <p>- Evaluation, review, and revision of existing training module content (Secondary)</p>

LEADERSHIP FUNDING SUPPORTS	2020-2021 (YEAR 1)	2021-2022 (YEAR 2)	2022-2023 (YEAR 3)	2023-2024 (YEAR 4)
Education Service Centers	<p>-Education Service Center (ESC) Grant funds an ESC CTE specialist who provides technical assistance to LEAs. Technical assistance is provided through training, resource sharing and providing just in time communication to all LEA's. (Secondary)</p> <p>-ESC CTE staff will participate in equity training to provide depth of knowledge for technical assistance provided to LEAs (Secondary)</p> <p>-Quarterly report from the Texas Workforce Commission provides career and technical education partnership opportunities with business and industry, and Professional development opportunities for teachers and learning opportunities for students through industry mentorships, internships, summer programs, after-school programs, and career-based student leadership opportunities. (Secondary)</p>	<p>-ESC CTE staff will participate in the roll out of CTE Teacher and Administrator professional development (Secondary)</p> <p>-ESC CTE staff will participate in the review of the Comprehensive Local Needs Assessment for schools within their region (Secondary)</p>	<p>-ESC CTE staff will participate in the roll out of CTE Teacher and Administrator professional development (Secondary)</p>	<p>-ESC CTE staff will participate in the roll out of CTE Teacher and Administrator professional development (Secondary)</p> <p>-ESC CTE staff will participate in the review of the Comprehensive Local Needs Assessment for schools within their region (Secondary)</p>
State Institution Support	<p>-Funding provided to the following institutions:</p> <p>Windham LEA</p> <p>Texas School for the Deaf</p> <p>Texas School for the Blind and Visually Impaired</p> <p>Texas Juvenile Justice System</p> <p>Boys Ranch ISD</p> <p>Southwest College for the Deaf (Postsecondary)</p>	<p>-Funding provided to the following institutions:</p> <p>Windham School District</p> <p>Texas School for the Deaf Texas School for the Blind and Visually Impaired</p> <p>Texas Juvenile Justice System</p> <p>Boys Ranch ISD</p> <p>Southwest College for the Deaf (Postsecondary)</p>	<p>-Funding provided to the following institutions:</p> <p>Windham School District</p> <p>Texas School for the Deaf Texas School for the Blind and Visually Impaired</p> <p>Texas Juvenile Justice System</p> <p>Boys Ranch ISD</p> <p>Southwest College for the Deaf (Postsecondary)</p>	<p>-Funding provided to the following institutions:</p> <p>Windham School District</p> <p>Texas School for the Deaf Texas School for the Blind and Visually Impaired</p> <p>Texas Juvenile Justice System</p> <p>Boys Ranch ISD</p> <p>Southwest College for the Deaf (Postsecondary)</p>

2. Implementing Career and Technical Education Programs and Programs of Study

a. Describe the career and technical education programs or programs of study that will be supported, developed, or improved at the State level, including descriptions of the programs of study to be developed at the State level and made available for adoption by eligible recipients. (Section 122(d)(4) (A) of Perkins V)

The TEA engaged members of the workforce, secondary education, and higher education to advise on the development of programs of study, including coherent sequences of courses, industry-based certifications, and work-based learning to ensure students are prepared for high-wage, high-skill and in-demand careers in Texas.

The TEA conducted a process to identify high wage, high-skill and in-demand occupations in Texas to ensure alignment between industry and postsecondary education. The process included stakeholders from the Texas Workforce Commission, Texas Workforce Investment Council, Texas Higher Education Coordinating Board, LEA teachers and administrators, and industry representatives.

These groups comprised the industry advisory committees for each career cluster. The course sequencing methodology backwards-mapped occupations from job knowledge and skill demand, through postsecondary preparation (college, trade schools, certifications, etc.), to secondary education and triangulated data sources for the best results of labor projections alongside real-time labor data.

Phase I: Foundation occupations were identified utilizing a median growth rate of 17%, a median annual salary of \$35,339, and a minimum annual openings floor of 500, each based on the data from all occupations in Texas. Occupations that were related to the foundation occupations were identified to form groupings of occupations and initial focus for programs of study.

Phase II: Groupings of occupations were formed based upon: similarities in detailed work activities; directly or closely related postsecondary training and education programs; or directly or closely related through standard occupational classification by ONET. These groupings of occupations were compared to the median data of all occupations in Texas. Data sources include Emsi data (real-time labor market information) labor projections, Texas Workforce Commission data, Local Workforce Boards Targeted Occupations, and the Bureau of Labor Statistics.

Frameworks have been developed for each of the 53 statewide approved programs of study.

Courses are made available by level for local education agencies to select sequences. The courses were determined by the industry advisory committees and finalized after a sixty-day public comment period to elicit feedback from all stakeholders.

Postsecondary options for students are listed under the categories of industry-based certification obtainable by a high school student, professional certificate or license, associate degree, bachelor's degree, and postgraduate degree. Occupations included in the formation of the program of study are listed including their median annual wage in Texas in 2017, their projected annual openings in Texas from 2018- 2028, and their projected growth in Texas from 2018-2028. Descriptions are included for the career cluster and program of study, and the graduation endorsement which may be obtained by a student completing a course sequence within the program of study.



COURSES

LEVEL 1

Principles of Education and Training
Principles of Human Services

LEVEL 2

Human Growth and Development
Child Development
Communication and Technology in Education (TBD)

LEVEL 3

Instructional Practices
Special Populations (TBD)

LEVEL 4

Practicum in Education and Training
Project Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Educational Aide I	Texas Educator Certification Program	Teacher Education	Bilingual and Multilingual Education	Instruction and Learning
	Educational Instructional Technology	Education, General (or specific subject area)		Educational Leadership and Administration, General
	Counselor, Professional	Special Education		
	Athletic Trainer	Health and Physical Education/Fitness	Social and Philosophical Foundations of Education	
Additional industry based certification information is available from the TEA CTE website.				
For more information on postsecondary options for this program of study, visit TXCTE.org.				

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Adult Basic and Secondary Education and Literacy Teachers and Instructors	\$48,069	862	17%
Middle School Teachers, Except Special and Career/Technical Education	\$54,510	6,407	15%
Career and Technical Education Teachers, Secondary School	\$56,360	719	9%
Special Education Teachers, Secondary School	\$56,720	980	18%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Texas Association of Future Educators, or Family, Career and Community Leaders of America

Work Based Learning Activities:
Teach a community education class; intern as a teaching assistant or tutor; serve as a camp counselor.

The Teaching and Training program of study prepares students for careers related to teaching, instruction, and creation of instructional and enrichment materials. The program of study introduces CTE concentrators to a wide variety of student groups and their corresponding needs. It familiarizes them with the processes for developing curriculum, coordinating educational content, and coaching groups and individuals.



The Education and Training Career Cluster® focuses on planning, managing, and providing education and training services and related learning support services. All parts of courses are designed to introduce learners to the various careers available within the Education and Training career cluster.

Successful completion of the Teaching and Training program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSE INFORMATION

COURSE NAME	SERVICE ID	PREREQUISITES (PREQ) COREQUISITES (CREQ)	GRADE
Principles of Education and Training	13014200 (1 credit)	None	9-10
Principles of Human Services	13024200 (1 credit)	None	9-12
Human Growth and Development	13014300 (1 credit)	None	10-12
Child Development	13024700 (1 credit)	None	10-12
Communication and Technology in Education	TBD	TBD	TBD
Instructional Practices	13014400 (2 credits)	None	11-12
Special Populations	TBD	TBD	TBD
Practicum in Education and Training	13014500 (2 credits) 13014505 (3 credits) 13014510 (2 credits) 13014515 (3 credits)	PREQ: Instructional Practices	12
Project Based Research	12701500 (1 credit)	None	11-12
Career Preparation I	12701300 (2 credits) 12701305 (3 credits)	None	11-12

FOR ADDITIONAL INFORMATION ON THE EDUCATION AND TRAINING CAREER CLUSTER, PLEASE CONTACT:

Debbie Wieland | Debbie.Wieland@tea.texas.gov

<https://tea.texas.gov/cte>

Local education agencies will notify the TEA of the statewide programs of study which they offer through their local application. Additionally, LEAs will have the opportunity to apply annually for a regional program of study as outlined in section B2.b.

Frameworks for programs of study within each career cluster are linked via their respective icons below.



Program of Study Frameworks can be found in TEA Appendix 4.

Industry-Based Certifications

Industry-based certifications have been aligned to programs of study. Informational documents are available for each of the 244 industry-based certifications on the Texas school accountability list. Information includes competencies of the certification, exam requirements, and contact information for the certifying entities. To develop this list, TEA requested feedback from stakeholders across Texas on recommendations for additions to the previous state-approved list of 73 industry-based certifications.

TEA received over 4,000 responses containing 1,319 unique credentials. The recommended credentials were sent to the 28 Texas Workforce Development Board employers to determine industry value and approximately 1,000 industry representatives responded to the survey.

All submitted credentials were reviewed for the evaluation criteria for industry-based certifications including: 1) industry valued, 2) 3rd party provider, 3) capstone, 4) attainable by a high school student, and 5) portable.

A public comment period was held from January 4 through February 15, 2019. Over 2,100 comments were received and reviewed. The final list of 244 certifications was released on March 28, 2019.

Resources for each industry-based certification can be found at the following link: [**TEA CTE Webpage**](#)

Perkins funds can be used to support statewide or approved regional programs of study at the secondary and postsecondary level. Current CTE courses not included in the statewide or approved regional programs of study will remain available for districts to offer and can be supported with State CTE funds.

Texas House Bill 2628, passed in 2015, requires the Texas Higher Education Coordinating Board (THECB) to establish programs of study that:

1. incorporate rigorous college and career readiness standards, including career and technical education standards that address both academic and technical content;
2. support attainment of employability and career readiness skills;
3. progress in content specificity by beginning with all aspects of an industry or career cluster and leading to more occupationally specific instruction or by preparing students for ongoing postsecondary career preparation;
4. incorporate multiple entry and exit points with portable demonstrations of technical or career competency, which may include credit transfer agreements or industry-recognized certifications; and
5. culminate in the attainment of:
 - an industry-recognized certification, credential, or license;
 - a registered apprenticeship or credit-bearing postsecondary certificate; or
 - an associate or baccalaureate degree.

THECB develops statewide postsecondary programs of study through the formation of advisory committees composed of representatives of secondary education, postsecondary education, business and industry, other state agencies or licensing bodies, and other career and technical education experts. Program of study advisory committees are charged with (1) identifying high-demand programs of study within the cluster, (2) establishing subcommittees as needed to identify courses and learning outcomes required as part of a program of study (POS), and (3) providing THECB staff with feedback about processes and procedures related to the programs of study within the relevant cluster.

Programs of study developed under House Bill 2628 must:

1. focus on the current and future needs of employers in this state;
2. clearly define career pathways with logical entry and exit points for students;
3. indicate the types of careers and the names of certifications or licenses aligned to the program of study;
4. provide for students who begin a program of study at a public junior college, public state college, or public technical institute to transfer to another public junior college, public state college, or public technical institute without having to repeat classes or incur significant interruption of their ability to progress through the program of study;
5. be designed to meet the needs of business and industry with a high degree of commonality across the state;
6. align with the college and career readiness standards; and
7. be revised on a reoccurring schedule, not to exceed once every five years, to ensure the programs of study remain current and relevant to the needs of business and industry.

Using the advisory committee process described above, THECB has developed and approved the following statewide programs of study for adoption by postsecondary institutions:

- Architecture and Construction
 1. Building Construction Management
 2. General Drafting
 3. Architectural Drafting
 4. Electrical Lineworker
 5. Electrical, Industrial
 6. Electrical, Residential & Commercial
 7. Heating, Air Conditioning, and Ventilation
 8. Plumbing
 9. Pipefitting
- Health Science
 1. Occupational Therapy Assistant
 2. Physical Therapist Assistant
 3. Emergency Medical Services/Paramedic
 4. Dental Hygiene
 5. Radiologic Technology
 6. Respiratory Care
- Information Technology
 1. Cloud Computing
 2. Cloud Support and Cybersecurity
 3. Cloud Computing Data Science
 4. Cloud Computing Data Analysis

Consistent with statewide stakeholder input and the updated Texas Workforce System Strategic Plan for FY 2020-2023, THECB will seek through the Tri-Agency Partnership and the Texas Workforce Investment Council to (1) align more closely the curricula of secondary and postsecondary programs of study and (2) support incorporation of third-party, industry-based certifications into program content and training outcomes

Actions to align secondary and postsecondary curricula will include the following:

- Coordination with TEA to ensure alignment of secondary and postsecondary programs of study;
- Providing postsecondary institutions access to a coordinated, non-duplicative sequence of secondary and postsecondary academic and career and technical education courses to help students transition seamlessly from high school to a public community, state, or technical college;
- Expanding and supporting adoption of a common group of Workforce Education Course Manual (WECM) courses per discipline and will align WECM courses to postsecondary programs of study and

secondary/postsecondary pathways for career and technical education; and

- Working to facilitate consistent credit transfer from secondary to postsecondary education by working with TEA to develop policies, procedures, and rules to support consistent transfer.
- Actions to support the incorporation of third-party, industry-based certifications will include the following:
 - Engaging industry representatives to collaborate with postsecondary institutions in new program development that incorporates national industry-based certifications;
 - Convening of discipline-specific statewide advisory groups to provide up-to-date input concerning, skills, certifications, and licenses required by business and industry in order to align career and technical education programs and courses; and
- Identification and implementation of relevant industry-based certifications and licenses and incorporation of occupational information into statewide career and technical education programs of study.

b. Describe the process and criteria to be used for approving locally developed programs of study or career pathways (see Text Box 3 for the statutory definition of career pathways under section 3(8) of Perkins V), including how such programs address State workforce development and education needs and the criteria to assess the extent to which the local application under section 1327 will—

LEAs are required to utilize local labor market data, CTE advisory boards, and other stakeholders to determine which statewide programs of study best fit their needs. Each statewide program of study includes course sequences which provide increased content specificity as students move through program completion and allows for multiple education and workforce entry and exit points. By determining local workforce needs, an LEA may match those needs to the program(s) of study which meet their local data.

Each year, local education agencies may apply for programs of study with labor market data to support regional programs of study. This application process, referred to as the regional program of study approval process, will require the submission of labor market data that validates the occupations and course sequence of the proposed program of study being aligned with regional needs for high-wage, high-skill, and in-demand careers.

Phase I: Local education agencies notify the career and technical education specialist in their Educational Service Center (ESC) of their intent to apply for a regional program of study. Information is collected on intended regional programs of study title and course sequence. ESC staff consolidate like submissions and designate a lead LEA.

Phase II: TEA reviews letters of intent from each ESC. Course sequences that are duplicative of a statewide program of study or a one course substitution in a statewide program of study will not be approved as a regional program of study.

Phase III: Remaining regional program of study applications are taken through labor market data analysis by the TEA staff. Labor market information is curated for each LEA and provided with the regional program of study application to the LEA.

Phase IV: LEAs work with their local advisory board and workforce development entities to complete the application. The application

Phase V: The TEA approves or denies regional programs of study applications.

THECB requires colleges submitting postsecondary CTE programs for approval to follow the requirements of THECB's Guidelines for Instructional Programs in Workforce Education (GIPWE). GIPWE requires that colleges develop proposed programs in close cooperation with business and industry to satisfy a need for timely and effective workforce education. Business and industry experts must provide substantial input into the curriculum design of a proposed CTE program, including profession-specific knowledge, skills, and abilities and general skills as appropriate, such as oral and written communication, mathematics, computer literacy, and industry-related workplace practices.

All proposed postsecondary CTE programs submitted for THECB approval must contain the following common elements:

- Using national, state, and local industry-based trends, standards, and labor market information, the institution must document pertinent local, regional, and/or statewide workforce demand for the program.
- Institutions must demonstrate that the proposed award provides the necessary academic skills and the workforce skills, knowledge, and abilities necessary to attain entry-level employment in a target occupation. THECB encourages institutions to develop or adopt Texas skill standards-based curricula and other statewide CTE initiatives developed collaboratively with business and industry. Alternatively, the program competencies must be developed and documented using a Program Competency Profile, a Detailed Work Activity (DWA) curriculum alignment process, the DACUM (Developing A CurriculUM) process, or another systematic methodology approved by the institution.
- The final proposed program curriculum must adequately address all identified competencies, and the program's courses must ensure that students have the opportunity to master the competencies. The program's industry advisory committee must take an active role in identifying program competencies and validate the curriculum's capacity to instill the competencies.
- To verify entry-level workplace competencies, the institution must provide at least one of the following for each proposed CTE award: a) capstone experience, b) eligibility for a credentialing exam, and/or c) an external learning experience. The experience should occur during the last semester of the student's educational program.
- The institution must design a program-specific enrollment management plan demonstrating that the proposed new program will have sufficient enrollment to support the program.
- Programs must be designed to permit maximum access for students by establishing linkages with other programs in public secondary schools and/or other institutions of higher education, as well as non-duplication with similar programs within the higher education region and/or service area. Linkages may be demonstrated by articulation agreements that provide for student transfer, inverted degree plans, and advanced standing opportunities.
- The institution must detail the initial resources needed for the program, including existing and additional faculty, facilities, equipment, and an estimate of annual operating costs.
- The program design must be consistent with the standards of the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) and with the standards of other applicable accrediting agencies, and must be in compliance with appropriate licensing authority requirements.

THECB's GIPWE requires that colleges establish an industry-based advisory committee for each workforce education program. Advisory committees may be organized by career cluster, provided that each individual program is reviewed, the committee has the necessary expertise, and ample time is allotted for each program. The role of an advisory committee is to 1) help a college document the need for a workforce education program and 2) ensure that the program has adequate resources and a well-designed curriculum to provide students with the knowledge, skills, and abilities essential for employment. The advisory committee is one of the principal means of ensuring meaningful business and industry participation in program creation and revision.

Advisory committees must be composed of persons who broadly represent the demographics, including ethnic and gender diversity, of the institution's service area as well as the occupational field in all sectors of the business community within the institution's service area. Members should be well informed about the knowledge, skills, and abilities required for the occupation for which they are providing information and guidance.

Advisory committees perform the following functions:

1. evaluating the goals and objectives of the program curriculum;

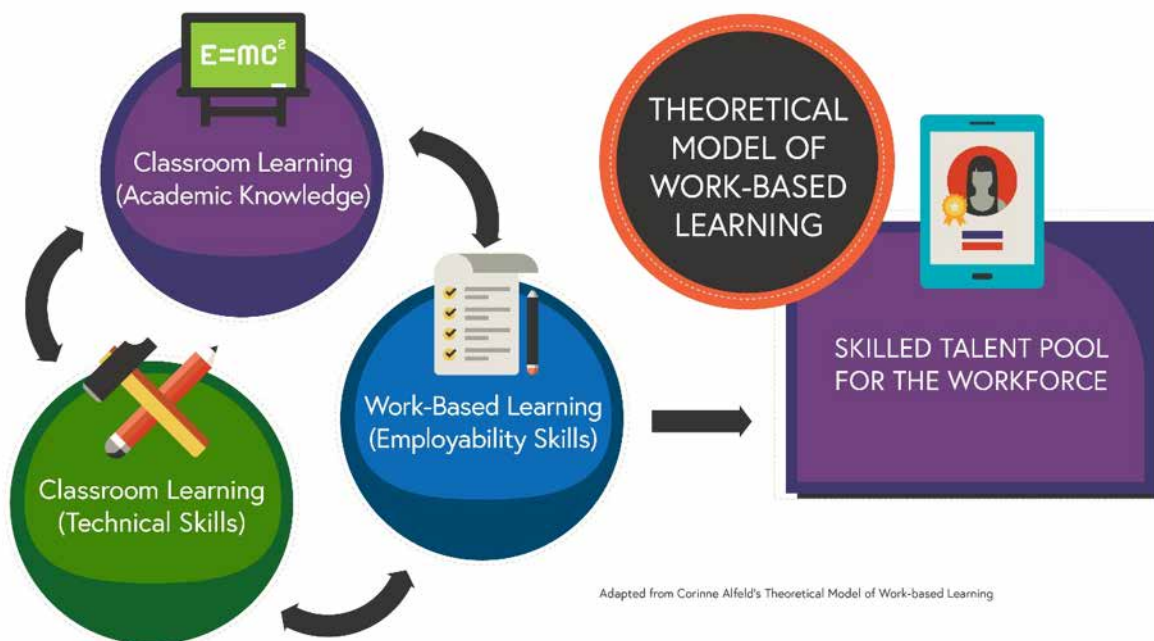
2. establishing workplace competencies for the program occupation(s);
3. suggesting program revisions as needed;
4. evaluating the adequacy of existing college facilities and equipment;
5. advising college personnel on the selection and acquisition of new equipment;
6. identifying local business and industry leaders who will provide students with external learning experiences, employment, and placement opportunities;
7. assisting in the professional development of the faculty;
8. assisting in promoting and publicizing the program to the community and to business and industry; and
9. representing the needs of students from special populations.

In response to statewide stakeholder input, THECB will seek to streamline approval of new CTE programs and updates to the Workforce Education Course Manual to support more rapid institutional response time to changing employer needs, technology updates, and market shifts.

i. promote continuous improvement in academic achievement and technical skill attainment;

The Texas programs of study, both statewide and regionally approved at the secondary and postsecondary level, align to occupations which are high-skill, high-wage and in-demand. Students are encouraged to participate in work-based learning and expanded learning opportunities that align with their program focus. The model below shows the relationship between academic knowledge, technical skills and employability skills and how all three types must support one another.

When these components work together, Texas will have a skilled talent pool ready to enter the workforce



Adapted from Corinne Alfeld's Theoretical Model of Work-based Learning

Theoretical Model of Work-Based Learning

Courses included in an approved program of study include standards which are approved by the State Board of Education (SBOE) or through the Commissioner of Education. The courses included within statewide and regional programs of study will align to occupations which are high-wage, high-skill, and in-demand. Additionally, the course sequence will begin with a foundational course and increase in content specificity. Wherever possible, programs of study should align to an industry-based certification and/or

dual credit from an institution of higher education. To encourage the attainment of industry valued and recognized industry-based certifications, the TEA will reimburse LEAs for one passed certification exam per student taken from 9th-12th grade.

To emphasize technical skill attainment, students are encouraged to take coherent sequences of courses that increase in content specificity. CTE concentrators are students who have completed two or more courses for at least two credits within a program of study. CTE completers are students who have completed three or more courses for four or more credits, with at least one advanced course within a program of study. An advanced course is a course from level three or four.

THECB's GIPWE process for CTE program approval and maintenance, described above, requires the ongoing advisement of industry-based committees in establishing and maintaining postsecondary CTE curricula to promote continuous improvement in student achievement.

ii. expand access to career and technical education for special populations; and

The CTE nontraditional and special populations recruitment contract provides services, activities, and professional development that addresses the promotion and understanding of non-traditional fields and employment activities for nontraditional students and address equity in access.

The TEA contracted with an outside entity for a statewide CTE evaluation that will evaluate numbers of CTE participants and CTE concentrators at the career cluster level and will disaggregate the information based on the special population categories. The results of the evaluation showed that CTE students who concentrated in CTE enrolled in postsecondary at a higher rate. In addition, CTE students who concentrated earned higher wages. However, the evaluation did not show a higher persistence rate among CTE concentrators. The TEA will also partner with an external group/consultant to ensure that there is training provided to the TEA staff and education service center CTE specialists. Data will be provided to LEAs so they can best address performance gaps in CTE programming through the Comprehensive Local Needs Assessment.

THECB provided each of the state's 54 public postsecondary institutions with disaggregated special populations performance data as a component of its resources supporting the Comprehensive Local Needs Assessment (CLNA). Data were provided to each institution by cluster or program at the two- or four-digit CIP code level to comply with FERPA. Institutions additionally received question sets and other guidance in consulting special populations stakeholders.

Postsecondary institutions are required utilize Perkins formula funds to address performance gaps identified in the CLNA as a condition for receiving a formula grant. THECB monitors disaggregated performance results at the program level for each public two-year community, state, and technical college receiving Perkins funds.

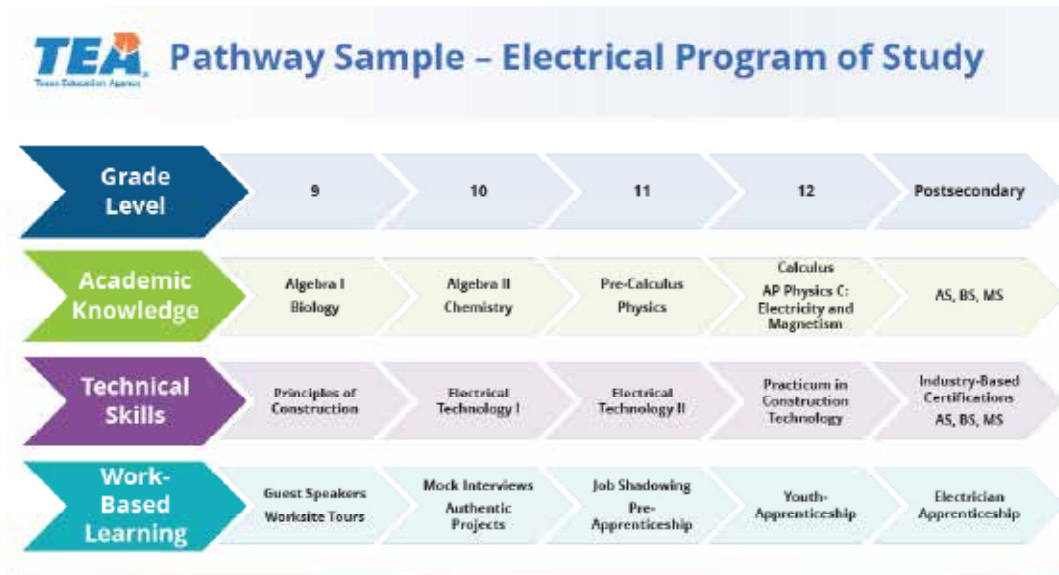
**iii. support the inclusion of employability skills in programs of study and career pathways.
(Section 122(d)(4)(B) of Perkins V)**

In an effort to focus on earlier exposure to career exploration, Texas offers middle school CTE courses titled Investigating Careers and College and Career Readiness. In partnership with UT Austin, Texas's Beyond Grad initiative is creating a middle school curriculum designed to expose students to career exploration, college and career readiness knowledge, employability skills, and skills for building personal agency. The middle school curriculum uses TEKS, Texas College & Career Readiness Cross-Disciplinary Standards, and Student Competencies as defined by the Texas Model for Comprehensive School Counseling Programs. This middle school curriculum will be piloted in Texas GEAR UP districts initially, followed by a statewide pilot during the 2020-2021 school year. The final version of the curriculum will be loaded into an online platform freely accessible to educators, students, and families across the state.

Within all courses taught, a fluency in STEM skills is critical to prepare students for career readiness in the workforce. Students are introduced to the STEM fluency skills through learning STEM integrated thinking through content application using engineering design challenges or STEM Project/Problem Based Learning. In grades PK-8 they focus on building the skills of collaboration, creativity, critical thinking, communication, and resilience. By 8th grade these STEM Fluency Skills should be habits and in grades 9 and up, students work to develop and master STEM skills through work focusing on promptness, time management, adaptability and innovation. All CTE courses which are approved by the State Board

of Education (SBOE) include employability skills. Additionally, all course standards will be reviewed by industry professionals. Through this review, standards will be mapped to occupational skills which are assigned a level of criticality. Industry reviewers will also identify skills which are not included in course standards. This will inform future course standards work to ensure courses included in programs of study meet industry needs. Texas is defining Work-Based Learning and created a Work-Based Learning Toolkit to be utilized across grade bands. The Work Based Learning Toolkit, which includes the Employability Skills Rubric, is provided in appendix 5.

THECB's GIPWE process for CTE programs, described in Section B.2.b above, requires the ongoing advisement of industry-based committees to support inclusion of relevant employability skills into CTE programs. THECB utilizes State Leadership funds to support the embedding of employability skills into postsecondary CTE curricula. THECB has developed an internship toolkit for businesses or employers as a strategic plan (60x30TX) resource, as described in Section B.2.c. One purpose of the toolkit is to guide incorporation of employability skills into internships.



c. Describe how the eligible agency will—

- i. make information on approved programs of study and career pathways (including career exploration, work-based learning opportunities, early college high schools, and dual or concurrent enrollment program opportunities) and guidance and advisement resources, available to students (and parents, as appropriate), representatives of secondary and postsecondary education, and special populations, and to the extent practicable, provide that information and those resources in a language students, parents, and educators can understand;**

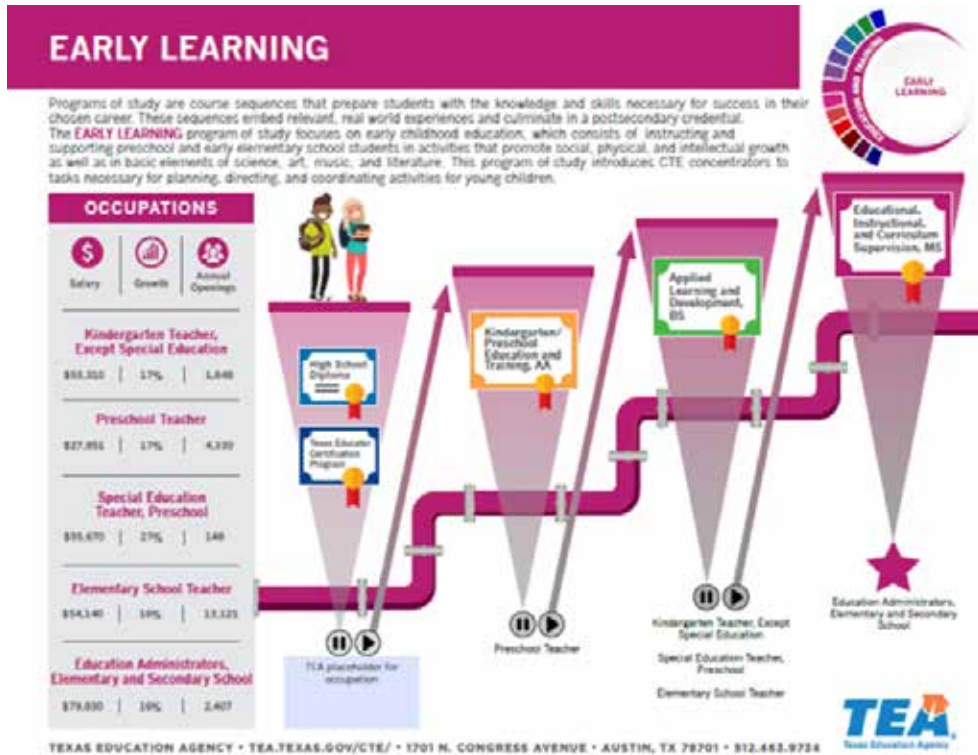
Programs of Study and Career Pathways

Framework documents supporting each program of study have been created for use by counselors and administrators. These frameworks include courses by level which may be utilized for a program of study by LEAs. Courses may be assigned to a level different than what is listed on the counselor and administrator framework document, provided that all required course prerequisites are satisfied. The documents also include occupations supported by the course sequence as well as postsecondary options for students, focusing on multiple entry and exit points.

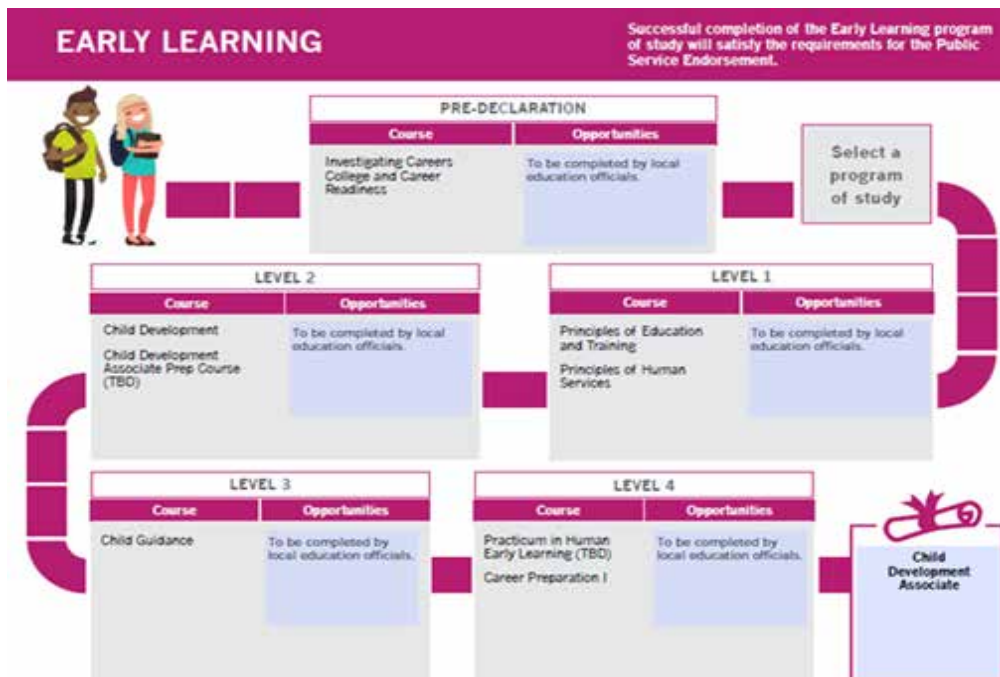
Additionally, justification documents have been created for each career cluster to give further background information on programs of study including heat maps of total employees, new hires, and student enrollment by industry and career cluster. Postsecondary options are listed by training program and institution of higher education per Classification of Institutional Programs, or CIP code as aligned to programs of study. These documents, as well as labor market information provided to local education agencies by the TEA, are beneficial as schools determine the programs of study to best prepare their students for a local and statewide robust economy.

Documents for students and parents will be made available for each program of study. These documents

are a more visual representation of the information included on the counselor and administrator framework documents. Included in this document is a fillable graduation plan that a middle school student may utilize to create a four-year plan for high school with support from a parent or counselor.



Student and Parent Document pg. 1



Student and Parent Document pg. 2

Hot Jobs one-page resources were created for each local workforce development board. These resources highlight the top five in-demand and high-wage occupations for each area and include information such as programs of study with which they are aligned, typical job responsibilities, whether the occupation is included in several industries or is concentrated in one or few industries, links to videos and ONET providing detailed information on the occupation, and median annual salary, projected ten-year growth, and projected annual openings.

WORKFORCE SOLUTIONS GULF COAST

Hot Jobs	Program of Study	What Do They Do Everyday?	Who Needs These Types of Workers?
Accountants and Auditors 		<ul style="list-style-type: none"> Examining accounts and other financial accounting records to prepare financial statements, tax forms, or audit and financial statements prepared by others. Initial or advise on systems of recording costs or other financial and budgetary data. 	↑
Computer Systems Analysts 		<ul style="list-style-type: none"> Provide technical assistance to computer users. Review operations or make computer programs for clients to perform in one or more applications of electronically. May provide technical assistance for use of computer hardware and software, including printing, validation, and processing electronic mail and operating systems. 	↑
Electricians 		<ul style="list-style-type: none"> Install, maintain, and repair electrical wiring, electronics, and fixtures. Ensure that work is in accordance with relevant codes. May install or service street lights, television systems, or electrical control systems. 	↑
Licensed Practical and Licensed Vocational Nurses (LPN / LVN) 		<ul style="list-style-type: none"> Care for ill, injured, or debilitated patients or persons with disabilities in hospitals, nursing homes, clinics, private homes, group homes, and similar institutions. May work under the supervision of a registered nurse. Learning required. 	↑
Registered Nurses 		<ul style="list-style-type: none"> Administer patient health programs and needs, identify and implement nursing care plans, and monitor medical records. Administer nursing care to ill, injured, convalescing, or debilitated patients. May advise patients on health maintenance and disease prevention or provide case management. Learning or registration required. 	↑
Software Developers, Applications 		<ul style="list-style-type: none"> Design, create, and modify general computer applications software or specialized utility programs. Program or code in one or more languages to create software. May develop and design hardware which is associated with writing, collection, coordinating database development or part of a job. May oversee computer programmers. 	↑

↑ These jobs are based in **BAET** industries. ↑ These jobs are specialized in **PERMS** industries throughout the economy. Skills requirements are being met or in excess.

WORKFORCE SOLUTIONS GULF COAST

SALARY EARNED (\$K) = ~\$20,000

Accountants and Auditors (8) (8) (8) (8)	Licensed Practical and Licensed Vocational Nurses (LPN / LVN) (8) (8)
Computer Systems Analysts (8) (8) (8) (8)	Registered Nurses (8) (8) (8)
Electricians (8) (8)	Software Developers, Applications (8) (8) (8) (8)

ANNUAL GROWTH

Accountants and Auditors 22%	Licensed Practical and Licensed Vocational Nurses (LPN / LVN) 21%
Computer Systems Analysts 29%	Registered Nurses 26%
Electricians 21%	Software Developers, Applications 30%

ANNUAL OPENINGS

Accountants and Auditors | 14,426

Computer Systems Analysts | 5,927

Electricians | 8,800

Licensed Practical and Licensed Vocational Nurses (LPN / LVN) | 7,189

Registered Nurses | 17,493

Software Developers, Applications | 6,321

DISTRICT CONTACT INFO | WEB CONTACT INFO

Hot Job Document

A CTE newsletter and advanced academics newsletter are sent to CTE Listserv recipients periodically. Stakeholders receiving this newsletter include administrators, counselors, and teachers. Through this communication, information is made readily available on programs of study, work-based learning, advanced academics, and related resources.

The [TEA CTE website](#) houses information for CTE stakeholders, while the Texas CTE Resource Center includes more focused resources for administrators, counselors, and teachers.

Education Service Center CTE specialists are an integral link in the communication chain. There are 20 ESC CTE specialists across the state who provide technical assistance and training to LEAs in their region. Specifically, the ESC specialists offer trainings specific to Perkins V, programs of study, the comprehensive local needs assessment and the Perkins local application in each of the regions. This arrangement is part of expending Perkins leadership funds, which can be found in section 4d.

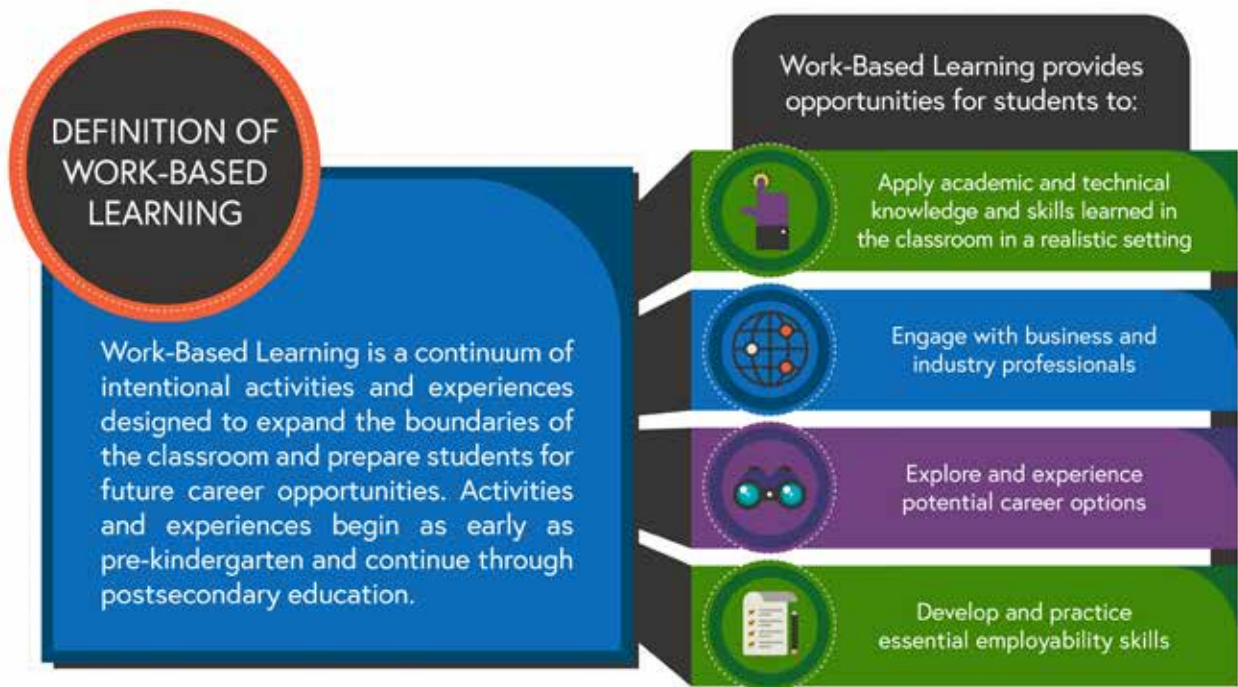
Advising

The Effective Advising Framework (EAF) will provide districts a blueprint for developing or improving a coordinated, high-impact CCR Advising program. The EAF will define key components of quality advising programs. The EAF will offer a diagnostic tool to assess the district's current program and scaffolded supports for increasing effectiveness.

In addition, the TEA's creation of resources for faculty, such as school counselors and career coordinators, informs the selection of a program of study that culminates in the completion of an industry-based certification and a work-based learning opportunity. School counselors in Texas will receive training on Perkins V updates and programs of study implementation procedures to improve the quality of advisement students receive at the secondary and middle school level.

Work-Based Learning

Texas is defining Work-Based Learning (WBL) as such:



Texas established that WBL needs to be a continuum of experiences across grade bands and that career awareness and exploration should happen in earlier grades. A program of study should culminate in a capstone work-based learning experience. Texas is defining a capstone work-based learning as a “sustained interactions with industry or community professionals in real workplace setting, to the extent practicable, or simulated environments at an educational institution that foster in-depth, firsthand engagement with the tasks required in a given career field, that are aligned to curriculum and instruction.” Research indicates that for a capstone work-based learning experience to be high-quality, meaningful and impactful, four elements must be in place. Those elements include a partnership agreement, ensuring that the work experience is authentic, providing a structured learning component to the experience, and the experience should culminate with an assessment and recognition of skills.

In an effort to focus on earlier exposure to career exploration, Texas offers middle school CTE courses titled Investigating Careers and College and Career Readiness. In partnership with the University of Texas at Austin, Texas’s Beyond Grad initiative is creating a middle school curriculum designed to expose students to career exploration, college and career readiness knowledge, employability skills, and skills for building personal agency. The middle school curriculum uses Texas Essential Knowledge and Skills, Texas College & Career Readiness Cross-Disciplinary Standards, and Student Competencies as defined by the Texas Model for Comprehensive School Counseling Programs. This middle school curriculum will be piloted in Texas GEAR UP districts initially, followed by a statewide pilot during the 2020-2021 school year. The final version of the curriculum will be loaded into an online platform freely accessible to educators, students, and families across the state.

The middle school curriculum integrates TX OnCourse online tool, Map My Grad, which guides students through course selection to prepare a personal graduation plan in line with programs of study and advanced academics.

See TEA Appendix 5 for the Work-Based Learning Framework and Employability Skills Rubric.

College and Career Readiness School Models

Texas has a robust landscape of College and Career Readiness School Models: Early College High Schools,

Pathways in Technology Early College High Schools, and Texas STEM Academies. These models are open enrollment programs that blend high school and college coursework to help historically underserved and at-risk students develop technical skills, earn college credentials and degrees, and pursue in-demand career paths. Texas is proud to serve over 370 campuses implementing these models. Each CCRSM school model has a blueprint, which provide benchmarks for the campus to meet. These blueprints can be found in Appendix 6.

Advanced Academics

Advanced Academics includes courses, programs, assessments, services and supports that provide opportunities for students to demonstrate college and career readiness and earn postsecondary credit. Texas supports the following initiatives as part of advanced academics:

- Advanced Placement
- Dual Credit
- International Baccalaureate
- ACT
- SAT
- Texas Success Initiative Assessment (TSIA)

Advanced Placement and dual credit courses are embedded within CTE programs of study and the College and Career Readiness School Models, which support career pathways.

THECB posts approved statewide program of study curricula to its website and maintains a searchable database of approved local programs of study as resources for the general public, including secondary and postsecondary representatives and students and parents.

THECB maintains three websites as a resource for students, parents, and the general public. These websites are a key method of communicating up-to-date, current information and providing constant access to important tools and resources. The websites provide students and families with comprehensive and accurate information about how to enroll in college, how to select a college, how to pay for college, and how to ensure that a student's postsecondary choices are aligned with future career goals. THECB'S primary objective for the websites is to provide a reliable way to ensure the timely delivery of accurate information.

Resource Websites Overview		
Website	Audience	Goal
College For All Texans	All Texans	Increase college enrollment and completion by guiding visitors through the higher education process, including help with the admissions process, residency requirements, college costs, and types of financial aid
GenTX (Generation Texas)	Texas High School Students	Increase direct college enrollment by creating meaningful connections with Texas' high school students and positively supporting their college-going decisions.
Texas CREWS (Texas Consumer Resources for Education and Workforce Statistics)	All Texans	Provide comparative information about Texas public 2-year and 4-year postsecondary institutions.

THECB publicizes the following resources as part of its 60x30TX strategic plan for higher education:

- Texas Internship Challenge. The Texas Internship Challenge is a partnership among the Texas

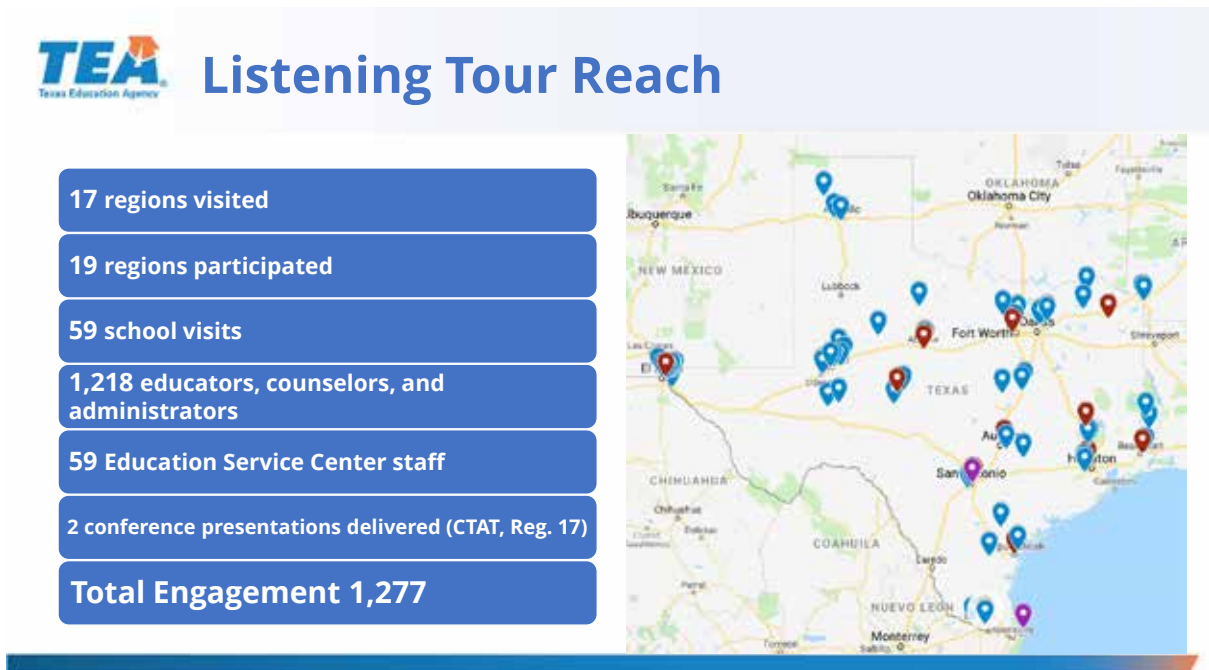
Workforce Commission (TWC), Texas Education Agency (TEA) and The Higher Education Coordinating Board (THECB), who challenge employers to offer paid internships and make it easy for students to search and apply for them. The Texas Internship Challenge addresses a workforce need for students to acquire workplace readiness skills that will help them be more competitive for full-time work. Internships provide students the opportunity to explore our state's in-demand occupations, gain professional experience, and make connections with professionals which can lead to a reference or a job. Internships provide employers the opportunity to explore talent, benefit from different and developing skill sets, and train candidates for fulltime positions.

- Texas WORKS. This is a centralized off-campus work-study program that will provide students with limited financial means an opportunity to pursue paid internships. The strength of the Texas economy and the wide range of Texas industries offer an opportunity to provide college students with paid internships or other concurrent work experiences to strengthen their marketable skills and support transition to the workforce. Texas WORKS (Working Off-campus: Reinforcing Knowledge & Skills) Internship Program will provide paid internship opportunities for full-time undergraduate students and advance the state's 60x30TX goals relating to marketable skills and student debt.

ii. facilitate collaboration among eligible recipients in the development and coordination of career and technical education programs and programs of study and career pathways that include multiple entry and exit points;

Industry advisory committees were developed for creation of the statewide approved programs of study. Individuals from workforce development, industry, secondary education, and higher education were convened to work through occupational alignment to programs of study, alignment to postsecondary education and training opportunities, and course sequencing within programs of study. These committees met from July through December 2018.

From December 2018 through May 2019, the TEA staff representing CTE, work-based learning, and STEM traveled to meet with 19 of the 20 ESCs on a listening tour. Information was shared concerning Perkins V planning and transition year, programs of study, and the developing work-based learning and STEM frameworks.



College, Career and Military Readiness Listening Tour Locations

Proposed statewide programs of study were released for public comment from June 3, 2019 through July 19, 2019. During this time, the TEA solicited feedback from LEAs, industry, parents, and any individual who wished to contribute. The feedback gathered during this time was considered by the TEA program specialists and incorporated into the final programs of study which were released on September 5, 2019.

ESC CTE specialists were trained on all aspects of programs of study and the comprehensive local needs assessment. ESC CTE specialists then held trainings specific to programs of study and the comprehensive local needs assessment in their regions.

The TEA established a CTE statewide leadership committee comprised of administrators selected from each ESC region. This group meets via webinar and face-to-face throughout the year. Feedback is solicited from the committee regarding all areas of CTE, with specific emphasis on programs of study and the comprehensive local needs assessment. LEAs have the opportunity to apply for regional programs of study. The application process is open annually and regional programs of study are approved for an implementation period of four years. ESC CTE specialists are leaders within their region for facilitating this process. Through the Texas Regional Pathways Network, grantees are brought together as a region to plan for aligning CTE program offerings to regional labor market information. This is a facilitated process through regional convenings, state convenings, and regional asset mapping.

THECB develops postsecondary statewide programs of study through advisory committees comprising secondary and postsecondary representatives and workforce representatives. Each program of study is subject to a 30-day public comment period for feedback from secondary and postsecondary representatives, industry, students, and any other member of the public who wishes to contribute. Each advisory committee considers the feedback received and incorporates curricular modifications based on committee judgment prior to final approval by the Board.

Postsecondary institutions are required as a condition of receiving Perkins funds to develop memoranda of understanding with their constituent secondary school districts for collaboration in the delivery of dual credit career and technical education courses and programs, including programs of study.

iii. use State, regional, or local labor market data to determine alignment of eligible recipients' programs of study to the needs of the State, regional, or local economy, including in-demand industry sectors and occupations identified by the State board, and to align career and technical education with such needs, as appropriate;

See response in section B.2.a and B.2.b. See CLNA in TEA Appendix .8 and THECB Appendix 4.

iv. ensure equal access to approved career and technical education programs of study and activities assisted under this Act for special populations;

The TEA uses leadership funds to solicit a contract designed to support students in special populations and assist the TEA in developing processes, procedures, and training to support equitable access across all programs of study. At both the secondary and postsecondary levels, applicants for Perkins funding must indicate the steps taken to ensure that all individuals from special populations are provided equal access to CTE programs and activities. Local programs are required to sign provisions and assurances in the local application for funds to receive Perkins funding. Secondary and postsecondary recipients must identify any barriers that exist for special population groups within the Comprehensive Local Needs Assessment. As a condition of receiving funding, postsecondary institutions must describe in the local application how special populations students will be provided equal access to career and technical courses, programs, and programs of study toward preparation for high-skill, high-wage, and in-demand occupations. Postsecondary institutions must additionally describe how they will address gaps in special populations performance identified in the Comprehensive Local Needs Assessment.

The TEA has a contract for a statewide CTE evaluation that will evaluate numbers of CTE participants and CTE concentrators at the career cluster level and will disaggregate the information based on the special population categories. The TEA will also partner with an external group/consultant to ensure that there is training provided to the TEA staff and education service center CTE specialists. Data will be provided to LEAs so they can best address performance gaps in CTE programming through the Comprehensive Local Needs Assessment.

LEAs ensure equal access to programs through yearly non-discrimination notifications to students, parents, school employees, and the public. Nondiscrimination statements are required in all district publications. As a recipient of federal financial assistance, postsecondary institutions, LEAs and charter schools are required to comply with federal laws and regulations that prohibit discrimination based on race, color, national origin, sex, and disability in its vocational programs, services or activities as required by Title VI of the Civil Rights Act of 1964, as amended; Title IX of the Education Amendments of 1972; and

Section 504 of the Rehabilitation Act of 1973, as amended. (District/campus) will take steps to assure that lack of English language skills will not be a barrier to admission and participation in all educational and vocational programs.

THECB requires biannual progress reports from its 54 community, state, and technical colleges receiving Perkins formula funds. Reports must show progress on each activity in the approved Local Application or address impediments to progress and show how the local institution has responded. Beginning with the FY 2021 Local Application, institutions must commit Perkins formula funds to reducing special populations performance gaps identified in the Comprehensive Local Needs Assessment (CLNA) as a condition for receiving funds. Biannual reporting will document programmatic activity toward reducing special populations performance gaps.

Postsecondary institutions must publish continuous notice that they do not discriminate on the basis of race, color, national origin, sex, disability, or age in its programs or activities, and provide the name or title, address, telephone number, and email address of the Coordinator(s) designated to oversee compliance with civil rights laws, including who to contact for complaints regarding Section 504. The notice must be prominently placed in each announcement, bulletin, catalog, application form, newsletter, magazine, website and any electronic publications, written materials distributed to students, notices posted on campus, and the local newspaper.

Postsecondary institutions must additionally provide public annual notification prior to the beginning of each school year that their career and technical education programs are offered without regard to race, color, national origin, sex, or disability. Annual notification must be made through media that reach the general public; include a brief summary of the program offerings and admissions criteria; and identify the name/title, address, and telephone number of the Title IX and Section 504 compliance coordinator(s). If there is a community of national origin minority persons with limited English language skills in the recipient's service area, the notice must be disseminated to that community in its language and must state that a lack of English language skills will not be a barrier to admission to and participation in career and technical education programs.

THECB performs oversight of public, two-year community, state, and technical colleges for compliance with federal civil rights statutes and their implementing regulations. THECB conducts a biannual risk assessment using a targeting plan approved by the Department of Education's Office of Civil Rights (OCR) and conducts two site visits annually based on risk assessment outcomes.

v. coordinate with the State board to support the local development of career pathways and articulate processes by which career pathways will be developed by local workforce development boards, as appropriate;

Workforce system partners own components and implementation of the State Board strategic plan (WIOA). The Texas Education Agency (TEA) and the Texas Higher Education Coordinating Board (THECB) are responsible and accountable for strategies and objectives in goals 1, 2 and 3. Appendix XX provides the vision, mission, and goals of the Texas Workforce System Strategic Plan which also includes specific activities as well as metrics for each goal. A part of this work was the program of study development mentioned in section B.2.a and B.2.b.

Additionally, the TEA partnered with the Texas Workforce Investment Council to align processes for validating industry-based certifications. This partnership created the process to establish criteria for industry-based certifications and provided an avenue to work with regional workforce development board executive directors to solicit feedback from employers on the value of the recommended industry-based certifications.

Texas also established the Tri-Agency partnership, a monthly convening and strategizing session among the Texas Workforce Commission, Texas Higher Education Coordinating Board, and the Texas Education Agency. This partnership is facilitated by the Texas Workforce Investment Council (the State's workforce board). Through the Tri-Agency partnership, an Education to Workforce Summit was held to strengthen education pathways into the workforce. This summit included representation from each of the 28 workforce boards and required regional teams who attended to include representation of the following: at least three secondary independent LEAs, institutions of higher education, employers, local workforce board members, education service center members, and community leaders.

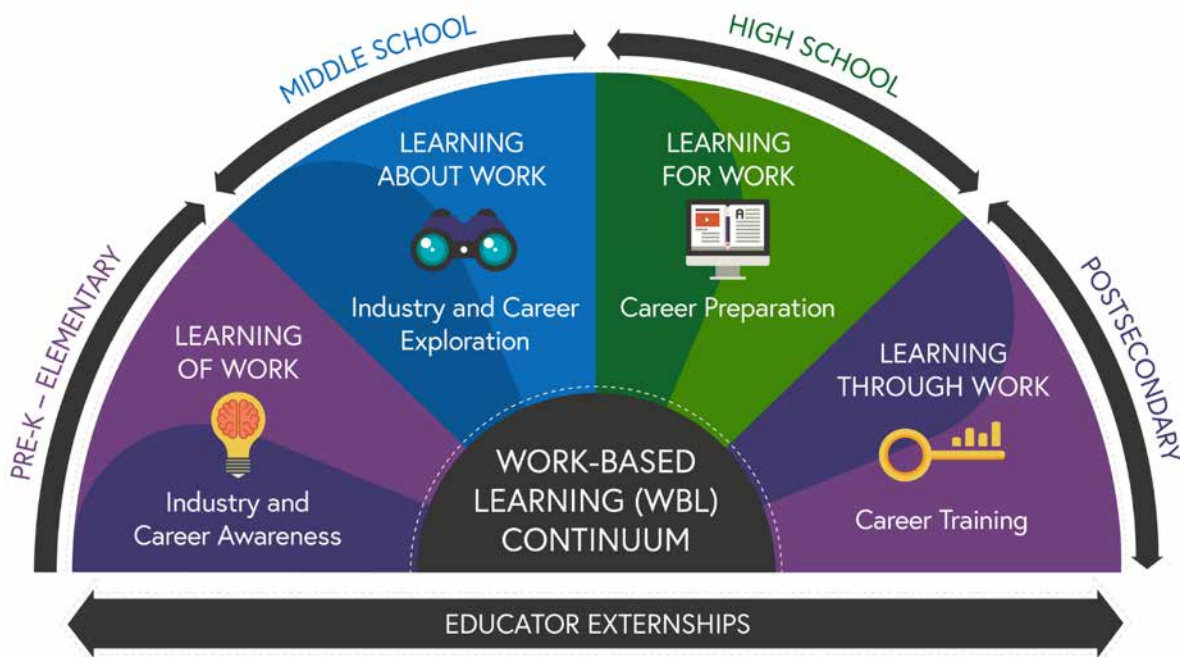
All of the stakeholders mentioned in this section are partners in the Texas Regional Pathways Network. The Texas Regional Pathways Network (TRPN) builds regional talent pipeline that spur economic growth across the state and ensure that all Texans have the skills and credentials needed for economic advancement. It brings together state and regional leaders to build strong educational and career pathways that prepare Texans for careers in high-wage, in-demand industries. Leaders engaged in the TRPN represent multiple sectors, including K-12 education, postsecondary education, workforce and economic development, business and industry, government, and non—profit and community-based organizations.

To support the goals of 60x30TX, THECB established a regional targets initiative in 2017 organized around the ten higher education districts in the state. Designed to include all the postsecondary institutions in each region, teams were provided with funds to build regional infrastructure and programs, a “Regional Starter Kit” with key data on student outcomes, and coaching and guidance to develop a regional impact strategy and create a cross sector core team with secondary and workforce partners. Supportive webinars and convenings that feature updates on outcomes and sharing of best practices are planned through 2020.

- vi. **support effective and meaningful collaboration between secondary schools, postsecondary institutions, and employers to provide students with experience in, and understanding of, all aspects of an industry, which may include work-based learning such as internships, mentorships, simulated work environments, and other hands-on or inquiry-based learning activities; and**

Texas defines capstone work-based learning experiences to align with the definition provided in Perkins V legislation. This definition indicates that capstone work-based learning experiences provide sustained interactions with industry or community professionals in real workplace settings, to the extent practical, or simulated environments at the educational institution that foster in-depth, firsthand engagement with the tasks required in a given career field, that are aligned to curriculum and instruction. The TEA believes that work-based learning should start in early grades and progress through postsecondary education.

Work-Based Learning Continuum



Industry and Career Awareness	Industry and Career Exploration	Career Preparation	Career Training
<ul style="list-style-type: none"> • In School Activities: <ul style="list-style-type: none"> • "Career Day" events • Career play centers • Guest speakers • Interest surveys • Lunch and Learns • Strengths finders • Out of School Activities: <ul style="list-style-type: none"> • College visit • Field trips 	<ul style="list-style-type: none"> • In School Activities: <ul style="list-style-type: none"> • Aptitude assessments <ul style="list-style-type: none"> • Armed Services Vocational Aptitude Battery Career Exploration Program • Guided research projects • Interest surveys • Mentorship programs • Project-based learning • Strengths finders • Out of School Activities: <ul style="list-style-type: none"> • Explorer Club • Interviewing professionals • Job shadowing • Supervised Agricultural Experience (Exploratory) • Worksite tours 	<ul style="list-style-type: none"> • In School Activities: <ul style="list-style-type: none"> • Credential or license attainment • Mock job interviews • Simulated workplace programs • Out of School Activities: <ul style="list-style-type: none"> • Career Preparation • Clinical rotations • Career and Technical Student Organization competitions • Explorer Post • Internships • Practicum • Pre-apprenticeships \ Youth Apprenticeships • Supervised Agriculture Experience (Production or Entrepreneurship) 	<ul style="list-style-type: none"> • In School Activities: <ul style="list-style-type: none"> • Associates Degree and/or Bachelors Degree • Credential or license attainment • Skill retraining • Out of School Activities: <ul style="list-style-type: none"> • Registered Apprenticeships • Industry-Recognized Apprenticeships • Internships

Work-Based Learning Activity Examples

In order to help students thoroughly understand all aspects of an industry, the TEA has engaged secondary, postsecondary and employers through industry advisory committees, CTE leadership committee, Tri-Agency partnerships, Texas Regional Pathways Network committee, and work-based learning advisory committee. These stakeholders have assisted with the development of the programs of study, and the alignment of industry-based certifications and work-based learning experiences.

The TEA will develop or procure a technology product which has the capabilities to collect, analyze, store, monitor, and report on work-based learning opportunities participated in by students across Texas. The TEA seeks a technology solution which will allow users at all levels (classrooms, training stations, schools, Education Service Centers, state agencies, etc.) to enter pertinent information related to work-based learning experiences. Intended outcomes from procuring and utilizing a statewide work-based learning data collection system include:

- Better identification of the types of work-based learning experiences available to students (internships, pre-apprenticeships, apprenticeships, etc.)
- Better identification of the employers engaged in supporting work-based learning experiences across the state
- Increased documentation of students' employability skills
- Facilitating connections between educational institutions and employers in order to establish work-based learning opportunities
- Improved development of work-based learning training plans

To facilitate the implementation of work-based learning at the local level, two primary strategies will be utilized. First, virtual tools will be identified to help students participate in virtual work-based learning experiences. This strategy will be highly important in the many rural areas of Texas. Second, an intermediary network will be piloted and scaled. Intermediaries are an essential element to the work-based learning delivery model. In a pilot program, work-based learning intermediaries will be placed in various regions of the state and tasked with coordinating alignment and efforts between local schools and employers. If the pilot program shows evidence of success, it will be scaled for greater impact.

The Texas Regional Pathway Network supports cross-sector teams of regional stakeholders who are building education and career pathways that align with labor market demand. It facilitates peer learning, strategic planning, and sharing of best practices, challenges, and lessons learned in pathways development. The TRPN convenes twice annually, and members also have access to an array of Tri-Agency and other state resources, including funding and technical assistance opportunities.

The Texas Regional Pathway Network provides technical assistance to grantees through the following activities:

<p>Possible Technical Assistance for Cross-Sector Partnerships</p> <ul style="list-style-type: none"> Support for strategic planning and vision setting Intermediary capacity building, including sustainability planning Advising on the development of MOU's Facilitation of regional pathways steering committee or planning team meeting of regional stakeholders Facilitation of cross-district student pathways development and coordination Development of fundraising and communications strategies Advising on the use of data and metrics to support pathways development and continuous improvement
<p>Possible Technical Assistance for Alignment with Labor Market Demand</p> <ul style="list-style-type: none"> Development of reverse mapping process, including processes for employer engagement and feedback, and support its implementation Support in understanding LMI and how to use it to design pathways Skills mapping: work with employers and educators to identify technical and employability competencies that are in-demand in the regional labor market and can be used to inform pathways design
<p>Possible Technical Assistance for Links Between Secondary and Postsecondary Education</p> <ul style="list-style-type: none"> Support in aligning programs of study from secondary to postsecondary, including convening working groups comprised of secondary and postsecondary educators Advising on the development of bridge programs and other initiatives that support seamless transitions from secondary to postsecondary
<p>Possible Technical Assistance for Integration of Rigorous Academics and Career-Focused Learning</p> <ul style="list-style-type: none"> Support for CCRSM development Advising on strategies for leveraging CCRSM's to support pathways Advising on strategies for creating infrastructure, such as common planning time, to support teachers in CTE programs and core academic subjects in developing integrated approaches
<p>Possible Technical Assistance for College and Career Information and Advising</p> <ul style="list-style-type: none"> Development of college and career information and advising continuum Support for familiarizing teachers and counselors with LMI resources Support in identifying related out-of-school time programs and connecting them to pathways
<p>Possible Technical Assistance for Continuum of Work-Based Learning Opportunities</p>

Development of WBL continuum

Creation of tools and resources for educators and employers

Capacity building for intermediaries creating infrastructure to support WBL

Possible Technical Assistance for Credentials with Value in the Labor Market

Development of processes for soliciting employer feedback on credentials

Support using LMI to identify promising credentials

THECB requires that colleges comply with the Guidelines for Instructional Programs in Workforce Education (GIPWE) in developing CTE programs.

GIPWE requires that a college must provide at least one of the following for each approved award: a) capstone experience, b) eligibility for a credentialing exam, and/or c) an external learning experience. The experience should occur during the last semester of the student's educational program.

The capstone is a learning experience resulting in consolidation of a student's educational experience and certifies mastery of entry-level workplace competencies. Methods of providing a capstone experience include the following:

1. a comprehensive, discipline-specific examination prepared by the faculty of the workforce education program and administered at the conclusion of the program;
2. a course involving simulation of the workplace, case studies, portfolios, and employment scenarios; and
3. a discipline-specific project involving the integration of various teams of students performing activities to simulate situations that may occur in the workplace.

Credentialing exams are licensure, certification, or registration exams provided by state or national agencies or by professional organizations. An external learning experience, paid or unpaid, enhances lecture and laboratory instruction and is provided at work sites appropriate to the discipline. The inclusion of an external learning experience in both certificate and applied associate degree plans is strongly recommended. The external learning experience allows a student to have practical, hands-on training and to apply learned concepts and theories in a workplace setting. There are five types of external learning experiences: clinicals, internships, practica, cooperative education, and apprenticeships. Clinical and internship experiences provide workplace settings in which students learn and apply program theory and management of the workflow.

vii. improve outcomes and reduce performance gaps for CTE concentrators, including those who are members of special populations. (Section 122(d)(4)(C) of Perkins V)

By using CTE course completer data, a true picture of performance gaps for all student populations will identify opportunities for districts to provide targeted assistance.

The TEA CCMP division will review the current model of differentiated supports for technical assistance and supports that are being used by Review and Support/RDA, such as Universal Supports, Targeted Supports, and Intensive Supports to see if additional resources for support are needed. For each level, LEAs could choose supports that would match the gaps and outcomes that they need to address.

Our special education department at TEA holds a policy roundtable to discuss key legislative issues and statewide needs related to special education. A CTE education specialist attends the roundtable to provide information and to gain an understanding of how CTE can assist with special education student needs. Additionally, the Review and Support department at TEA meets with the CTE team related to cross-functional projects and student needs.

THECB provided each of the state's 54 public postsecondary institutions with disaggregated special populations performance data as a component of its resources supporting the Comprehensive Local Needs Assessment. Data was provided to each institution by cluster or program at the two- or four-

digit CIP code level to comply with FERPA. Postsecondary institutions are required to address identified performance gaps with Perkins funds as a condition for receiving a formula grant.

Postsecondary institutions are required to address identified performance gaps with Perkins funds as a condition for receiving a formula grant. Disaggregated performance results are monitored by THECB.

d. Describe how the eligible agency, if it opts to do so, will include the opportunity for secondary school students to participate in dual or concurrent enrollment programs, early college high school, or competency-based education. (Section 122(d)(4)(D) of Perkins V)

Texas College and Career Readiness School Models include: Early College High Schools (ECHS), Pathways in Technology Early College High Schools (P-TECH) and Texas Science, Technology, Engineering, and Mathematics (T-STEM) academies provide opportunities for students to bridge the gap between high school and college and career and earn credentials such as degrees and certifications. Specific requirements are outlined in the model specific Blueprints which includes Benchmark requirements and Outcomes-Based Measures (OBM) All three models must be:

- open enrollment
- Provided to students a no cost
- Provide student supports including academic, social, and emotional
- Provide an opportunity to earn college credit
- Partner with Texas Institutions of Higher Education (IHEs) for courses to earn college credit (both academic and workforce)
- Provide flexible scheduling

ECHS Campuses specifically must provide:

- students the opportunity to earn an associate degree or up to 60 college credit hours prior to high school graduation
- up to 5 years to complete their associate degree and high school diploma

Both the P-TECH and T-STEM campuses must provide:

- students grade 9 through 12 (P-TECH) and 6-12 (T-STEM) the opportunity to complete a course of study that combines high school and post-secondary courses.
- enable students to earn a high school diploma, an associate degree, a two-year post-secondary certificate or industry certification, and complete work-based training
- allow students to gain work experience through an internship, apprenticeship, or other job training programs.
- partner regional businesses and industries, giving students access to post-secondary education and workforce training opportunities.
- 6 years to complete high school and earn credential (P-TECH)

ECHS, PTECH and T-STEM campus' are held accountable through the OBMs in each Blueprint. The OBMs are in the following areas:

- Access measures if the CCRSM campuses is serving all student populations with an emphasis on at-risk and underrepresented students
- Attainment measures if the students on the CCRSM campuses are reaching particular measure such as: earning a credential (degree and/or certification), completing work-based learning, completing college level courses etc.

- Achievement measures of the students on the CCRSM campuses are achieving certain measures such as meeting/masters level scaled scores on state achievement tests, college readiness on SAT/ACT/TSIA etc

Programs of study development included alignment to postsecondary education as occupational groupings were determined. The Classification of Instructional Program (CIP) codes that align to each program of study were reviewed and additional occupations which share postsecondary training were considered. This gives an additional opportunity to focus students toward attaining skills that lead to high-wage, high-skill, and in-demand careers with multiple entry and exit points.

Beginning in the 2019-2020 school year, LEAs were eligible to be reimbursed for the administration of either the SAT, ACT, or TSI-A exam for students in their junior or senior year of high school. This opportunity allows more students the ability to pursue higher education as well as dual credit and concurrent enrollment at no cost to the student, their families or the LEA. Some CTE programs of study include advanced academics like AP where appropriate. For example, Cybersecurity includes AP Computer Science Principles and AP Computer Science A.

The Advanced Academics team at the TEA developed a website and newsletter for communication with the field. These tools allow for dissemination of information to LEAs which is concentrated and focused, allowing for additional touchpoints and guidance for school administrators, counselors, and other stakeholders.

Consistent with statewide stakeholder input and applicable state law, THECB and the TEA will continue and strengthen its support of dual credit enrollment programs. THECB and the TEA will seek through the Tri-Agency Partnership and the Texas Workforce Investment Council to align more closely the curricula of secondary and postsecondary programs of study, as described in Sec. B.2.a above.

- Establishment of a Dual Credit Memorandum of Understanding (MOU). THECB requires that dual credit partnerships operate through a MOU that details how the junior/community college will offer courses for dual credit to students enrolled at school districts/secondary schools. All dual credit MOUs must contain the following elements:
 1. Eligible Courses;
 2. Student Eligibility;
 3. Location of Class;
 4. Student Composition of Class;
 5. Faculty Selection, Supervision, and Evaluation;
 6. Course Curriculum, Instruction, and Grading;
 7. Academic Policies and Student Support Services;
 8. Transcription of Credit;
 9. Funding; and
 10. Defined Sequences of Courses, where applicable.
- Financial Incentives to Offer CTE Dual Credit Courses. THECB rules implement TEC 61.059, which allows public junior/community colleges to claim state formula funding for college CTE courses offered to high school students through dual credit partnerships. THECB further incentivizes the delivery of CTE courses to high school students through the Community College Success Points process. Public junior/community colleges can claim a percentage of legislatively allocated success point funding for high school students who complete course requirements for Board-approved Level 1 and Level 2 certificates and applied associate degrees.

e. Describe how the eligible agency will involve parents, academic and career and technical education teachers, administrators, faculty, career guidance and academic counselors, local business (including small businesses), labor organizations, and representatives of Indian Tribes and Tribal organizations,

as appropriate, in the planning, development, implementation, and evaluation of its career and technical education programs. (Section 122(d)(12) of Perkins V)

See response in section 2.c.ii for stakeholder involvement in the program of study development.

The TEA and THECB make use of industry advisory committees representing parents, academic and CTE teachers, administrators, counselors, and local businesses. In addition, TEA has established a CTE Leadership Committee which includes an administrator from an LEA in each of the 20 education service center regions. Education Service Center CTE specialists from each region provide training and technical assistance throughout the state and play a key role in CTE. Each of these groups meet regularly to inform the planning, development, implementation, and evaluation of CTE at the state and local levels. These stakeholders provide a balanced geographic representation on all advisory committees.

The Career and Technical Association of Texas (CTAT) is the professional organization for CTE administrators in the state. Members include CTE directors, CTE teachers, counselors, and LEA administration. The partnership between CTAT and TEA helps to inform the planning, development, implementation, and evaluation of CTE. Throughout the development of the Perkins V State Plan, these stakeholder groups were asked to engage in the development and evaluation of the plan for Texas.

Throughout the development of the Perkins V State Plan, these stakeholder groups were asked to engage in the development and evaluation of the plan for Texas.

Statewide postsecondary program of study (POS) advisory committee members include representatives of secondary and postsecondary education, business and industry, other state agencies and licensing bodies as relevant, and other career and technical education experts. All proposed POS adopted by advisory committees are subject to a 30-day public comment period. Comments are reviewed and acted upon by a committee before a proposed POS goes to the board for approval.

WECM Advisory Committee membership includes representatives from public community, state, and technical college as well as representatives from the Texas Association of College Technical Educators (TACTE), the Texas Administrators of Continuing Education (TACE), and the Texas Association of College Registrars and Admissions Officers (TACRAO).

Agendas for advisory committee meetings are posted in the Texas Register at least 10 days in advance. Advisory committee meetings are open to the public and broadcast via the web. Advisory committee minutes are maintained in a form and location that is easily accessible to the public on THECB's website.

The Texas Association of Career and Technical Educators (TACTE) is the state's professional association for postsecondary CTE faculty and administrators. THECB partners with TACTE to receive field input on CTE issues and for dissemination Perkins information. TACTE maintains a Perkins page on its website and incorporates presentations by Perkins State Leadership programs its annual conference.

f. include a copy of the local application template that the eligible agency will require eligible recipients to submit pursuant to section 134(b) of Perkins V. See Text Box 4 for the statutory requirements for local applications under section 134(b) of Perkins V.

See TEA Appendix 7 for the Secondary Perkins V Local Application.

See THECB Appendix 3 for the Postsecondary Perkins V Local Application

g. include a copy of the comprehensive local needs assessment template and/or guidelines that the eligible agency will require of eligible recipients to meet the requirements of section 134(c) of Perkins V. See Text Box 5 for the requirements for the comprehensive local needs assessment under section 134(c) of Perkins V.

See TEA Appendix 8 for the Comprehensive Local Needs Assessment.

See THECB Appendix 4 for the Postsecondary Perkins V Comprehensive Local Needs Assessment

h. Provide the eligible agency's definition for "size, scope, and quality" that will be used to make funds available to eligible recipients pursuant to section 135(b) of Perkins V.

Career and Technical Education (CTE) programs of study must meet the criteria of sufficient size, scope, and quality to be effective and seek funding under the Act. Size is defined as providing sufficient opportunity for youth and adult learners to matriculate through concentrator and completer status at the secondary and postsecondary levels. This means that LEAs must offer a specific number of programs of study based upon their district high school enrollment numbers. The table below demonstrates the minimum number of programs of study required:

High School Enrollment	Number of Programs of Study Offered
Less than 500 students	1 program of study
501-1,000 students	2 programs of study
1,001-2,000 students	3 programs of study
2,001-5,000 students	4 programs of study
5,001-10,000 students	5 programs of study
10,001 + students	6 programs of study

LEAs should provide the opportunity for students to complete a program of study within four years. Completion is defined as three or more courses for four or more credits with at least one level three or four course within a single program of study.

Scope is defined as including rigorous academic and technical standards, employability skills, and by providing students with opportunities to earn industry-recognized credentials, participate in work-based learning experiences, and connect secondary to postsecondary coursework. Quality is defined as providing sufficient opportunity to meet or exceed performance targets under the Perkins V Act, providing support for special populations enrolled in CTE programs, providing procedures to continuously improve all aspects of programs, and including Career and Technical Student Organization participation. Postsecondary institutions must meet the criteria set forth in the Guidelines for Programs in Workforce Education (GIPWE) described in Section B.2.b above.

Beginning with the FY 2020-2021 program year, postsecondary institutions will be required as a condition of receiving Perkins funding to develop secondary/postsecondary program of study MOUs with one or more constituent high schools consistent with THECB-designated enrollment peer group designation:

Enrollment Peer Group	Number of Secondary/Postsecondary Program of Study MOUs
Small	1-3
Medium	3-5
Large	5-7
Very Large	7-9

3. Meeting the Needs of Special Populations

a. Describe the eligible agency's program strategies for special populations, including a description of how individuals who are members of special populations—

i. will be provided with equal access to activities assisted under this Act;

Students in special populations may be a participant or participate in the following programs: Bilingual Education/English as a Second Language, Career and Technical Education, Every Student Succeeds Act and Special Education.

Special populations are defined as individuals with disabilities, individuals from economically disadvantaged families, individuals preparing for non-traditional fields, pregnant and parenting students, out of workforce individuals, English learners, homeless and unaccompanied youth, youth in foster care, students with a parent or guardian who is an active duty member of the Armed Forces, including full-time National Guard duty, and migrant students.

The TEA has a contract for a statewide CTE evaluation that will look at results of CTE participants and CTE concentrators at the career cluster level and will disaggregate the information based on the special

populations categories. The TEA will also partner with an external group/consultant to ensure that there is training provided to the TEA staff and education service center CTE specialists. Data will be provided to CTE administrators to enable them to best address performance gaps in CTE programming through the Comprehensive Local Needs Assessment (CLNA).

At both the secondary and postsecondary levels, applicants for Perkins funding must indicate the steps taken to ensure that all individuals from special populations are provided equal access to CTE programs and activities. Local programs are required to sign provisions and assurances in the local application to receive Perkins funding. Secondary and postsecondary recipients must identify any barriers that exist for special population groups within the Comprehensive Local Needs Assessment (CLNA).

In the eGrant application for secondary Perkins funds, districts must identify strategies to meet the needs of special populations, including strategies to assure that students who are members of special populations are provided equal access to CTE programs. If the admission, review, and dismissal (ARD) committee for secondary students with disabilities refers a student to a CTE sequence of courses, the committee must include a CTE representative, preferably a CTE teacher, so students are appropriately placed and served in CTE programs.

Postsecondary institutions use a variety of strategies for assisting special populations such as:

- providing outreach and recruitment information, including outreach and recruitment encouraging enrollment in nontraditional programs of study
- identifying and following up with special populations students;
- supporting special populations students with enhanced advisement services, tutoring services, success coaches, and career coaches
- determining special needs for accommodations so that students can succeed;
- providing in-service activities for CTE teachers, counselors, and administrators;
- providing special instructional materials as needed;
- providing Perkins funds for childcare, transportation, textbook loan programs, and credential testing vouchers.

Eligible recipients at the local level ensure that strategies and services for special populations in CTE programs are appropriate and prepare special population students for high-skill, high-wage, and in-demand occupations. Additional strategies include:

- career exploration activities and resources that are free of gender bias; and incorporate Universal Design for Learning
- comprehensive career development for academic counseling and career guidance; that includes assistive technology, office of disability services information, and ADA/Section 504 requirements
- equitable access to quality work-based learning opportunities; and
- information on nontraditional training in high-skill, high-wage, or high-demand fields.

ii. will not be discriminated against on the basis of status as a member of a special population;

The Texas Education Results Driven Accountability (RDA) is a comprehensive evaluation system designed to improve student performance and program effectiveness to support Local Education Agencies (LEAs). The RDA framework is a data-driven system that utilizes performance indicators, data validation indicators, and other indicators of program compliance required by federal law. Specific program areas include: Bilingual Education or English as a Second Language (BE/ESL), Career and Technical Education (CTE), Every Student Succeeds Act (ESSA), and Special Education (SPED).

TEA monitors special population subgroups to ensure that there is no form of exclusion from CTE programs or a disproportionately high number of special population students in CTE programs. LEAs are

evaluated in each program area and assigned an overall performance level (PL). The LEA will be assigned a PL0, PL1, PL2, PL3 or PL4 for each indicator and program. The PL is aligned to a specific level of support. The Review and Support staff at TEA will provide general supervision and progress monitoring of the Strategic Support Plan (SSP) and link LEAs to technical assistance for program-specific needs. The SSP incorporates data findings, problem statements, and root causes that address areas of low performance and program ineffectiveness for ESSA indicators.

LEAs ensure equal access to programs through yearly non-discrimination notifications to students, parents, school employees, and the public. Nondiscrimination statements are required in all district publications. As a recipient of federal financial assistance, LEAs are required to comply with federal laws and regulations that prohibit discrimination based on race, color, national origin, sex, and disability in its vocational programs, services or activities as required by Title VI of the Civil Rights Act of 1964, as amended; Title IX of the Education Amendments of 1972; and Section 504 of the Rehabilitation Act of 1973, as amended. LEAs will take steps to assure that lack of English language skills will not be a barrier to admission and participation in all educational and vocational programs.

During the Methods of Administration (MOA) review, the identification of campuses within districts is based on methodology that reviews the disproportionality of representation of student groups enrolled in CTE courses in comparison to the demographics represented on the campus. Additional consideration is also based on the number of years since the last on-site review and the student enrollment count on the campus. Campuses are selected for review based on the Texas Education Agency's targeting plan. The selection criteria in the targeting plan places emphasis on the provision of equitable opportunities for students to participate in CTE. Students representing identified special populations enrolled in a CTE course are compared to the general population enrolled in a CTE program of study.

Individuals who have complaints regarding program access issues may take their concern to their local school board or to the TEA.

Texas universities and community, state, and technical colleges are required to be non-discriminatory and must post a statement to that effect in all college publications. Data on student populations is gathered, reported, and analyzed through the THECB's accountability and reporting systems. To monitor civil rights compliance, THECB conducts a biannual risk assessment of public, two-year community, state, and technical colleges, using a targeting plan approved by the Department of Education's Office of Civil Rights (OCR). Four colleges are subject in each biennium to Methods of Administration (MOA) civil rights compliance site visits based on the risk assessment. THECB additionally submits a biannual report to the U.S. Department of Education Office for Civil Rights on findings made during the previous two years' MOA site visits and colleges' resolutions of violations identified. THECB staff conducting MOA site visits attend annual, required training provided the OCR.

iii. will be provided with programs designed to enable individuals who are members of special populations to meet or exceed State determined levels of performance described in section 113, and prepare special populations for further learning and for high-skill, high-wage, or in-demand industry sectors or occupations;

The Texas Education Results Driven Accountability (RDA) is a comprehensive evaluation system designed to improve student performance and program effectiveness to support LEAs. The RDA framework is a data-driven system that utilizes performance indicators, data validation indicators, and other indicators of program compliance required by federal law. Specific program areas include: Bilingual Education (BE) and English as a Second Language (ESL), Career and Technical Education (CTE), Every Student Succeeds Act (ESSA), and Special Education (SPED).

LEAs are evaluated in each program area and assigned an overall performance level (PL). The LEA will be assigned a PL0, PL1, PL2, PL3 or PL4 for each indicator and program. The PL is aligned to a specific level of support. Review and Support staff at TEA will provide general supervision and progress monitoring of the Strategic Support Plan (SSP) and link LEAs to technical assistance for program-specific needs. The SSP incorporates data findings, problem statements, and root causes that address areas of low performance and program ineffectiveness for ESSA indicators.

Texas offers a single path to a graduation diploma for all students including students that fall within the special population categories. LEA's should provide:

- programs of study that lead to an endorsement
- career exploration and preparation activities, and resources that are free of bias and incorporate UDL strategies
- comprehensive career development for academic counseling and career guidance that includes assistive technology, office of disability services information, and ADA/Section 504 requirements
- equitable access to quality work-based learning opportunities and career development instruction
- information on nontraditional training in high-skill, high-wage, and high-demand fields

The Texas 21st Century Community Learning Centers (CCLC) program, also called the Texas Afterschool Centers for Education (Texas ACE), provides competitive grant funding to 83 grants serving students in 610 centers across the state. The program provides academics, academic enrichment, and other expanded learning opportunities during non-school hours for children, particularly students who attend high-poverty and low-performing schools in order to help students meet state and local student standards in core academic subjects, such as reading and math, and meet other academic and related outcomes. Most grantees serve at least one campus implementing comprehensive support and improvement activities or targeted support and improvement activities under ESEA as amended, Section 1111(d) and serving campuses with an at risk population greater than the state average.

The activities provided reinforce and complement the regular academic programs of the schools attended by the students and are targeted to the students' academic needs. The TEA provides supports for local programs to conduct annual needs assessments and program evaluation that drive continuous program improvement and result in high quality programs that help students reach their academic goals. Activities that are common in Texas ACE programs include tutoring, homework help, nutritious snacks/meals, academic enrichment, college and career preparation, mentorship, team sports and physical activity, family engagement, family literacy, and more.

Texas partners with 28 local agencies that operate the Community In Schools programs. The mission of Communities In Schools (CIS) in Texas is to surround students with a community of support, empowering students to stay in school and achieve in life. The CIS model is designed to keep students persisting in education and ultimately graduate from high school. CIS partners with educators, students, and parents to identify needs of students who are at-risk of dropping out of school. Once the needs are identified, CIS customizes supports for students and families and provides individual case management services, engaging the community as part of this process. CIS monitors student level data and tracks education outcomes for those students served. CIS in Texas has six components:

- Health and human services- including mental health and basic needs
- Supportive guidance and counseling- both individual and group, and crisis response
- Parental and family engagement- including home visits and consultation
- Academic enhancement and support- including tutoring and extended learning time
- College and career awareness- including preparation and transition
- Enrichment activities- including mentoring and school engagement activities

iv. will be provided with appropriate accommodations; and

In Texas, a student's eligibility for special education services and most of the major decisions about a student's special education program are made by an admission, review, and dismissal committee. This group is also referred to as an individualized education program (IEP) team, which is the term used in federal law. CTE representatives are required to be included on this team when the child is placed in a CTE course. If the student is identified as an English learner, the ARD committee must work in conjunction with the language proficiency assessment committee (LPAC) to determine appropriate entry and exit criteria for Bilingual Education or English as a Second Language program.

An ARD committee must be formed to review and determine whether a student is eligible for special

education and related services. The ARD committee members include the following:

- the guardian;
- at least one regular education teacher of the student who must, when possible, be a teacher who is responsible for implementing a portion of the student's IEP;
- at least one special education teacher or provider for the student;
- a representative of the school;
- a person who can interpret the instructional implications of the evaluation results;
- other individuals who have knowledge or special expertise regarding the student and are invited by either the guardian or the school;
- whenever appropriate, the student;
- to the extent appropriate, with guardian's written consent or, after the child reaches age 18, with the adult student's written consent, a representative of any participating agency that is likely to be responsible for providing or paying for transition services;
- the ARD committee shall include a representative from career and technical education, preferably the teacher, when considering initial or continued placement of a student in a career and technical education program.
- a professional staff member who is on the language proficiency assessment committee, if the child is identified as an English learner.

The ARD committee also includes, as applicable:

- a teacher who is certified in the education of students with auditory impairments, if the child has a suspected or documented auditory impairment;
- a teacher who is certified in the education of students with visual impairments, if the child has a suspected or documented visual impairment; or
- a teacher who is certified in the education of students with visual impairments and a teacher who is certified in the education of students with auditory impairments, if the child has suspected or documented deafness-blindness.

In addition, the ARD committee must address special factors for some students, as follows:

- consider the use of positive behavioral interventions and supports, and other strategies, to address behavior that impedes learning;
- consider the language needs of the student as those needs relate to the student's IEP when the student qualifies as a student with limited English proficiency; provide for instruction in braille and the use of braille, unless the committee determines that instruction in braille or the use of braille is not appropriate for the student when the student is blind or visually impaired;
- consider the communication needs of the student, and for the student who is deaf or hard of hearing, consider the student's language and communication needs, opportunities for direct communications with peers and professional personnel in the student's language and communication mode, academic level, and full range of needs, including opportunities for direct instruction in the student's language and communication mode; and
- consider whether the student needs assistive technology devices and services.

THECB performs oversight of public, two-year community, state, and technical colleges for compliance with federal civil rights statutes and their implementing regulations. THECB conducts a biannual risk assessment using a targeting plan approved by the Department of Education's Office of Civil Rights (OCR)

and conducts two site visits annually based on risk assessment outcomes.

v. will be provided instruction and work-based learning opportunities in integrated settings that support competitive, integrated employment. (Section 122(d)(9) of Perkins V)

Work-based learning is included in each program of study. The expectation from the TEA is that all students will have access to work-based learning experiences, including students with disabilities. LEA's (including the Texas School for the Blind and Visually Impaired and the Texas School for the Deaf) should provide professional development activities for CTE teachers, paraprofessionals, counselors, administrators, and special education teachers related to curriculum modification, equipment modification, classroom modification, supportive personnel, and instructional aids and devices.

The Workforce Innovation and Opportunity Act (WIOA) requires that pre-employment transition services, including work-based learning experiences, be made available to students with disabilities in need of such services who are eligible or potentially eligible for Vocational Rehabilitation (VR) services. WIOA requires coordination of services to promote career readiness, secondary school completion, entry into postsecondary education, and postsecondary credentials aligned with in-demand industry sectors. In addition to WIOA funding, Texas LEA's are also able to access Every Student Succeeds Act (ESSA) and Individuals with Disabilities Education Act (IDEA) funds to promote and implement CTE programs. Work-based learning experiences may include a continuum of experiences such as: in-school or after school opportunities, or experiences outside the traditional school setting (including internships), summer and year-round employment, pre-apprenticeship, on-the-job training, job shadowing, or simulated experience.

Partnerships with State agencies, including State educational agencies and State VR agencies, schools, worksites, businesses, families and community organizations, and communities can create opportunities to develop transferrable skills to prepare for postsecondary education and employment. Work-based learning experiences with appropriate site-based supervision provide opportunities for assessing abilities and strengths outside the classroom. Participation in job-related tasks provides a chance to explore how to communicate disability-related work support and accommodation needs, if necessary. This information can be referenced in the Federal Partners in Transition- What to know About Work-Based Learning Experiences document found in TEA Appendix 9.

4. Preparing Teachers and Faculty

a. Describe how the eligible agency will support the recruitment and preparation of teachers, including special education teachers, faculty, school principals, administrators, specialized instructional support personnel, and paraprofessionals to provide career and technical education instruction, leadership, and support, including professional development that provides the knowledge and skills needed to work with and improve instruction for special populations. (Section 122(d)(6) of Perkins V)

The TEA Career and Technical Education department provides supports at the state leadership level to assist LEAs with the recruitment of CTE teachers which is evident in the broad approach by which the agency assists with routes to hire qualified candidates. This process aligns with the overall agency philosophy as expressed in strategic priority one: recruit, support, and retain teachers and principals.



Within the State’s specific action items to achieve priority one, several intertwine with the CTE departments efforts to recruit CTE teachers. This is accomplished by strengthening the teacher pipeline every step of the way and supporting the development of principals through the following initiatives:

- Build a robust pipeline of effective teachers in hard-to-staff regions by incentivizing districts and ESCs to pursue innovative “Grow Your Own” teacher recruitment initiatives. Districts implementing “Grow Your Own” strategies will ensure the quantity, quality, and diversity of teacher pipelines for generations to come.
- The TEA redesigned the teacher certification framework with a focus on increasing the rigor, relevancy, reliability, and validity of the certification assessments by introducing assessments that place a greater emphasis on valid, authentic practice (especially in content pedagogy). A more rigorous certification assessment and process will help ensure an excellent teacher in every classroom by facilitating the transformation of teacher preparation programs to meet this new higher, more relevant standard.
- The TEA completed a comprehensive redesign of the principal certification framework with a focus on instructional leadership and competency-based indicators. Similar to the intent of the teacher certification redesign, a more rigorous principal certification assessment will have the effect of ensuring a world-class principal in every school by accelerating the transformation and continuous improvement of principal preparation programs to meet this standard which is more grounded in what we know is required from administrators to improve student outcomes.
- Created the Trades and Industrial Workforce Training: Grades 6-12 certificate due to the condensed number of preparation hours for teacher candidates. The TEA staff worked with a standards advisory committee to narrow and prioritize the standards for beginning teachers. In addition, TEA staff and the advisory committee sought to further prioritize the standards needed to meet the needs of students in trade and industrial education courses and consider the entry point of teacher candidates.
- Allowed career and technology teachers employed for at least 50% of the time in an approved career and technology position to count up to two years of work experience for salary increment purposes if the work experience was required for career and technology certification.

Other statewide initiatives that impact the recruitment of CTE teachers allow districts the autonomy to meet local instructional needs by providing a pathway for the hiring of candidates with industry experience. Within the “District of Innovation” state legislative act, an allowable exemption by district application is the flexibility to develop an educator certification process independent of state

requirements. The School District Teacher Permit also allows districts to autonomously hire individuals with industry experience to teach CTE courses. District of Innovation and the School District Teaching Permit requires candidates to have:

1. Relevant college/university coursework in the subject area taught
- Or
2. Relevant experiences related to the subject area to be taught.

The development of CTE specific recruitment strategies of qualified candidates will be enhanced with the establishment of collaborative relationships with industry partners, professional industry organizations, and military organizations within the state. The TEA encourages LEAs to engage professional organizations by listing the opportunities available in secondary education through the organization's communications mediums. Promoting the organizations involvement in the career pipeline in the K-12 environment as an opportunity to enhance professional standards through improved instruction by industry experts which leads to increased entry level skill attainment. The recent passage of House Bill 3 included a teacher incentive allotment that will assist with teacher recruitment and retainment that will provide funding based upon additional teacher credential attainment.

Military recruitment engagement activities include providing access to military spouses who are education professionals and aligning military occupational specialties of veterans exiting service with teaching careers in Texas and promoting the information at armed forces alumni centers. Recruitment activities with the "Troops to Teachers" program which trains retiring veterans, will inform this highly qualified population about CTE teacher positions in Texas.

Teacher preparation, once qualified candidates have been successfully recruited, determines the depth and breadth of a CTE teacher's career. Working with educator preparation programs, LEAs, and teacher organizations to identify best practices for initial training, first year supports, and sustained support of CTE teachers the state agency will guide the dissemination of the selected strategies. New teacher training that provides the basic elements of being a new CTE teacher to include teaching strategies for special needs students, differentiating learning, engaging instructional strategies, and employability skills will be developed offered to districts by using a regional distribution delivery model.

Administrative leadership in CTE is comprised of two distinct categories, CTE administrators and campus/district administrators who work in consort to guide CTE programs. The TEA gathered the input of school principals and LEA administrators by conducting a statewide listening tour that offered direct messaging and feedback sessions with agency members. Professional development training on best practices for completing local needs assessments, supportive strategies for program sustainment, resources to use for master scheduling and long-term planning, and metrics to determine program success by student sub-population will be provided by agency leadership. The TEA CTE team will facilitate development of an administrative tool kit that will be available as a virtual module and in-person training session.

The TEAs creation of resources for faculty, such as counselors and career coordinators, informs the selection of a program of study that culminates in the completion of an industry-based certification or a work-based learning opportunity.

School counselors in Texas will receive training on Perkins V updates and programs of study implementation procedures to improve the quality of advisement students receive at the secondary and middle school level.

The development of training modules for support personnel to provide a perfunctory knowledge of the CTE course in which support is offered provides an expansion of accessibility to special population students. Support personnel are not expected to have the content expertise of the classroom teacher; however, adequate supports can be provided with a working knowledge of project goals and student expectations. The TEA CTE department will provide virtual training modules which will increase access and availability to Texas LEA support personnel.

Teacher, counselor, administrator, and support personnel preparation which includes instructional strategies for special population students, providing resources for counselors to inform the selection of a career pathway by special population students and their families, training the support personnel needed

for individual student success, and developing a professional development system that maintains and improves upon the knowledge and skills required to work with special populations is an instructional environment designed for the success of all students. The TEA is contracting with an outside entity to work professional development for CTE teachers and administrators. The CTE 101 training module will review the standard elements of a CTE program and incorporate training on equity and access. The work-based learning toolkit will provide guidance on conducting an effective extended learning experience for students, high-quality implementation strategies, and the roles and responsibilities of school administrators and staff.

College, Career and Military Readiness Professional Development

Professional Development	2020-2021	2021-2022	2022-2023	2023-2024
CTE Administrator	Content Development	Training Rollout	Resources Available	Resources Available
Counselor	Content Development	Training Rollout	Resources Available	Resources Available
CTE Educator	Content Development	Training Rollout	Resources Available	Resources Available
CTE Special Populations	Content Development	Training Rollout	Resources Available	Resources Available
CTE Work-Based Learning	Training Rollout	Resources Available	Resources Available	Resources Available
CTE Special Education	Content Development	Content Rollout	Ongoing Support and Updates	Ongoing Support and Updates
STEM	Content Development		Training Rollout	Ongoing Training
CCRSM Advisor	Content Development	Training Rollout	Ongoing Training	Ongoing Training
CCRSM Blueprint Tool Kit	Training Rollout	Ongoing Training	Ongoing Training	Ongoing Training
P-TECH Leadership Training	Content Development	Training Rollout	Ongoing Training	Ongoing Training
CCRSM Administrator and Teacher Postsecondary Rigor Training	Ongoing Training	Ongoing Training	Ongoing Training	Ongoing Training
TRPN Cross Planning Time Training	Training Rollout	Ongoing Training	Ongoing Training	Ongoing Training
Career Readiness Middle School Curriculum Training	Training Rollout	Training Implementation Monitoring	Training Implementation Monitoring	Training Implementation Monitoring
Effective Advising Framework Training	Training Rollout	Ongoing Training	Training Implementation Monitoring	Training Implementation Monitoring

Postsecondary institutions budget Perkins formula funds for professional development for career and technical education faculty and student support staff. Professional development supports ongoing faculty disciplinary training to maintain curricula and required certifications. For faculty and student support staff, professional development reinforces the knowledge and skills needed to improve instruction, enhance advisement and support, mitigate barriers for special populations students.

C. FISCAL RESPONSIBILITY

1. Describe the criteria and process for how the eligible agency will approve eligible recipients for funds under this Act, including how—

a. each eligible recipient will promote academic achievement;

Eligible applicants whose grant allotment is equal to or greater than \$15,000 must submit a Perkins V local application to receive federal funds. An eligible applicant whose grant allotment is less than \$15,000 may still participate in the grant allotment by forming a consortium/shared services arrangement (SSA) with other LEAs or a regional education service center to meet the minimum grant requirement of \$15,000. (See Shared Services Arrangements.) An eligible applicant may apply for a waiver as a rural, sparsely populated area or as a charter school that is not able to join an SSA. Evidence must be presented to justify the waiver request.

The following eligibility requirements also apply:

- The TEA reserves the right not to award a grant to an eligible applicant that is identified by the TEA as a high-risk grantee.
- The applicant must be in compliance with submitting the annual audit to the TEA, as described in the General and Fiscal Guidelines.

Each LEA will complete a Comprehensive Local Needs Assessment (CLNA) that will inform the local application for funding biennially.

See TEA Appendix 7 for the Perkins V Local Application, and TEA Appendix 8 for the CLNA.

THECB requires that its 54 eligible postsecondary institutions submit a Perkins V Local Application to receive federal funds. The Local Application requires that institutions identify specific activities for meeting each core indicator or performance. Each institution submits biannual progress reports that show progress on each activity or, for activities with no progress, how the institution plans to respond for improvement. All programs of study supported with Perkins funds meet the requirements of THECB's Guidelines for Programs in Workforce Education (GIPWE) described in Section B.2.b.

For the 2020-2021 program year, institutions will perform a Comprehensive Local Needs Assessment (CLNA). Institutions report findings to THECB in a CLNA report, summarize those findings in the Local Application, and address findings through the targeted use of Perkins formula funds as a condition of receiving Perkins formula funding as a condition of receiving Perkins formula funding.

b. each eligible recipient will promote skill attainment, including skill attainment that leads to a recognized postsecondary credential; and

All state-recognized programs of study will lead to a postsecondary credential or degree. Program of study frameworks, located in Appendix 4 demonstrate the multiple entry and exit points for credential attainment. The TEA tracks credential attainment through PEIMS reporting as well as data sharing agreements with THECB. These reports are currently made available in the Texas Academic Performance Reports (TAPR) system.

Additionally, the State's accountability plan for ESSA aligns with college and career readiness benchmarks providing credit to districts who have students who earn one of the measures listed below. LEAs and schools receive A-F grades. One factor evaluated is their score on college and career readiness, and these grades are reported publicly.

- meet criteria of 3 on AP or 4 on IB examinations
- meet TSI criteria (SAT/ACT/TSIA/College Prep course) in reading and mathematics
- complete a course for dual credit (9 hours or more in any subject or 3 hours or more in ELAR/mathematics)
- earn an associate degree

- complete an OnRamps course
- earn an industry-based certification
- graduate with completed IEP and workforce readiness (graduation type code of 04, 05, 54, or 55)
- enlist in the United States Armed Forces
- earn a level I or level II certificate
- graduate under an advanced degree plan and be identified as a current special education student

To incentivize LEA's to promote academic and skill attainment, the CCMR outcomes bonus allows districts to earn additional funds for preparing graduates for college, a career, or the military. CCMR outcomes bonuses will be paid for each annual graduate above a certain threshold. The bonuses apply to the following populations:

- Economically Disadvantaged: \$5,000 for each CCM-Ready economically disadvantaged annual graduate above a threshold.
- Non-Economically Disadvantaged: \$3,000 for each CCM-Ready non-economically disadvantaged annual graduate above a threshold.
- Special Education: \$2,000 for each CCM-Ready annual graduate enrolled in special education.

The CCMR bonus uses a more rigorous standard for CCMR than the academic accountability system:

College:

- Texas Success Initiative (TSI) score on SAT/ACT/TSI Assessment (TSIA) and
- Earned an associate degree prior to graduation or enrolled in college by the fall immediately after high school graduation

Career:

- TSI score on SAT/ACT/TSIA and
- Received an industry-based certification / Level I / Level II certificate

Military:

- Armed Services Vocational Aptitude Battery (ASVAB) passing score and
- Enlisted in U.S. Armed Forces after graduation

The purpose is to further the goal set under the state's plan for higher education developed under Texas Education Code (TEC) §61.051 for at least 60 percent of all adults aged 25 to 34 in Texas to achieve a postsecondary degree or workforce credential by 2030. House Bill 3 CCMR incentives are directly aligned with the Texas Education Agency strategic plan that every child is prepared for success in college, career, or the military.

All postsecondary programs of study supported with Perkins funds will meet the requirements of THECB's Guidelines for Programs of Study in Workforce Education (GIPWE) described in Section B.2.b. GIPWE requires the following program development and maintenance conditions to ensure technical skills attainment for students:

- Documentation of a robust job market;
- Alignment of curricula with the requirements of accrediting entities;
- The incorporation of work-based learning/capstone experiences; and
- Ongoing consultation with an industry advisory committee.

c. each eligible recipient will ensure the local needs assessment under section 134 takes into consideration local economic and education needs, including, where appropriate, in-demand industry sectors and occupations. (Section 122(d)(5) of Perkins V)

Texas defines high-wage as \$35,339, the annual median salary for Texas in 2017 based on the Texas Workforce Commission's workforce projections as well as real time labor data from Emsi through the 2020-2021 school year.

In secondary education, Texas defines high-skill as a program of study demonstrating multiple entrance and exit points into careers including industry-based certifications, postsecondary level one and level two certifications from a technical college or community college, an associate degree, and a bachelor's degree to ensure program of study sequences are continual and not job terminal.

Texas defines in-demand as having greater than 17% annual growth (2017 Texas median growth) based on the Texas Workforce Commission's workforce projections as well as real time labor data from Emsi.

Statewide labor market data does not support offering all CTE course sequences at every high school across Texas. Each year, local education agencies with labor market data to support regional programs of study may apply for additional course sequences. The application will require the submission of labor market data that validates the occupations and course sequence of the proposed program of study being aligned with regional needs for high-wage, high-skill, and in-demand careers.

In spring of 2020 for the 2020-2021 school year, LEAs will submit a Comprehensive Local Needs Assessment (CLNA) per the Perkins V process. This is to describe LEA CTE offerings, student benefits of CTE offerings and results of CTE offerings.

LEAs will be trained on how to complete the Perkins V local application for funding and the comprehensive local needs assessment during the fall of 2019 and spring of 2020 to support the submission of their application. Eligible recipients must biennially submit a Perkins V local application to receive Perkins funds. Local applications for secondary and postsecondary institutions must meet all the elements required in the Perkins Act. Eligible recipients must complete an online application and provide all information required prior to funding approval. Each application is reviewed to determine compliance with all legal requirements.

The local applications for both secondary and postsecondary institutions must provide performance targets and strategies for continuous improvement of academic achievement and technical skill attainment. Current and emerging occupational opportunities are identified through the analysis of statewide and regional data provided by the local workforce development boards and/or through labor market and career information made available through TWC. The TEA will provide regional labor data dashboards defining where the region has high-wage, in-demand occupations as a resource for completing the CLNA.

THECB's guidelines, template, and supportive resources for the postsecondary Comprehensive Local Needs Assessment (CLNA) require that institutions consult regional employers and industry groups to identify regional workforce needs. Institutions must also independently document workforce needs through state, regional, or local labor market data. THECB has provided labor market data resources to institutions.

2. Describe how funds received by the eligible agency through the allotment made under section 111 of the Act will be distributed—

a. among career and technical education at the secondary level, or career and technical education at the postsecondary and adult level, or both, including how such distribution will most effectively provide students with the skills needed to succeed in the workplace; and

Texas allocates Perkins Basic Grant funds between secondary and postsecondary programs under a funding split that is based on the number of CTE students served at the secondary and postsecondary level. The Texas State Board of Education (SBOE) approved the Texas state plan for Career and Technical Education, with a funding split of seventy percent for secondary programs and thirty percent for postsecondary programs. Texas uses Title I, Part B funds as follows: at least eighty five percent will be distributed by formula allocation to LEAs and community and technical colleges through the standard application system (SAS); ten percent will fund state programs and state leadership projects, and no more than five percent will fund administration of the state plan. Fifteen percent of the distributed formula allocation will be set aside for Perkins Reserve Grants.

Texas distributes funds supporting state programs and leadership projects through the request for application (RFA) process. Texas awards funds through the SAS to the Texas Juvenile Justice Department and the Windham LEA, which operate CTE programs in correctional institutions. In 2019-2020, the Texas School for the Deaf and the Texas School for the visually impaired were funded from the 1.5 percent set aside for institutions. Boys Ranch ISD is awarded funds through the SAS. THECB supports the Southwest College for the Deaf, a campus of Howard College, through a Perkins formula funding grant to Howard College.

THECB requires each eligible postsecondary recipient to submit a local application that develops a detailed description of a college's local program and how it will meet the requirements of Section 134(a) and (b). The postsecondary local application includes an evaluation plan that sets forth a college's activity plan for each core indicator, including measurable, locally determined performance targets for each activity.

b. among any consortia that may be formed among secondary schools and eligible institutions, and how funds will be distributed among the members of the consortia, including the rationale for such distribution and how it will most effectively provide students with the skills needed to succeed in the workplace. (Section 122(d)(8) of Perkins V)

The required elements for local Perkins plans related to consortia (called Shared Service Agreements in Texas) are integrated into the Perkins eGrant application, enabling consortia to complete the Comprehensive Local Needs Assessment (CLNA) and Perkins V local application through electronic submission. Consortia members are required to complete four sections of the CLNA (sections 1,2,4, and 7). The fiscal agent is required to complete the remaining sections (sections 3,5, and 6). Fiscal agents apply to the TEA for security clearance to submit a consortium application and are provided a username, password, and electronic signature. Districts must also submit information regarding their decision to participate in a specific consortium. The TEA Grants Administration review the consortium applications and, as needed, request additional information or clarification from the fiscal agent using text fields where the TEA staff may include negotiation notes or comments about the consortium application and plan. When the TEA staff members are satisfied with the information the fiscal agent has submitted, they approve the application. The Commissioner of Education must provide final approval of the application, and his electronic signature appears on the notice of grant award (NOGA) that is available electronically to the school district. The Perkins eGrant application/plan provides more guidance to districts for meeting the Perkins V requirements and focusing on continuous program improvement. Information about the application and supporting documentation is available at <http://burleson.tea.state.tx.us/GrantOpportunities/forms/GrantProgramSearch.aspx>.

Districts that are eligible for a federal Perkins allocation of less than \$15,000 are not eligible for direct receipt of Perkins funds, so they must participate in a consortium of districts with a total combined consortium allocation of \$15,000 or greater. The consortium determines a fiscal agent, which could be an ESC CTE specialist, school district or an institution of higher education that is a member of the consortium. The members of the consortium jointly determine the method for deciding consortium activities and funding priorities. For Perkins funding purposes, each consortium is treated like a single LEA. The formula for determining a consortium's Perkins allocation is identical to the formula applied to other LEAs that are eligible for Perkins funds. Members of a consortium reach agreement upon the mutually-beneficial programs and purposes that Perkins funds will support. Members will describe the purposes and programs in the formula grant application. The TEA only approves the grant application after the allocation of Perkins resources to meet the mutually-beneficial purposes and serve the needs of consortium members is agreed upon.

3. For the upcoming program year, provide the specific dollar allocations made available by the eligible agency for career and technical education programs and programs of study under section 131(a)-(e) of the Act and describe how these allocations are distributed to local educational agencies, areas career and technical education schools and educational service agencies within the State. (Section 131(g) of Perkins V)

Texas allocates Perkins Basic Grant funds between secondary and postsecondary programs under a funding split that is based on contact hours. On November 16, 2007, the SBOE approved the Texas State Plan for Career and Technical Education, 2008-2013 with a funding split of 70% for secondary programs and 30% for postsecondary programs. Texas uses Title I, Part B funds as follows: at least 85% will be distributed by formula allocation to LEAs and community and technical colleges through the standard application system (SAS); 10% will fund state programs and state leadership projects, and no more than 5% will fund administration

of the state plan. The estimated formula amount for secondary and postsecondary for 2020-2021 will be \$96,576,587.75 with the Perkins Reserve amount of 15% at \$14,486,488.16.

THECB funds to eligible postsecondary subrecipients are determined via an allocation process that calculates each subrecipient's Pell-eligible, full-time student equivalents (FTSE) as a percentage of the state's total number.

4. For the upcoming program year, provide the specific dollar allocations made available by the eligible agency for career and technical education programs and programs of study under section 132(a) of the Act and describe how these allocations are distributed to eligible institutions and consortia of eligible institutions within the State.

Local Education Agencies and public, two-year community, state, and technical colleges will be eligible for federal Perkins funds upon completion of the Comprehensive Local Needs Assessment and the Perkins Local Application. LEAs that are eligible for the Perkins allocation in 2020-2021 will receive an estimated amount of \$57,463,069.71. Postsecondary institutions will receive an estimated amount of \$24,627,029.88

Additionally, 1.5% of Perkins funds are set aside for eligible institutions as follows:

Eligible Institution	2018-2019	2019-2020	2020-2021
Texas Juvenile Justice System	\$184,120.00	\$319,070.12	\$319,070.12
Texas School for the Deaf	\$31,104.00	\$39,706.80	\$39,706.80
Texas School for the Visually Impaired	\$0	\$15,000.00	15,000.00
Windham LEA	\$837,388.00	\$1,300,258.04	1,300,258.04
Boys Ranch ISD	\$15,500.00	\$15,500.00	\$15,500.00

The state institutions use Perkins funds to provide CTE programming to assist students in building careers through quality instruction, preparation for industry-based certifications, and development of career connections. For example, the Windham School District tailors CTE programs to provide relevant and marketable employability skills to its students, taking into consideration the impact a previous felony conviction has on the ability of residents to secure certifications, licensure, and employment.

5. Describe how the eligible agency will adjust the data used to make the allocations to reflect any changes in LEA boundaries that may have occurred since the population and/or enrollment data was collected, and include local education agencies without geographical boundaries, such as charter schools and secondary schools funded by the Bureau of Indian Education. (Section 131(a)(3) of Perkins V)

Each year, Texas adjusts district allocations to reflect the changes that occurred in district enrollment due to charter schools opening or closing in the district's geographical boundaries.

6. If the eligible agency will submit an application for a waiver to the secondary allocation formula described in section 131(a)—

- a. include a proposal for such an alternative formula; and**
- b. describe how the waiver demonstrates that a proposed alternative formula more effectively targets funds based on poverty (as defined by the Office of Management and Budget and revised annually in accordance with section 673(2) of the Community Services Block Grant Act (42 U.S.C. 9902(2)) to local educational agencies with the State. (Section 131(b) of Perkins V)**

Also indicate if this is a waiver request for which you received approval under the prior Carl D. Perkins Career and Technical Education Act of 2006 (Perkins IV).

No alternative formula is proposed for secondary or postsecondary allocations at the time of the plan submission.

7. If the eligible agency will submit an application for a waiver to the postsecondary allocation

formula described in section 132(a)—

- a. include a proposal for such an alternative formula; and**
- b. describe how the formula does not result in a distribution of funds to the eligible institutions or consortia with the State that have the highest numbers of economically disadvantaged individuals and that an alternative formula will result in such a distribution. (Section 132(b) of Perkins V)**

Also indicate if this is a waiver request for which you received approval under the prior Carl D. Perkins Career and Technical Education Act of 2006 (Perkins IV).

No alternative formula is proposed for secondary or postsecondary allocations at the time of the plan submission.

8. If the eligible agency will award reserve funds to eligible recipients under section 112(c) of Perkins V, describe the process and criteria for awarding those funds.

The Texas Education Agency will distribute reserve grant funds to eligible LEAs through an application process. Awarded funds must be used as described in the Carl D. Perkins Career and Technical Education Act of 2006, Public Law (P.L.) 109-270, Title I, Part C, Section 135 (local uses of funds). Eligible recipients must meet at least one of the criteria below:

- Local career and technical education (CTE) programs in rural areas.
- CTE programs with high numbers of CTE concentrators or participants. An LEA with 200 or more CTE concentrators in Grades 9–12 is considered an LEA with high numbers of CTE students.
- CTE programs with high percentages of CTE concentrators or participants. An LEA with 25 percent or more of the total student population in Grades 9–12 who are CTE concentrators is considered a high percentage LEA.
- CTE programs in areas with disparities or gaps in performance as described in the Strengthening Career and Technical Education Act of 2018, Section 113 (b)(3)(C)(ii)(II).

Texas faces a significant challenge in helping students become career and college ready in ways that address both current and future workforce needs. Preparing students to enter community colleges and universities and supporting them through the completion of certificates and degrees will help support social and economic mobility for all Texans. Partnerships with institutions of higher education can be used to provide opportunities for students to acquire dual credit, industry-based certifications, and degrees in high-wage and in-demand occupations in regional industry sectors. In addition to partnerships with technical colleges, community colleges and/or universities, LEAs should also work with industry and local stakeholders to assess local workforce needs and coordinate with these partners to promote postsecondary success. LEAs can make a greater effort to establish public/private partnerships, and increase the opportunities for paid internships, apprenticeships, and mentorships, especially focusing on jobs in information technology, manufacturing, health care, construction, transportation distribution and logistics, and other high-wage and in-demand fields (from Prosperity Requires Being Bold: Integrating Education and the Workforce for a Bright Texas Future: The Tri-Agency Report to the Office of the Governor from the Texas Education Agency, Texas Higher Education Coordinating Board, and the Texas Workforce Commission).

The grants will be awarded in two focus areas:

Focus Area 1 - Texas Regional Pathways Network

The purpose of Texas Regional Pathways Network (Focus Area 1) is to assist regions with providing high quality college and career pathways that are aligned with regional workforce needs. This grant is designed to support regional teams in planning and implementing high-quality college and career pathways aligned to regional workforce needs. Successful applicants will join the Texas Regional Pathways Network, which provides support to regions across the state that are developing college and career pathways. Regions in the Texas Regional Pathways Network commit to developing pathways that include the seven key components of high-quality college and career pathways.

1. Alignment with high wage, in-demand labor market information (greater than \$35, 339 annual salary and greater than 17% growth for the state)

2. Links between secondary and postsecondary education with multiple entry and exit points
3. Credentials and degrees with value in the labor market
4. Integration of rigorous academic and career-focused learning
5. Strong college and career advising and counseling supports
6. Continuum of work-based learning experiences
7. Cross-sector partnerships

Applicants must include a regional team consisting of the following individuals to be qualified for the grant:

- An intermediary which will convene the above stakeholders as well as community and regional stakeholders who are crucial to implementing the key component of the Texas Regional Pathways Network
- A minimum of three LEAs in the region;
- A minimum of one public institution of higher education;
- A minimum of two employers in areas aligned to regional labor market data;

The pathways should help accelerate completion of training in high wage, in-demand fields and make postsecondary credentials more accessible and affordable by aligning secondary programs of study to postsecondary programs and developing transfer agreements with institutions of higher education in the region. A list of postsecondary programs of study can be found [here](#). LEAs should ensure the courses count toward certificate or degree programs. (demonstrating multiple entrance and exit points into postsecondary and the workforce). Grant funds may be used to support regionally aligned college and career pathways by collaborating between intermediaries, LEAs, institutions of higher education, industry partners or other non-profits to conduct activities to:

- dedicate personnel intermediary support aligned to regional cross-sector partnerships and operational priorities
- dedicate personnel to support development of inter-district career and technical, advanced academic, advising, financial, and transportation partnerships
- select approved technical assistance partners to support implementation of fidelity of implementation rubric
- ensure high quality CTE programs of study reflect regional labor market information
- provide agreements and/or inclusion of advanced academics within the pathway such as dual credit, AP, IB, etc.
- purchase equipment for CTE programs of study which have been aligned to regional labor market information
- conduct industry-led regional labor market analyses and reverse curriculum mapping
- dedicate personnel to expand employer partnerships tied to work-based learning and career exploration
- provide or expand parent and student facing resources to increase student awareness of in-demand industries

Applicants must include an analysis of regional labor market information (aligned with the Texas Workforce Commission's Workforce Development Board Areas) and provide plans for how they are ensuring alignment between labor market information and secondary CTE program of study offerings.

TEA staff will monitor all grant goals, objectives, and activities and review all grant outcomes. TEA staff will conduct regular program update meetings with grantees, for review and planning associated with grant

activities. Grantees will be required to submit interim reports, developed by TEA, detailing the progress of the project. Grantees will also be required to attend 1-2 in-person conferences aimed at providing robust technical assistance, peer resource sharing and networking, and regional team planning time. Grantees permitted to use grant funds to assist in the travel costs associated with these events.

Focus Area 2 - Texas Regional Pathways Network Implementation Grant

The purpose of focus area 2 is to expand participating LEAs partnering to provide CTE program of study that spans secondary and postsecondary education and includes an appropriate sequence of courses that are aligned with high wage and in-demand occupations identified by the local regional workforce board. The applicant must expand CTE programs of study that spans secondary and postsecondary education and includes an appropriate sequence of courses that are aligned with high wage and in-demand occupations identified by the local regional workforce board.

- 9. Provide the State’s fiscal effort per student, or aggregate expenditures for the State, that will establish the baseline for the Secretary’s annual determination on whether the State has maintained its fiscal effort and indicate whether the baseline is a continuing level or new level. If the baseline is new, please provide the fiscal effort per student, or aggregate expenditures for the State, for the preceding fiscal year. (Section 211(b)(1)(D) of Perkins V)**

The state-level maintenance of effort (MOE) for Perkins federal funding is listed below. Data sources used are the TEA Statewide Summary of Finance Report (FSP), and aggregate expenditure data and student counts provided by the Texas Higher Education Coordinating Board (THECB). The calculation is made annually in mid-February when THECB makes their data available to TEA. See chart below for prior year data:

Perkins MOE Determination Calculation*	Aggregate	Per Capita
FY 2015	\$2,481,897,225	\$1,598
FY 2016	\$2,674,508,268	\$1,658
FY 2017	\$2,802,287,986	\$1,688
FY 2018	\$2,932,779,038	\$1,718
FY 2019	\$3,084,815,322	\$1,781

* Funds made available based on TEA and THECB data. Note: Calculation conducted in the subsequent year, e.g. FY 2018 determination calculated in February 2019.

Texas utilized the MOE reset of 5% for the 2019-2020 fiscal year.

D. ACCOUNTABILITY FOR RESULTS

1. Identify and include at least one (1) of the following indicators of career and technical education program quality—
 - a. the percentage of CTE concentrators (see Text Box 6 for the statutory definition of a CTE concentrator under section 3(12) of Perkins V) graduating from high school having attained a recognized postsecondary credential;
 - b. the percentage of CTE concentrators graduating high school having attained postsecondary credits in relevant career and technical education programs and programs of study earned through a dual or concurrent enrollment program or another credit transfer agreement; and/or
 - c. the percentage of CTE concentrators graduating from high school having participated in work-based learning. (Section 113(b)(2)(A)(iv)(I) of Perkins V)

Texas chose indicator A above which calculates the percentage of CTE concentrators graduating from high school having attained a recognized postsecondary credential. The decision to use this indicator was based on results from public comments and survey results in which 66% of respondents favored this indicator.

A recognized postsecondary credential can be an industry-based certification from the industry-based certification list for public school accountability, Level 1 and Level 2 certificates, along with an associate’s or

baccalaureate degree earned through institutions of higher education.

The 4S1 indicator will be measure by taking Annual graduates who were concentrators and obtained an industry-based certification, Level 1 or Level 2 certificates, an Associate Degree, or a Baccalaureate Degree (P-TECHs) divided by Annual graduates who were concentrators (using annual graduate definition).

Include any other measure(s) of student success in career and technical education that are statewide, valid, and reliable, and comparable across the State. (Section 113(b)(2)(A)(iv)(II) of Perkins V) Please note that inclusion of “other program quality measure(s) is optional for States.

An additional measure that Texas will include for secondary data is the percentage of CTE students who meet the definition of a program of study completer. The Texas definition for a CTE completer is a student who completes three or more CTE courses for four or more credits, including one state-determined level 3 or 4 advanced level CTE course. The calculation for the completer measure is the number of completers in a program of study/ number of CTE concentrators in that program of study’s career cluster x 100.

For example, if there were 100 completers in the Entrepreneurship program of study and 500 concentrators in the Business, Marketing, and Finance career cluster, the percentage of completers for the program of study in would be 20%.

Number of Completers by Program of Study

Number of CTE Concentrators in a Career Cluster

100 Completers of Entrepreneurship Program of Study

500 Concentrators in the Business, Marketing, and Finance Cluster

Provide the eligible agency’s measurement definition with a numerator and denominator for each of the quality indicator(s) the eligible agency selects to use.

5S1 Program Quality- Attained Recognized Postsecondary Credential

5S4 Program Quality- CTE Completer: Number of completers by program of study/Number of CTE concentrators in a career cluster x 100. For example, if there were 100 completers in the Entrepreneurship program of study and 500 concentrators in the Business, Marketing, and Finance career cluster, the calculation of completer for the program of study in this instance would be 20%.

A list of definitions for each quality indicator is available in Section V of this plan.

- 2. Provide on the form in Section V.B, for each year covered by the State plan beginning in FY 2020, State determined performance levels or each of the secondary and postsecondary core indicators, with the levels of performance being the same for all CTE concentrators in the State. (Section 113(b)(3)(A)(i)(I) of Perkins V)**

Updated Perkins V definitions for CTE Concentrators and CTE Completers have been applied to previous collections of CTE student course completion records to establish a baseline level of data.

- 3. Describe the procedure the eligible agency adopted for determining State determined levels of performance described in section 113 of Perkins V, which at a minimum shall include—**
 - a. description of the process for public comment under section 113(b)(3)(B) of Perkins V as part of the development of the State determined levels of performance (see Text Box 7 for the statutory requirements for consultation on State determined performance levels under section 113(b)(3)(B) of Perkins V);**

CTE Stakeholders in Texas had many opportunities to provide feedback through public comment on the development of State determined levels of performance, both in person at Perkins V input meetings held around the state (Listening Tour) and through electronic surveys and emails. The TEA and the THECB solicited

wide ranging input on this topic and many others related to implementing the provisions of Perkins V. Development of State determined levels of performance came from the results of the input described above. Also, as part of the state plan approval process, the agency is providing public comment opportunities to gather further input and feedback. The public comment process is an opportunity for any interested person to submit data or views on a proposed rule. The opportunity for public comment is required by state law,

Texas Government Code, §2001.029. The public comment period on a rule begins when the rule is published as proposed in the Texas Register. For State Board of Education (SBOE) rules, such as the Perkins V state plan, the comment period is at least 31 days and lasts through the next regular SBOE meeting where the SBOE will take second reading action and the public can also provide testimony. All proposed rules of the SBOE are posted on the TEA website after filed as proposed with the Texas Register. The TEA compiles the public comments received during a proposed rule's public comment period and provides those summaries of and responses to the public comments to the appropriate rulemaking body—in this case, the SBOE—for consideration. Texas Government Code, §2001.033, requires the summary of a comment to include the name of the group or association that commented and whether it was for or against the adoption of the rule. Comments from individuals will also be included in the summary of public comments, but individuals will not be named. Texas Government Code, §2001.033 also requires that if the rulemaking body disagrees with the comment, the response to the comment must include the reasons why the rulemaking body disagreed. If the rulemaking body agrees with the comment, it could result in a change to the proposed rule. The summaries of and responses to public comments are included with the adopted rule published in the Texas Register. Working on the baseline data and the planning for data auto-coding that will be used to determine state-determined performance levels has been a team of TEA staff members, including employees from Performance Reporting, College and Career and Military Preparation, CTE, Research and Analysis, and IT. The entire team has worked diligently to make sure that these measures align with the goals and outcomes found in ESSA.

See section D.1.c. for Performance Indicator 5S1 description

See THECB Appendix 2: Postsecondary Statewide Stakeholder Consultation Outcomes

- b. an explanation for the State determined levels of performance that meet each of the statutory requirements in Text Box 8; and**
- c. a description of how the State determined levels of performance set by the eligible agency align with the levels, goals and objectives other Federal and State laws, (Section 122(d)(10) of Perkins V).**

As part of the procedures for determining State determined levels of performance, describe the process that will be used to establish a baseline for those levels.

The TEA has developed an auto-coding process that will calculate student participation in CTE programs as participants, explorers, concentrators, or completers, based on course completion. The procedure for determining a baseline for the State determined levels of student performance began with a careful review of the most recent data available on the performance measures found in Perkins V requirements going back to the sixth grade year. In future years, growth in student achievement will be set measuring progress against the baseline data. When conducting the baseline data for core indicators of performance, TEA worked with their Information Technology team, the ESSA accountability team (performance reporting), and the data research and analysis team to ensure alignment between state ESSA requirements and the college, career, and military readiness measures within ESSA.

Updated Perkins V definitions for CTE concentrators and CTE completers have been applied to previous collections of CTE student course completion records to establish a baseline level of data. A CTE concentrator is a student who completes at least two courses for two credits within a program of study. A CTE completer is a student who completes three or more CTE courses for four or more credits, including one state-determined level 3 or 4 (advanced or upper level) CTE course within a program of study. The calculation for the completer measure is the number of completers in a program of study/number of CTE concentrators in that program of study's career cluster x 100.

THECB staff conducted a multi-year analysis of certified postsecondary performance data using model Perkins V core indicator criteria. This analysis guided the development of state-determined performance levels for the Perkins V postsecondary core indicators of performance.

A CTE completer at the postsecondary level is a CTE concentrator who earned a recognized postsecondary credential or exited a community or technical college district and is not found at that community or technical college district in the following fall.

4. Provide a written response to the comments regarding State determined performance levels received during the public comment period pursuant to section 113(b)(3)(B) of Perkins V. (Section 113(b)(3)(B)(iii) of Perkins V).

No responses received regarding the State determined performance levels.

As part of the written response, include a description of any the changes made to the State determined performance levels as a result of stakeholder feedback.

No changes were made to the State determined performance levels as a result of public comment.

5. Describe how the eligible agency will address disparities or gaps in performance as described in section 113(b)(3)(C)(ii)(II) of Perkins V in each of the plan years, and if no meaningful progress has been achieved prior to the third program year, a description of the additional actions the eligible agency will take to eliminate these disparities or gaps. (Section 122(d)(11) of Perkins V).

The TEA will address disparities or gaps in performance in each of the plan years by first reviewing student performance data across the state and district by district. The TEA evaluates and monitors the academic achievement of secondary CTE student concentrators through the state Results Driven Accountability (RDA) system. LEAs are required to analyze performance data, research effective integration strategies, and develop a plan to improve CTE students' academic performance. Improvement plans must include strategies to increase CTE students' academic performance. Examples of effective program improvement strategies include reinforcing rigorous English Language Arts, Mathematics, and Science instruction in CTE curricula; increasing instructional planning time for academic and CTE teachers; and Sheltered Instruction training for academic and CTE teachers to better serve students who are English Learners.

In addition, the TEA will gather additional information about the depth and quality of its CTE programs through the results that come from the CTE Statewide Evaluation project currently underway. The evaluation will provide an analysis of current CTE programs offered around the state focused on student outcomes. The evaluation will include coordinated data files of CTE programs in all Texas LEAs and data analysis of those files. CTE programs will be analyzed by LEA and the findings should explain:

- a. alignment of CTE programs with regional and local workforce needs (e.g., in-demand job opportunities),
- b. outcomes of CTE programs (e.g., course completion, postsecondary enrollment, industry-based credentials earned),
- c. CTE-student preparation for postsecondary opportunities (e.g., college readiness, dual credit completion).

THECB will require postsecondary institutions to address disparities or gaps in performance identified in the Comprehensive Local Needs Assessment (CLNA). The state's 54 community, state, and technical colleges will be required to report findings to THECB in a CLNA report, summarize those findings in the Local Application, and address findings through the targeted use of Perkins formula funds as a condition of receiving Perkins formula funding. Institutions may use Perkins funds to provide mentoring, success coaching elder/childcare services, textbooks, transportation, tutoring, career coaching, access to assistive technology, and other services to reduce performance gaps.

THECB will analyze disaggregated core indicator performance data at the state and institutional level, and will both incentivize institutions and provide technical support to reduce performance gaps. Examples of incentives include statewide recognition of high-performing institutions and merit-based distribution of reallocation funds for successful reduction of performance gaps. Technical assistance to institutions may include statewide training in evidence-based approaches to improving equitable access and individualized assistance to institutions on request or as needs are identified by THECB.

THECB requires biannual progress reports from its 54 community, state, and technical colleges receiving Perkins formula funds. Reports must show progress on each activity in the approved Local Application or address impediments to progress and show how the local institution has responded. Beginning with the FY 2021 Local Application, institutions must commit Perkins formula funds to reducing special populations

performance gaps identified in the (CLNA). Biannual reporting will document programmatic activity toward reducing special populations performance gaps.

THECB will respond to statewide stakeholder input about access and equity with the creation of a discrete award category in its State Leadership program to address disparities or gaps in student performance. THECB awards State Leadership grants to postsecondary institutions through a competitive RFA process to provide general support for reducing performance gaps, including development of innovative curricula, statewide professional development, identification of effective teaching strategies, and scaling of approaches that mitigate barriers to success. The creation of a discrete category targeted on special populations' success will support the development of researched, scalable approaches to improving access and equity to reducing these students' performance gaps.

As part of the written response, and pursuant to the Report of the Senate Committee on Health, Education, Labor, and Pensions (HELP),⁸ the eligible agency could indicate that it will analyze data on the core indicators of performance to identify gaps in performance, explain how they will use evidence-based research to develop a plan to provide support and technical assistance to eligible recipients to address and close such gaps, and how they will implement this plan. The eligible agency is not required to submit a new State plan prior to the third program year in order to address this requirement.

Support and technical assistance to local districts will come in part as a result of the Comprehensive Local Needs Assessment process. LEAs will be required to evaluate their learners' performance on federal accountability measures, through the review of aggregate and disaggregated student data by race, gender, migrant status, and special populations groups, which are found in Perkins V Section 3(48).

TEA evaluates and monitors the academic achievement of secondary CTE student concentrators through the state RDA accountability system. LEAs are required to analyze performance data, research effective integration strategies, and develop a plan to improve CTE students' academic performance. Improvement plans must include strategies to increase CTE students' academic performance. Examples of effective program improvement strategies include reinforcing rigorous English Language Arts, Mathematics, and Science instruction in CTE curricula; increasing instructional planning time for academic and CTE teachers; and as it pertains to second language acquisition, Sheltered Instruction training for academic and CTE teachers to better serve students who are English Learners.

III. ASSURANCES, CERTIFICATIONS AND OTHER FORMS

A. STATUTORY ASSURANCES

- The eligible agency assures that:
 1. It made the State plan publicly available for public comment⁹ for a period of not less than 30 days, by electronic means and in an easily accessible format, prior to submission to the Secretary for approval and such public comments were taken into account in the development of this State plan. (Section 122(a)(4) of Perkins V)
 2. It will use the funds to promote preparation for high-skill, high-wage, or in-demand industry sectors or occupations and non-traditional fields, as identified by the State. (Section 122(d)(13)(C) of Perkins V)
 3. It will provide local educational agencies, area career and technical education schools, and eligible institutions in the State with technical assistance, including technical assistance on how to close gaps in student participation and performance in career and technical education programs. (Section 122(d)(13)(E) of Perkins V)
 4. It will comply with the requirements of this Act and the provisions of the State plan, including the provision of a financial audit of funds received under this Act, which may be included as part of an audit of other Federal or State programs. (Section 122(d)(13)(A) of Perkins V)
 5. None of the funds expended under this Act will be used to acquire equipment (including computer software) in any instance in which such acquisition results in a direct financial benefit to any organization representing the interests of the acquiring entity or the employees of the acquiring entity, or any affiliate of such an organization. (Section 122(d)(13)(B) of Perkins V)
 6. It will use the funds provided under this Act to implement career and technical education programs and programs of study for individuals in State correctional institutions, including juvenile justice facilities. (Section 122 (d)(13)(D) of Perkins V.

B. EDGAR CERTIFICATIONS

- By submitting a Perkins V State Plan, consistent with 34 CFR 76.104, the eligible agency certifies that:
 1. It is eligible to submit the Perkins State plan.
 2. It has authority under State law to perform the functions of the State under the Perkins program(s).
 3. It legally may carry out each provision of the plan.
 4. All provisions of the plan are consistent with State law.
 5. A State officer, specified by title in Item C on the Cover Page, has authority under State law to receive, hold, and disburse Federal funds made available under the plan.
 6. The State officer who submits the plan, specified by title in Item C on the Cover Page, has authority to submit the plan.
 7. The entity has adopted or otherwise formally approved the plan.
 8. The plan is the basis for State operation and administration of the Perkins program.

C. OTHER FORMS

- The eligible agency certifies and assures compliance with the following enclosed forms:
 1. Assurances for Non-Construction Programs (SF 424B) Form (OMB Control No. 0348-0040) - <https://www2.ed.gov/fund/grant/apply/appforms/sf424b.pdf>
 2. Disclosure of Lobbying Activities (SF LLL) (OMB Control No. 4040-0013): https://apply07.grants.gov/apply/forms/sample/SFLLL_1_2-V1.2.pdf
 3. Certification Regarding Lobbying (ED 80-0013 Form): <https://www2.ed.gov/fund/grant/apply/appforms/ed80-013.pdf>
 4. General Education Provisions Act (GEPA) 427 Form (OMB Control No. 1894-0005): <https://www2.ed.gov/fund/grant/apply/appforms/gepa427.pdf>

IV. BUDGET

A. BUDGET FORM

State Name: Texas

Fiscal Year (FY): 2020-2021

Line Number	Budget Item	Percent of Funds	Amount of Funds
1	Total Perkins V Allocation	Not applicable	\$113,619,515
2	State Administration	%	\$5,680,975
3	State Leadership	%	\$11,361,951
4	• Individuals in State Institutions	%	\$1,704,292
4a	- Correctional Institutions	Not required	\$1,300,258
4b	- Juvenile Justice Facilities	Not required	\$319,070
4c	- Institutions that Serve Individuals with Disabilities	Not required	\$54,706
5	• Non-traditional Training and Employment	Not required	\$60,000
6	• Special Populations Recruitment	%	\$13,619
7	Local Formula Distribution	%	\$96,576,587
8	• Reserve	%	\$14,486,488
9	- Secondary Recipients	%	\$10,140,541
10	- Postsecondary Recipients	%	\$4,345,946
11	• Allocation to Eligible Recipients	%	\$82,090,099
12	- Secondary Recipients	%	\$57,463,069
13	- Postsecondary Recipients	%	\$24,627,029
14	State Match (<i>from non-federal funds</i>)	Not applicable	\$

V. STATE DETERMINED PERFORMANCE LEVELS

Core Indicators of Performance

Indicator Descriptions	Indicator Codes	Indicator Names	Numerator and Denomination
Secondary Level			
The percentage of CTE concentrators who graduate high school, as measured by the four-year adjusted cohort graduation rate (defined in section 8101 of the Elementary and Secondary Education Act of 1965)	1S1	Four-Year Graduation Rate	Concentrators who started high school 4 years prior to expected 4-year graduating year and graduated high school in four years/Cohort of concentrators who dropped out, graduated, or left; started high school 4 years prior to expected 4-year graduating year
The percentage of CTE concentrators who graduate high school, as measured by extended-year adjusted cohort graduation rate defined in such section 8101.	1S2	Extended Graduation Rate	Concentrators who started high school 4 or 5 years prior to expected 5-year graduating year and graduated high school within five years/ Cohort of concentrators who dropped out, graduated, or left; started high school either 4 or 5 years prior to expected 5-year graduating year
CTE concentrator proficiency in the challenging State academic standards adopted by the State under section 1111(b)(1) of the Elementary and Secondary Education Act of 1965, as measured by the academic assessments in reading/language arts as described in section 1111(b)(2) of such Act.	2S1	Academic Proficiency in Reading/ Language Arts	Annual graduates, dropouts, and other leavers who are concentrators and whose best score met or exceeded grade on English II/ Annual graduates, dropouts, GEDs and other leavers who are concentrators and who took (have a scored answer document) both English I and English II
CTE concentrator proficiency in the challenging State academic standards adopted by the State under section 1111(b)(1) of the Elementary and Secondary Education Act of 1965, as measured by the academic assessments in reading/language arts as described in section 1111(b)(2) of such Act.	2S2	Academic Proficiency in Mathematics	Annual graduates, dropouts, and other leavers who are concentrators and whose best score met or exceeded grade level on Algebra I/ Annual graduates, dropouts, GEDs, and other leavers who are concentrators and who took (have a scored answer document) Algebra I
CTE concentrator proficiency in the challenging State academic standards adopted by the State under section 1111(b)(1) of the Elementary and Secondary Education Act of 1965, as measured by the academic assessments in science as described in section 1111(b)(2) of such Act.	2S3	Academic Proficiency in Science	Annual graduates, dropouts, GEDs and other leavers who are concentrators and whose best score met or exceeded grade level on Biology/ Annual graduates, dropouts, GEDs and other leavers who are concentrators and who took (have a scored answer document) Biology

Indicator Descriptions	Indicator Codes	Indicator Names	Numerator and Denomination
Secondary Level			
The percentage of CTE concentrators who, in the second quarter after exiting from secondary education, are in postsecondary education or advanced training, military service or a service program that receives assistance under title I of the National and Community Service Act of 1990 (42 U.S.C. 12511 et seq.), are volunteers as described in section 5(a) of the Peace Corps Act (22 U.S.C. 2504(a)), or are employed.	3S1	Post-Program Placement	Annual concentrators who left secondary education and either: intended to enlist in the military, are employed or, are enrolled in postsecondary education/ Annual concentrators who left secondary education (see definition)
The percentage of CTE concentrators in career and technical education programs and programs of study that lead to non-traditional fields. ¹⁰	4S1	Non-traditional Program Concentration	Annual concentrators who left secondary education and took and passed in a non-traditional course following the business rules/ Annual concentrators who left secondary education
<i>The eligible agency must include at least one program quality indicator—5S1, 5S2, or 5S3—and may include any other quality measure(s) that are statewide, valid, reliable, and comparable across the State.</i>			
The percentage of CTE concentrators graduating from high school having attained a recognized postsecondary credential.	5S1	Program Quality – Attained, Recognized Postsecondary Credential	Annual graduates who were concentrators and obtained an industry-based certification, Level 1 or Level 2 certificates, an Associate Degree, or a Baccalaureate Degree (P-TECHs)/ Annual graduates who were concentrators (using annual graduate definition)
The percentage of graduates who were able to reach completer status for an approved state or regional Program of Study..	5S4	Program Quality – CTE Completers	Annual graduates who were completers at time of exit/ Annual graduates who were concentrators at time of exit
Postsecondary Level			
The percentage of CTE concentrators who, during the second quarter after program completion, remain enrolled in postsecondary education, are in advanced training, military service, or a service program that receives assistance under title I of the National and Community Service Act of 1990 (42 U.S. C. 12511 et seq.), are volunteers as described in section 5(a) of the Peace Corps Act (22 U.S.C. 2504(a)), or are placed or retained in employment.	1P1	Post-Program Placement	Numerator: Number of CTE Concentrators who, in the 2nd quarter after completion (4th quarter/ Fall), are found: 1) enrolled in a higher education institution in TX; 2)employed in TX; 3) in advanced training; 4) in the military; or 5) in a service program. Denominator: Number of CTE Concentrators who earn a credential or exit an institution/district (are not found in that institution/district in the Fall of the next year)

Indicator Descriptions	Indicator Codes	Indicator Names	Numerator and Denomination
Secondary Level			
<p>The percentage of CTE concentrators who receive a recognized postsecondary credential during participation in or within 1 year of program completion.</p>	2P1	<p>Earned Recognized Postsecondary Credential</p>	<p>Numerator: Number of CTE Concentrators who, within the fiscal year or one year after:</p> <ol style="list-style-type: none"> 1) earn a certificate or degree; 2) earn certificate of completion of apprenticeship; 3) pass a state-recognized licensure exam; or 4) pass an industry-recognized certification exam. <p>Denominator: Number of CTE Concentrators who earn a credential or exit an institution/district (are not found in that institution /district in the Fall of the next year)</p>
<p>The percentage of CTE concentrators in career and technical education programs and programs of study that lead to non-traditional fields.</p>	3P1	<p>Non-traditional Program Concentration</p>	<p>Numerator: Number of CTE Concentrators from underrepresented gender groups who are enrolled in a CTE program that leads to non-traditional field.</p> <p>Denominator: Number of CTE concentrators enrolled in a program that leads to employment in nontraditional fields during the reporting year.</p>

A. STATE DETERMINED PERFORMANCE LEVELS (SDPL) FORM

State Name: Texas

Column 1	Column 2	Column 3	Column 4		Column 5	Column 6
Indicators	Baseline Level	FY 2020	Performance Levels		FY 2022	FY 2023
Secondary Indicators						
1S1: Four-Year Graduation Rate	97.02%	97.02%	97.02%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
1S2: Extended Graduation Rate	processing	2019 baseline	2019 baseline		≥ one standard deviation above baseline	≥ one standard deviation above baseline
2S1: Academic Proficiency in Reading Language Arts	58.13%	58.13%	58.13%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
2S2: Academic Proficiency in Mathematics	47.27%	47.27%	47.27%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
2S3: Academic Proficiency in Science	59.62%	59.62%	59.62%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
3S1: Post-Program Placement	71.21%	71.21%	71.21%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
4S1: Non-traditional Program Concentration	49.68%	49.68%	49.68%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
5S1: Program Quality – Attained Recognized Postsecondary Credential	8.16%	8.16%	8.16%		≥ one standard deviation above baseline	≥ one standard deviation above baseline
5S2: Program Quality – Attained Postsecondary Credits	N/A	N/A	N/A		≥ one standard deviation above baseline	≥ one standard deviation above baseline
5S3: Program Quality – Participated in Work- Based Learning	N/A	N/A	N/A		≥ one standard deviation above baseline	≥ one standard deviation above baseline
5S4: Program Quality – CTE Completers	31.91%	31.91%	31.91%		≥ one standard deviation above baseline	≥ one standard deviation above baseline

Column 1	Column 2	Column 3	Column 4	Column 5	Column 6
Indicators	Baseline Level	Performance Levels			
		FY 2020	FY 2021	FY 2022	FY 2023
Postsecondary Indicators					
1P1: Post-Program Placement	82.8%	83.0%	83.2%	83.4%	83.6%
2P1: Earned Recognized Postsecondary Credential	50.6%	50.8%	51.0%	51.2%	51.4%
3P1: Non-traditional Program Concentration	16.7%	17.0%	17.1%	17.2%	17.3%

Provide any additional information regarding SDPLs, as necessary:

Based on Perkins V definition changes, TEA conducted a top to bottom review of definitions, sought feedback on core indicators of performance through the statewide listening tour and determined definitions for each core indicator of performance. In section D) 1) a) we discuss the decision on the program quality metrics and why we chose to add an additional measure of 5S4. Since Perkins V significantly changed the definition of a CTE concentrator and because TEA conducted a top to bottom restructure of CTE programs of study which go into effect in the 2020-2021 school year, TEA is proposing two years of baseline data to determine new thresholds for performance growth. Hence, the chart for state determined performance levels reflects two years of baseline data with growth of at least one standard deviation above the baseline starting in year 2021-2022. TEA believes that the auto-coding process now provides a robust data set from which to work; however, this is a shift for districts in how they are sequencing courses as well as the impact that these course sequences and the change in the definition of a CTE concentrator. The two year hold on baseline data allows districts to focus on fidelity of implementation and start students on new course sequences.

APPENDIX

TEA APPENDIX 1: Perkins V Stakeholder Engagement Meetings

Perkins V Regional Stakeholder Engagement

Education Service Centers/Regions	Audience/Host Institution	Date
ESC 1 - Edinburg	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	February 27-28, 2019
ESC 2 - Corpus Christi	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	April 16-17, 2019
ESC 3 - Victoria	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	Did not visit during listening tour. Stakeholders participated in Zoom meetings facilitated by ESC 2.
ESC 4 - Houston	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	April 29-30, 2019
ESC 5 - Beaumont	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	February 5-6, 2019
ESC 6 - Huntsville	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	February 19-20, 2019
ESC 7 - Kilgore	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	Did not visit during listening tour. Stakeholders participated in meetings facilitated by ESC 8.
ESC 8 - Mount Pleasant	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	April 2-3, 2019
ESC 9 - Wichita Falls	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	Did not visit during listening tour.
ESC 10 - Richardson	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	March 5-6, 2019
ESC 11 - Fort Worth	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	March 7-8, 2019
ESC 12 - Waco	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	May 7-8, 2019
ESC 13 - Austin	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	April 25-26, 2019
ESC 14 - Abilene	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	January 22-23, 2019
ESC 15 - San Angelo	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	December 11-12, 2018
ESC 16 - Amarillo	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	March 28-29, 2019
ESC 17 - Lubbock	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	1 day session on December 12, 2019. Stakeholders were also invited to participate in meetings facilitated by ESC 16.
ESC 18 - Midland	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	March 26-27, 2019
ESC 19 - El Paso	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	January 17-18, 2019
ESC 20 - San Antonio	School District Educational Professionals, Education Service Center Staff, Higher Education Professionals and Parents	December 4-5, 2018
Southeast	Angelina College	August 22-23, 2019
Central	Austin Community College	September 9, 2019
High Plains/Northwest	Clarendon College	September 11, 2019
Metroplex	Tarrant County Community College	September 19-20, 2019
South	Del Mar College	September 26, 2019
West	Midland College	October 2-3, 2019
Gulf Coast	San Jacinto College District	October 1-15, 2019
Upper East	Tyler Junior College	October 17-18, 2019

Perkins V Stakeholder Engagement

Stakeholder	Stakeholder Type	Date
Texas Workforce Coalition	Business and Industry	November 18, 2019
Texas Association of Manufacturers	Business and Industry	November 18, 2019
Texas Business Association	Business and Industry	October 25, 2019
Metro 8 Chambers of Commerce	Business and Industry	October 31, 2019
Texas Association of Workforce Boards	Business and Industry	December 17, 2019
Texas Chemical Council	Business and Industry	November 18, 2019
Texas Oil and Gas Association	Business and Industry	November 18, 2019
National Federation of Independent Business	Business and Industry	November 18, 2019
Association of Electric Companies of Texas	Business and Industry	November 18, 2019
Associated Builders and Contractors of Texas	Business and Industry	November 18, 2019
Associated General Contractors-Texas Building Branch	Business and Industry	November 18, 2019
Texas Association of Builders	Business and Industry	November 18, 2019
Texas Construction Association	Business and Industry	November 18, 2019
Independent Electrical Contractors of Texas	Business and Industry	November 18, 2019
Texas Hospital Association	Business and Industry	November 18, 2019
Texas Medical Association	Business and Industry	November 18, 2019
Texas Restaurant Association	Business and Industry	November 18, 2019
Texas Motor Transportation Association	Business and Industry	November 18, 2019
Texas Pipeline Association	Business and Industry	November 18, 2019
Association of Chemical Industry of Texas	Business and Industry	November 18, 2019
Texas Food & Fuel Association	Business and Industry	November 18, 2019
Texas Independent Producers and Royalty Owners Association	Business and Industry	November 18, 2019
The Advanced Power Alliance	Business and Industry	November 18, 2019
Texas Association of Realtors	Business and Industry	November 18, 2019
Texas Bankers Association	Business and Industry	November 18, 2019
Mechanical Contractors Association of Texas	Business and Industry	November 18, 2019
National Electrical Contractors Association of North Texas	Business and Industry	November 18, 2019
National Electrical Contractors Association of Southeast Texas	Business and Industry	November 18, 2019
National Electrical Contractors Association of Red River Valley	Business and Industry	November 18, 2019
Plumbing-Heating-Cooling Contractors of Texas	Business and Industry	November 18, 2019
Texas Air Conditioning Contractors Association	Business and Industry	November 18, 2019
Texas Structural Steel Institute	Business and Industry	November 18, 2019
Texas Masonry Council	Business and Industry	November 18, 2019
Permian Basin Petroleum Association	Business and Industry	November 18, 2019
Texas Board of Nursing	Business and Industry	November 18, 2019
Federal Reserve Bank	Business and Industry	January 17, 2019
Apprenticeship and Training Advisory Council	Business and Industry	June 14, 2019
United Way	Community Partners	January 2020
Texas Coalition of Veterans Organizations	Community Partners	August 1, 2019
Military Child Education Coalition	Community Partners	August 1, 2019
Texas Homeless Network	Community Partners	August 1, 2019
Boys and Girls Clubs of Central Texas	Community Partners	August 1, 2019
Texas Alliance of Child and Family Services (Foster Youth)	Community Partners	August 1, 2019
Texas Parent to Parent (advocacy group for people with disabilities)	Community Partners	August 1, 2019
AHEAD in Texas (students with disabilities)	Community Partners	August 1, 2019
Texas Women's Foundation	Community Partners	August 1, 2019
National Association for Women in Construction (Fort Worth)	Community Partners	August 1, 2019
Children's Commission	Community Partners	August 1, 2019
Texas Rio Grande Legal Aid (Foster Youth)	Community Partners	August 1, 2019
Texas Regional Pathways Steering Committee	Education	February 2020
Presentation to CTE Administrators at CTAT	Education Conference	February 13, 2019
Presentation to CTE Administrators at CTAT	Education Conference	July 16, 2019
Education Service Center Region 4 Conference Presentation to CTE administrators, teachers, and counselors	Education Conference	November 7, 2019
Texas Public Policy Foundation	Legislative	October 3, 2019
Office of the Governor	Legislative	December 10, 2019
Office of the Lieutenant Governor	Legislative	December 10, 2019
Office of the Speaker of the House	Legislative	December 10, 2019
Legislative staff	Legislative	December 10, 2019
Texas Association of Community Colleges	Postsecondary Education	November 18, 2019
Texas State Technical College System	Postsecondary Education	November 5, 2019
Texas Association of College Technical Educators	Postsecondary Education	August 1, 2019
Texas Community College Teachers Association	Postsecondary Education	August 1, 2019
Texas College Counseling Association (Part of Texas Counseling Association)	Postsecondary Education	August 1, 2019
Texas Association of College and University Student Personnel Administrators	Postsecondary Education	August 1, 2019
National Association of Student Affairs Professionals Texas	Postsecondary Education	August 1, 2019
Texas Association of Student Financial Aid Administrators	Postsecondary Education	August 1, 2019
Texas Association of College Registrars and Admissions Officers	Postsecondary Education	August 1, 2019

Perkins V Stakeholder Engagement

Stakeholder	Stakeholder Type	Date
Texas Community College Instructional Administrators	Postsecondary Education	August 1, 2019
Texas Administrators of Continuing Education	Postsecondary Education	August 1, 2019
Community College Association of Texas Trustees	Postsecondary Education	August 1, 2019
Texas Association of Secondary School Principals	Secondary Education	November 21, 2019
Career and Technical Association of Texas	Secondary Education	December 17, 2019
Lone Star State School Counselor Association	Secondary Education	December 3, 2019
FFA	Secondary Education	November 4, 2019
Vocational Agriculture Teachers Association of Texas	Secondary Education	November 4, 2019
Texas Council of Administrators of Special Education	Secondary Education	October 24, 2019
CTE Leadership Committee	Secondary Education	October 25, 2019
Education Service Centers	Secondary Education	Monthly from November 2018
Students with Military Families	Secondary Education	November 14, 2018
State Board of Education	Secondary Education	January 28-31, 2020
Texas School Counselors Association	Secondary Education	December 12, 2019
SkillsUSA	Secondary Education	April 5, 2019
Family Career and Community Leaders of America	Secondary Education	May 31, 2019
Educators Rising	Secondary Education	June 10, 2019
Technology Student Association	Secondary Education	December 19, 2019
HOSA	Secondary Education	July 26, 2019
Future Business Leaders of America	Secondary Education	December 11, 2019
DECA	Secondary Education	December 11, 2019
Business Professionals of America	Secondary Education	December 11, 2019
Texas FFA Foundation	Secondary Education	November 4, 2019
Texas Association of School Administrators	Secondary Education	January 2020
Texas Association of School Boards	Secondary Education	January 2020
Mexican American School Board Association	Secondary Education	February 2020
Family and Consumer Sciences Teacher Association of Texas	Secondary Education	July 22, 2019
Career and Technical Association of Texas	Secondary Education	July 8, 2019
Hospitality Educators Association of Texas	Secondary Education	November 3, 2019
Texas Industrial Vocational Association	Secondary Education	January 15, 2019
Texas Hospitality Educators Association	Secondary Education	July 31, 2019
LSPCS	Secondary Education	June 19, 2019
Chief Academic Officer Council	Secondary Education	October 4, 2019
Presentation to CTE teachers at Vocational Agriculture Teachers Association of Texas Conference	Secondary Education	July 30, 2019
ELL Association TESOL	Secondary Education	TBD
Council for Rural Schools	Secondary Education	February 2020
Texas Workforce Commission	State Agency	Monthly from October 2018
Texas Higher Education Coordinating Board	State Agency	Monthly from October 2018
Texas Education Agency	State Agency	Monthly from October 2018
Texas Railroad Commission	State Agency	November 21, 2019
Texas Department of Criminal Justice and Windham	State Agency	June 14, 2019
Texas Health and Human Services Commission	State Agency	July 3, 2019
Texas Juvenile Justice Department	State Agency	June 14, 2019
Texas Department of Family and Protective Services	State Agency	February 2020
Vocational Rehabilitation Council	State Agency	February 2021
Texas Economic Development Council	State Agency	February 2022
Texas Veteran's Commission	State Agency	February 2023
Texas Workforce Investment Council	State Workforce Board	Monthly from October 2018
Charter School Summit	Secondary Education	June 7, 2019

CCMP Presentations 7/2018-Present

Date	Conference Name	Presenter	Topics Covered	Audience Makeup	Audience Number
5/17/18	ESC 4-Fiscal Compliance and Funding Conference	L.Torres	ESSA, Perkins Transition Plan	Compensatory Funds Administrators	20
6/15/18	ESC 1-CTE Summer Conference	L.Torres	Proposed Programs of Study	CTE Administrators	100
7/8-7/12/18	I3CTE 18 Innovate, Ignite, Inspire	D.Fowler A.Brantley	POS, IBC	AC Teachers	125
7/14-15/18	SkillsUSA BOD	A. Brantley	Participant Recruitment for POS IAC	A+C, Mfg., AAVTC Teachers, Industry Partners	20
7/16/18	Hospitality Educators Assoc. of Texas (HEAT) BOD	D.Wieland	POS, IBC, HT Enrollment	HT Teachers and Industry Partners	30
7/17/18	Texas Vocational Association (TIVA) Summer PD	L.Torres	Proposed POS; Energy and Industrial Based Certifications	TIVA ISD Membership	150
7/20/18	TIVA CIPPS	D.Wieland	POS, IBC	Cosmetology Teachers	160
7/24/18	TAFE BOD Webinar	D.Wieland	POS	ET Teachers, TAFE Student Officers, Postsecondary Partners	30
7/24-7/25/18	CTAT Summer PD	ALL	POS, Perkins V, IBC	CTE Administrators, CTE Teachers, CTE vendors	700
7/25/18	THOA (Health Science Teachers Assoc.)	R.Whitson			
7/30-8/3/18	Family & Consumer Sciences Teachers Association of Texas (FCSTAT)	D.Wieland	POS, IBC, FCS Enrollment, CTSO Participation	FCS Teachers	500
7/31-8/3/18	Vocational Agriculture Teachers Assoc.	R.Whitson			
8/29/18	ESC 20 Quarterly CTE Update	D.Fowler	Perkins V, POS, IBC	CTE Directors	100
9/10/18	FFA BOD	A.Brantley	IBC	AFNR Teachers, Student State Officers, CTE Administrators, AFNR Industry Partners	25
9/17/18	FCCLA BOD	D.Wieland	POS, IAC, IBC	FCS Teachers, FCCLA Student Officers, Industry Partners, Parents	30
11/8/18	Texas Regional Pathways Network Convening	A.Brantley R.Merritt	LMI	WDA, School District, IHE Partners	250
11/9/18	Career Cluster Advisory Summit	ALL	Perkins V, POS, IBC	Teachers, School Administrators, Industry Partners	250
11/12-11/15/18	New CTE Teacher Conference	All	Perkins V, POS, IBC	New CTE Teachers	200
11/13/18	Hospitality Educators Association of Texas Conference	A.Brantley	Perkins V, POS IBC	HT Teachers	50

CCMP Presentations 7/2018-Present

11/20/18	Texas FFA Legislative LEAD	A.Brantley R.Merritt	Interacting/Working with the TEA	AFNR Teachers	30
11/28-12/1/18	ACTE Vision	R.Merritt			
12/12/18	ESC 17	R.Merritt			
1/7/19	Texas FFA BOD	A.Brantley	POS, IBCs, Listening Tour	AFNR Teachers, Student State Officers, Administrators, AFNR Industry Partners	25
1/8/19	Texas FFA Foundation BOD	A.Brantley	POS, IBCs, Listening Tour	Ag Teachers, Student State Officers, Administrators, Ag Industry Reps	25
1/11/19	FFA Area XII Midwinter Teacher Professional Development	A.Brantley	IBC, POS	Ag Teachers	60
1/15-17/19	TIVA Midwinter	A.Brantley	IBC, POS	CTE Teachers	40
1/17-1/18/19	FCSTAT Midwinter Lubbock (Webinar)	D.Wieland	POS, IBC	FCS Teachers and CTE Administrators	160
1/24/19	FCSTAT Midwinter McAllen	D.Wieland	POS, IBC	FCS Teachers	75
1/28/19	HEAT Board Meeting	D.Wieland	POS, IBC	HT Teachers and Industry Partners	30
2/8/19	Fort Hood Education Summit	D.Wieland and Steve Smith	POS, IBC	Military Partners, Teachers, Superintendents	50
2/11-2/13/19	Winter CTAT	All			
2/18/19	FCCLA BOD	D.Wieland	POS, IAC, IBC	FCS Teachers, FCCLA Student Officers, Industry Partners, Parents	40
2/28-3/1/19	TAFE BOD at TAFE Teach Tomorrow Summit	D.Wieland	POS, IBC, EdTPA	ET Teachers, TAFE Student Officers, Postsecondary Partners	30
3/26/19	ESSA Institute	L.Torres	ESSA and Perkins V	Compensatory Funds Administrators	25
3/24-3/25/19	Texas FFA BOD	A.Brantley	POS, IBCs, Listening Tour	AFNR Teachers, Student State Officers, Administrators, AFNR Industry Partners	25
3/26/19	Texas FFA Foundation BOD	A.Brantley	POS, IBCs, Listening Tour	AFNR Teachers, Student State Officers, Administrators, AFNR Industry Partners	25
4/4-4/6/19	SkillsUSA State Conference	A.Brantley			
4/5-4/6/19	FCCLA State Leadership Conference	D.Wieland	Perkins V, POS, IBC, World Food Championships	FCS Teachers	500
4/24/19	ACET Spring	L.Torres	Perkins V Transition	Compensatory Funds Administrators	25

CCMP Presentations 7/2018-Present

5/31/19	FCCLA BOD	D.Wieland	POS, Perkins V, IBC	FCS Teachers, FCCLA Student Officers, Industry Partners, Parents	40
6/10/19	TAFE BOD	D.Wieland	POS, IBC	ET Teachers, TAFE student Officers, Postsecondary Partners	30
6/11-6/13/19	GYO Teacher Institute	D.Wieland	POS, IBC	ET Teachers, School Administrators and Counselors, Superintendents	200
6/13/19	TASSP	A.Barrera	IBC Evaluation Process and Updated List	School Principals	75
6/17/19	Texas Regional Pathways	L.Torres	Gulf Coast Pipeline Project	Sheldon ISD, Dayton ISD, Channelview, San Jacinto CC, Lee College	10
6/17/19	Texas Regional Pathways Network Convening	A.Brantley L.Torres	Group Facilitation – POS and TRPN Stakeholders	School Districts, ESCs, Industry	100
6/18-6/19/19	CCRSM Leadership Summit	A.Brantley R.Merritt	POS	ECHS, PTECH, TSTEM, ICIA School Districts	350
6/19/19	Law, Public Safety, Corrections, and Security Teacher Conference	D.Fowler	POS	LPSCS and Forensic Science Teachers	100
6/19/19	THLA Education Foundation Committee Meeting	D.Wieland A.Barrera	POS, IBC	HT Industry Partners	30
6/25/19	Region 10 CTE Conference	A.Brantley R.Merritt	POS, IBCs	Counselors, Teachers, Administrators	80
7/7/19	CTAT- Breakout Session	L.Torres	Energy Program Implementation	LEAs	41
7/22/19	TEXO Foundation	A.Brantley R.Merritt	POS, IBCs	LEAs and Industry Partners	40
7/22-7/23/19	FCSTAT	D.Wieland	POS, Perkins V, IBCs	FCS Teachers	500
7/29-7/31/19	VATAT Conference	A.Brantley	New Teacher, POS, IBCs	AFNR Teachers	100
7/31/19	Region 13 Accountability Summit	A.Barrera	IBC Evaluation Process and Updated List	Region 13 School District Staff	75
8/20/19	CyberTexas Foundation	L.Torres	Cybersecurity POS Implementation	LEAs	20
9/18/19	DECA Advisors	D.Fowler	POS, IBC	DECA Chapter Advisors	50
9/25/19	Texas Travel Summit	D.Wieland	POS, IBC, Industry Partnerships, HT Enrollment Numbers	Industry Partners; Primarily CVB and Travel Industry	300

**TEA APPENDIX 2:
Public Comment Highlights**

DATE:	August 30, 2019
SUBJECT:	Final CTE Programs of Study

Texas Education Agency (TEA) conducted a public comment period on proposed Career and Technical Education (CTE) statewide programs of study. Formal feedback was received from over 950 district and campus level administrators, CTE coordinators, CTE teachers, counselors, and industry representatives.

In-person feedback was also collected from over 1,000 stakeholders through information sessions at multiple summer conferences including the Career and Technical Association of Texas, College and Career conferences held at education service centers, and the College and Career Readiness School Models Leadership Summit. The draft versions were also discussed with the Texas CTE Leadership Committee, made up of representatives from all twenty education service centers and members of the Career and Technical Association of Texas, in order to gather regional feedback from CTE leaders.

A significant amount of comments focused on concerns related to embedding STEM related courses into other career clusters, adding general courses to every program of study, and questions regarding flexibility within course sequences. The largest number of comments centered around adding additional CTE courses in fashion design to a course sequence. Positive letters were received in support of the new Energy career cluster and requests were made to allow energy sequences to count as a STEM endorsement.

The following table covers the highlights of significant changes based upon public comment while maintaining the methodology used to develop the statewide programs of study:

<i>Highlights of Changes to Programs of Study Based on Public Comment</i>
<ul style="list-style-type: none"> ▪ STEM career cluster will remain in place and STEM related programs of study have been organized under the cluster to better align with current endorsement rules
<ul style="list-style-type: none"> ▪ Technology Application courses have been added to programs of study as a result of recent legislation
<ul style="list-style-type: none"> ▪ Engineering courses sequences were adjusted to align with Project Lead the Way guidelines
<ul style="list-style-type: none"> ▪ Principles of Health Science and Medical Terminology courses are now included in five out of the six course sequences in Health Science
<ul style="list-style-type: none"> ▪ Fashion II/Lab was added to the Design & Multimedia program of study

These revisions have been made to the statewide programs of study documents and the final versions have been vetted through the CTE Leadership Committee. Plans are in place to publish the statewide programs of study on Thursday, September 5, 2019. Once the statewide course sequences have been released, an application process will begin for districts to apply for regional programs of study.

Texas Perkins V State Plan Public Comments and Responses

Stakeholder Type	Section of State Plan for feedback	Page numbers of section for feedback	Secondary or Postsecondary Feedback	Feedback on the Perkins V State Plan for Texas	Public Comment Response
Business & Industry Representative	B2-Implementing Career and Technical Education Programs and Programs of Study	Pg 123; Electrical Program of Study Chart	Secondary	As a stakeholder in the Perkins V State Plan, the Independent Electrical Contractors of Texas believes the chart on the page is inaccurate. Under certificate/license on Electrical Apprenticeship Certificate Level 1, the student will receive a Texas State issued apprenticeship license as a high school student and be able to work in the field and be paid while in school. The certificate will be earned at the end of their senior year, but they will still be licensed and able to work and complete the other 3 years of the electrical program and prepares them to earn a journeyman license. The student will have a state issued license and a job that is not listed on the chart.	The Electrical program of study included in the appendix provides examples of industry certifications, licenses and degree options for secondary and postsecondary students. TEA will revisit additions and changes to specific sections on the program of study framework.
Business & Industry Representative	B2-Implementing Career and Technical Education Programs and Programs of Study	Pg 26; programs of study must	Secondary	The Independent Electrical Contractors of Texas' Electrical Apprenticeship Certificate Level 1 Industry-Based Certification meets all 7 requirements under HB 2628 and should have the end date on the program removed.	The end date on the 2019-2020 list of industry-based certifications for public school accountability indicates that the certification did not meet one of the five evaluation criteria. TEA has been in contact with the vendor and communications about inclusion in the next round of revisions for industry-based certifications are under way.
Business & Industry Representative	B1-State's Vision for Education and Workforce Development	17, 19, 35, 34	Secondary	On behalf of Project Lead The Way, I thank you for the opportunity to comment on Texas's state plan for the Strengthening Career and Technical Education for the 21st Century Act (Perkins V). Project Lead The Way (PLTW) is a nonprofit organization that provides a transformative learning experience for PreK-12 students and teachers across the U.S. through more than 14,000 programs in approximately 11,500 schools. PLTW empowers students to develop and apply in-demand, transportable skills by exploring real-world challenges. Through our pathways in computer science, engineering and biomedical science, students not only learn technical skills, but also learn to solve problems, think critically and creatively, communicate, and collaborate. We also provide teachers with the training, resources, and support they need to engage students in real-world learning. PLTW was proud to provide programs to more than 85,000 students through over 1,000 programs in Texas during the 2019 – 2020 academic year. It is our hope that all PLTW students become highly-qualified individuals who are in demand in today's workforce. PLTW has become a leader in achieving the goals and outcomes championed by Perkins. In response to the President's budget proposal released last month, PLTW's President and CEO, Vince Bertram, provided the following statement to the U.S. Department of Education, "America's global competitiveness requires a highly skilled workforce, and the opportunity to pursue the American Dream can be realized if our students develop the knowledge and skills necessary to thrive in our rapidly evolving economy. Investing today in America's students and career and technical education is an essential investment in our nation's future." We applaud the Texas Education Agency (TEA) on the time and forethought that was put into the development of the Perkins V state plan, and we ask that you consider the following recommendations:	TEA submitted additional areas for consideration of the STEM endorsement to the State Board of Education. This includes many of the items specifically identified in the response. Vendors will be able to submit their materials for instructional material review as CTE courses are revised through the State Board of Education process.
Business & Industry Representative	B1-State's Vision for Education and Workforce Development	22	Secondary	<p>Page 17 – Development of a STEM framework in secondary education. As the provider of a number of courses that are classified under the STEM program of study, PLTW would love to serve as a thought partner on this initiative. Note that would not include the advocacy of our programs alone, rather a resource in the planning process. PLTW representatives have served as resources through participating on state education and workforce development councils in various states, including California and Florida. In Texas, we are currently a member of the Computer Science for Texas (CS4TX) coalition for the advancement of computer science education. On the federal level, PLTW's President and CEO, Dr. Vince Bertram, was appointed to the Congress-Authorized Science, Technology, Engineering, and Mathematics (STEM) Education Advisory Panel by the National Science Foundation back in 2018.</p> <p>Page 17 and 35 – Work-Based Learning. PLTW has successfully demonstrated the connection between classroom and career as highlighted through our partnerships with companies like Toyota and Lockheed Martin. We will continue to work in the arena with state departments of education and workforce across the country to make work College Board is pleased to see that the state is clear that districts must offer a specific number of programs of study based on district high school enrollment numbers, and that these programs of study align to statewide graduation endorsements.</p> <p>We hope that Texas uses Perkins V to further innovate their CTE programs and provide additional pathways for students. Texas could further expand their CTE programs of study by integrating rigorous Advanced Placement (AP) courses in the statewide approved programs of study that do not include AP. AP is only available in the Networking System program of study in the Information Technology Cluster and the Cybersecurity and Programming and Software Development programs of study in the STEM Cluster.</p> <p>Perkins V encourages states to support accelerated learning programs, defined as AP, IB, or dual-credit programs, and state plans must outline opportunities for students to earn college credit in high school. In fact, AP fits into many different CTE programs of study. Advanced CTE, College Board, and CTE directors from multiple states teamed up to publish a report articulating how AP courses connect to the 16 Career Clusters listed in the National Career Cluster Framework.</p> <p>AP and CTE courses can, and should, work in tandem to support career readiness by encouraging the development of the academic knowledge and technical skills that are – together – increasingly important to students' overall employability. AP and CTE courses complement and supplement each other by allowing students to explore coursework and develop relevant skills focused on career areas in which they aspire to work. Moreover, integrating AP and CTE courses gives students the opportunity to leverage the investments Texas has made in support of AP as part of its overall 60x30 goals.</p> <p>We hope to work with you to expand access to rigorous advanced coursework for your CTE students.</p> <p>link to report referenced above: https://careertech.org/resource/ap-cte-working-together</p>	TEA will continue to review programs of study and relevant/applicable advanced academics courses such as advanced placement. The programs of study will be revised every two years to coincide with updated labor market projections.

Texas Perkins V State Plan Public Comments and Responses

Business & Industry Representative	B1-State's Vision for Education and Workforce Development	9-21	Secondary	<p>The College Board looks forward to working with the TEA and other partners as they execute their vision for increasing student access to CTE so that all students have a fair shot at preparing for high skill and high-wage jobs.</p> <p>College Board is especially interested in ensuring that students are informed of both college and career opportunities, and have equal access to quality tools and dashboards as part of this decision-making process. That is why we are pleased to see that the TEA will use Perkins State Leadership funds to develop and strengthen career exploration activities such as curriculum on college and career prep for middle school, counselor and advisor training, and student dashboards that include data on high-skill, high-wage, and in-demand occupations.</p> <p>College Board, as part of our mission to clear a path for students to own their future, partnered with Roadtrip Nation® to create Career Finder™, a unique online tool that lets students explore majors and careers that align with their personal interests and connects them to compatible schools on BigFuture™. We believe that Career Finder aligns with some of the items Texas plans to develop as part of Perkins V and encourage the TEA and its partners to consider Career Finder as an option as part of overall efforts to increase student access to valuable jobs data. We look forward to working with you to ensure students have access to this valuable tool.</p> <p>Benefits for Students</p> <ul style="list-style-type: none"> • Personalized major and career recommendations, plus course and activity ideas • Seamless connections to college planning with BigFuture • Access to videos featuring insights from successful professionals <p>Benefits for Counselors</p> <ul style="list-style-type: none"> • Actionable information for conversations with students about relevant colleges and careers • Course-planning ideas for students based on their career roadmaps • Simple, engaging course and career-planning tool using the power of storytelling <p>Benefits for Texas and School Districts</p> <ul style="list-style-type: none"> • Student career and course planning based on their passions and interests • Easy-to-use counselor and administrator resource to monitor student college and career planning • Personalized college and career action plans for students 	<p>Instructional materials review will be adopted as a part of CTE TBS review per the State Board of Education process.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	22- 25	Secondary	<p>The Programs of Study format and documentation, as displayed on pages 23 and 24, present the information clearly and in a concise manner. The format is strong and serves as an excellent planning and guidance tool as students are advised over their potential Program of Study and future career. Page 25 also displays the new formatted webpage as it applies to the Programs of Study and highly useful. Future documents should reflect the same framework to maintain consistency and integrity.</p>	<p>Thank you for sharing your comment with the Texas Education Agency.</p>
School District	B- Implementing Career and Technical Education Programs and Programs of Study		Secondary	<p>The Perkins V approved programs of study for Programming and Software Development under the STEM pathway does not include Robotics I and II. These two courses could be considered programming, but they are placed under the Advanced Manufacturing and Machinery Mechanics program of study. I would like to see Robotics I and II duplicated in the STEM Programming and Software Development program of study.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. TEA will continue to review programs of study and we appreciate the information shared.</p>
School District	A-Plan Development and Consultation	whole document	Secondary	<p>In future versions, I think it would be helpful to have separate sections for Secondary vs Postsecondary to ensure requirements and guiding entities are clear.</p>	<p>Thank you for sharing your comment with the Texas Education Agency.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	32	Secondary	<p>But overall, the plan is very comprehensive and gives a great picture of what is happening with CTE in the state of Texas. Thanks!</p>	<p>Thank you for sharing your comment with the Texas Education Agency.</p>
School District	A-Plan Development and Consultation	Texas	Secondary	<p>I love the Pathway samples for the Programs of Study. The inclusion of the Academic Knowledge and WBL all on one page is so important!</p>	<p>Thank you for sharing your comment with the Texas Education Agency.</p>
School District	A-Plan Development and Consultation	Texas	Secondary	<p>1. In spite of claims that TEA will improve outcomes for all public school students in the state by providing leadership, guidance, and support to school systems, to the contrary, TEA mandates have become more extensive, cumbersome and dictatorial than in years past</p> <p>2. The public input that TEA claims to have sought on multiple occasions and from multiple sources, is exaggerated and was totally controlled by TEA. Transparency was minimal at best and TEA representatives were not available to answer questions. Site visits were carefully selected and not extensive in nature.</p> <p>3. Needs assessment is extensive and most of the information is unnecessary. I would hate to do the amount of work required to have it rejected because TEA does not think the answers are complete. The needs assessment goes out in Feb and the actual application should go out in June, but if the application runs as everything else, we won't have Fed funds before the next year begins</p>	<p>Thank you for sharing your comment with the Texas Education Agency. We would welcome specifics as to where your questions or comments were not addressed.</p>

Texas Perkins V State Plan Public Comments and Responses

School District	B2-Implementing Career and Technical Education Programs and Programs of Study	20-42	Secondary	<p>State leadership will facilitate Board of Director training related to roles and responsibilities, Perkins 5 and programs of study. Training will be implemented annually.</p> <p>3. Fig 20 – State CTE staff will facilitate a Landscape Analysis for CTSOs state performance measurements.</p> <p>a. ESOs are guided by the national organizations and although they are considered “co-curricular” in the state of Texas, the CTSOs are the student organizations that POS support. State CTE staff should not be serving on these boards</p> <p>b. ETSOs board members do not speak for districts regarding program offerings, local policy, or the local LEA mission and vision. State CTE staff should not be providing training to CTSO board members because they (for the most part) are teachers, not directors and work with the students in the district; they do not set policy, procedures, or design programs and services. Districts are not required to have CTSOs and many do not offer all of the CTSOs available.</p> <p>c. Not sure what is meant by “Landscape Analysis” but appears to be in conflict with what is currently measured through programs. Quarterly report from Texas Workforce Commission provides partnership opportunities with business and industry.... Really? The only reports we get are from Interlink. All other information must be secured through the Workforce Boards and it is virtually impossible to find anyone that can assist you with questions or concerns. Furthermore, many, if not all of the opportunities for students through mentorships, internships and summer programs are targeted to specific districts and are not inclusive. Professional Development opportunities may be available, but the information is not relevant or timely and there is no real instructional benefit. ESCs will participate in the review of the Comprehensive Local Needs Assessment for LEAs within their district. If TEA approves, the district can apply for funds. Another barrier to simplifying the process of progress with CTE. The application (including the needs assessment) has doubled in size and information requirements.</p> <p>6. Fig 28 - Process for Regional Programs of Study: Once again, making the process for offering programs that are needed and in-demand within your region difficult to achieve. TEA dictates who can and who cannot offer programs based on their data sources and could take an extensive amount of time to meet with advisory boards and workforce boards to finalize the application. LEAs are dependent on Regional Service Centers to process requests in a timely manner- something that did not happen this first year.</p> <p>7. Fig 41 - TEA will develop or procure software to collect, analyze, store, monitor and report on work-based learning opportunities that students have participated in across Texas based on information submitted through LEAs. The thought being that TEA can facilitate connections between educational institutions and employers. We don't need TEA to facilitate, we need TEA to provide funding to support local positions to achieve this goal. We do not need more government interventions through intermediaries around the state. Look at the Workforce Boards- they work for some, but not all school districts. Texas is too big for TEA to try and control what opportunities are available in each community. 8. Data to be submitted- not sure how this will impact funding. If CTE students do not meet baseline data, will district not receive funds? Postsecondary data- looks as if they are tracking students after graduation. How will this work? 9. Middle school courses- it appears that TEA is writing modules for the College and Career Readiness course and the Investigating Careers course. Does this mean that districts will no longer be able to focus on various POS through Investigating Careers? Still not funded?</p> <p>10. Training- ESCs are to provide training for counselors, administrators and parents. I feel that the general overview of the state plan will be okay, but again, districts</p>	<p>Thank you for sharing your comment with the Texas Education Agency. Revisions related to comments on Career and Technical Student Organizations have been reflected in the state plan to address this concern. Important to note is the definition of size, scope, and quality, where Career and Technical Student Organizations are a part of the definition of a quality program. The Comprehensive Local Needs Assessment (CLNA) is a requirement of the Perkins V legislation. TEA released regional labor market information to every district and made this available on the website to assist in receiving this information and not having to go through a workforce board to receive the information. Additionally all district data was sent to districts so they did not need to compile this information to respond to the CLNA. This was done in conjunction with a CLNA guide to assist districts in fulfilling this new requirement. Districts are encouraged to innovate and submit new programs of study through the regional program of study process. TEA was pleased to approve 8 of those regional programs of study for districts to offer in 2020-2021. This process will continue every year to provide districts the opportunity to meet the needs of their community.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	Texas	Secondary	<p>As an educator and parent of a student in high school I am firmly against the requirement of students following pathways. Yes they should be offered but students should be allowed to explore all the different options to find out what they are truly interested in. We say we want the students to minimize the debt they take on in postsecondary education but how many students change their majors once if not multiple times as they try to find their way in life? All that is doing is causing them to take on more debt that could have been avoided if we had encouraged students to explore architecture, computer programming, AV, etc.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. We agree that career exploration is vitally important for our students. This is reflected in the middle school career exploration curriculum as well as in work-based learning career awareness and exploration activities that are encouraged to take place in earlier grades and not wait until high school. Students are still allowed to change their program of study and are not required to complete a program of study.</p>
Business & Industry Representative	B1-State's Vision for Education and Workforce Development			<p>Adobe appreciates having this opportunity to provide input on the Texas Department of Education's Perkins Career and Technical Act (Perkins V) plan. We strongly support the state's Essential Knowledge and Skills for Career Development, including the expectation that high school students are able to apply critical- and creative-thinking skills to solve complex problems and middle school students are able to use problem-solving models and critical-thinking skills to make informed decisions. As a global technology leader, we need creative, collaborative employees who can solve problems and communicate effectively with each other and our customers. We deeply value these competencies. We also recognize the growing worldwide demand for them by other leading private and public sector employers and the communities they serve. Career and technical education experiences and activities should recognize these workforce needs and align with the work and life experiences students will encounter after graduation. As your agency completes Texas's plan for implementing Perkins V, we respectfully encourage you to consider using Perkins V's performance based learning provisions as a tool to expand the state's career development leadership. Performance based learning is one of the most effective and engaging way for career and technical education students to acquire, at their own pace, the deep content knowledge and array of essential skills they will need to thrive as workers, community members, and lifelong learners. This approach includes providing opportunities for students to use technology to maximize their creative contributions and impact and demonstrate the knowledge and skills they are acquiring through CTE courses. Consistent with this vision, we respectfully urge you to consider adding the following ideas to Texas's long term Perkins V plan.</p> <p>INVEST IN CAREER AND TECHNICAL EDUCATION TEACHERS AND COUNSELORS</p> <p>Adobe strongly supports the Texas Perkins V Transition plan's emphasis on training career and technical education teachers, including training CTE teachers as licensed instructors in specific industry certifications and/or become a testing site. Evidence shows that teachers and school leaders play the most important role in promoting student achievement, including in career and technical education. Teachers and school leaders are also best positioned to establish learning environments that will cultivate the next generation of creative workers and citizens. Given the critical importance of highly effective teachers to CTE programs, we encourage Texas to include language in the Perkins V plan encouraging school districts to provide professional development opportunities for teachers, school leaders, and other CTE professionals to build their capacity to use competency-based models and other performance-based learning practices. For example, Perkins funding could be used to help Texas CTE teachers develop and use high quality performance assessments that better illustrate CTE student's knowledge and skills, effectively use student data gathered through portfolios and other innovative assessments to support personalized learning, and integrate technology to support rich CTE instruction, experiences, and assessments of learning. Adobe also urges Texas to ensure that all school counselors in the state are encouraged and equipped to help students understand the value of acquiring creative literacy, critical thinking, collaboration and communication skills, consistent with the Texas Essential Knowledge and Skills for Career Development. Counselors should also encourage CTE students to seek work based learning opportunities and help them seek out CTE courses that use performance based learning models. This recommendation aligns directly with Perkins V's permitted state level investment in “improv[is] career guidance and academic counseling programs”, which can include helping students recognize the value in cultivating their creativity, critical thinking, communication, and collaboration skills.</p> <p>ENCOURAGE ELIGIBLE RECIPIENTS TO PROMOTE CTE INNOVATION</p> <p>I feel student participation and success in CTE student organizations should carry as much weight as industry certifications toward district's accountability. Currently the list on industry certifications is very limited due to student age and hours of training required to obtain certification.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. In response to invest in CTE Teachers and Counselors, please see the section on uses of leadership funds. In this section, there are specific activities designed to support CTE teachers in terms of training and certification alignment. There are also activities specifically supporting the training of counselors. In response to promoting innovation, we will be looking to add some of these categories into the Perkins Reserve Grant in future years. We are excited to already begin promoting CTE TEKS with specific knowledge and skills related to what students need to know and be able to do as well as creating our work-based learning framework to start to address how to work with employers to provide robust opportunities for students to get hands on real world application.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	Tx	Secondary		<p>Thank you for sharing your comment with the Texas Education Agency. Please note that we added a component to the size, scope, and quality definition to include Career and Technical Student Organizations as a component of a quality program. Please also note that the list of industry-based certifications has grown from the original list of 73 to now 245 recognized industry-based certifications.</p>

Texas Perkins V State Plan Public Comments and Responses

School District	B2-Implementing Career and Technical Education Programs and Programs of Study		Secondary	<p>Although area employment data is certainly a key point of consideration, there is the risk of becoming too restrictive in our programming if we tie all of our offerings to local employment information. Although we certainly want our students to have opportunities to become well-equipped employees, we need to think more broadly. Balancing student interests, national and international trends, along with local employability data should all be considered. The pace of change increases exponentially and becoming too restrictive in our programming is not a risk we can not endure when it comes to the futures of our students...whether they stay with us or move on. In addition to local employment data, we should also be working with projection analysts to help us understand our needs 10-15 years down the road, as well as national trends that could quickly impact our local areas.</p> <p>The intention of Programs of Study were to identify local/regional employment opportunities and create course pathways for career preparation. The POS that TEA developed do not meet the local / regional / workforce demand in our area. It is ok for our district to offer Hospitality POS but there is genuinely not any good CAREER opportunities (for a high wage, high demand job) in this area. Its again a case of trying to be prescriptive and applying the same medicine to every case. We submitted a request for a Regional POS and it was shot down. Districts are tasked with ensuring we know what our community needs and being able to substantiate it, but when we requested a regional POS to support that, it was not approved.</p> <p>The programs of study are too specific with their course options. The career clusters worked well to give districts the ability to create pathways that really did meet their local needs. The POS do not.</p> <p>In a district that gives students the opportunity to earn 28 credits over 4 years, the expectation that 4 credits of a program of study be met is unreasonable.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. We agree that national trends and preparing students for skills that will be required of future occupations is vitally important. Please let us know if there are specific data sets or skills you would like to see included.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	TX	Secondary	<p>For CTSD/Exploration Activities I noticed only Skills USA being mentioned for the Welding Cluster. I am a Welding Instructor for Tyler SDS CTC and my students participate in TSA (Technology Student Association). I am an Advisor for TSA as well. TSA offers a comprehensive amount of industry based/STEM based learning experiences not only to build in, but compete in as well, and I invite TEA to review TSA's state rule book to see what all categories are offered to compete in and attend a TSA State competition to view the many different projects that vary from Welding projects, engineering projects, all the way to robotics, and anything else imagined plus anything in between.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. Districts have the flexibility in choosing a Career and Technical Student Organization that best represents the needs of their students.</p>
School District	B2-Implementing Career and Technical Education Programs and Programs of Study	manufacturing template p.6	Secondary	<p>Thank you for sharing your comment with the Texas Education Agency. There are currently 3 different programs of study within Hospitality and Tourism. These programs offer more than four courses within each sequence designed to be flexible for district to offer. Regional programs of study would need to reflect different coursework that is related to regional labor market information demonstrating high wage and in-demand occupations. These requirements are taken from Perkins V requirements and the definition of a program of study. Please note that 4 credits within a program of study is not required but rather a demonstration of a student who completes a program of study. Graduation requirements in relation to endorsements still provide districts with flexibility in how they structure their course sequences for graduation and earning an endorsement. The statewide programs of study provide a sequence that meets endorsement requirements, but is not required for graduation.</p>	<p>Thank you for sharing your comment with the Texas Education Agency. Districts have the flexibility in choosing a Career and Technical Student Organization that best represents the needs of their students.</p>

**TEA APPENDIX 3:
Texas Workforce System Strategic Plan Excerpts**

The image features a close-up, vertical view of the Texas state flag. The flag is shown from the left side, with the blue field containing a white five-pointed star. The white field is above the red field. The flag is draped and appears to be blowing in the wind, creating soft folds and highlights. The background is a plain, light color.

THE TEXAS WORKFORCE SYSTEM STRATEGIC PLAN

FY 2016–FY 2023

Texas Workforce Investment Council
September 2017 Update

VISION

An innovative, world-class Texas workforce system ensures success in the dynamic global economy.

MISSION

The mission of the Texas workforce system is to position Texas as a global economic leader by:

- **Growing and sustaining a competitive workforce**
- **Aligning programs with employer needs**
- **Integrating system services**
- **Leveraging partnerships**

Goal Area 1: Focus on Employers

By improving access to critical education and labor data sets, employers can better find and plan for skilled workers to meet their needs in both the immediate timeframe and the future. Through greater engagement with employers, education and training providers can better design career and technical education content and delivery options that are more aligned with industry needs. Providers can make adjustments in program content to benefit employers and students, as well as address both state and regional economic needs.

System Partner Strategy	Agency	System Objective	System Goal
Expand outreach programs to employers to assist veterans to find quality employment.	TVC	Increase business and industry involvement.	<i>Focus on employers</i>
Involve business and industry in Texas Essential Knowledge and Skills review and programs of study.	TEA		
Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.	TWC TEA THECB TVC TDCJ	Expand licensure and industry certification.	
Align career and technical education program content and outcomes with third-party, industry-based certifications.	TEA THECB		

System Objective

Increase business and industry involvement.

Strategy

Expand outreach programs to employers to assist veterans to find quality employment.

Partner Agency

Texas Veterans Commission

Action	Start Date	End Date
Integrate with Texas Workforce Commission business service units across the state.	Ongoing	FY 2019
Partner with employers and veteran service organizations on hiring events.	Ongoing	FY 2019
Participate in corporate events, panel discussions, and presentations.	Ongoing	FY 2019
Partner with employer organizations, the Society for Human Resource Management, and chambers of commerce.	Ongoing	FY 2019
Conduct semi-annual employer satisfaction surveys, analyze survey data, and evaluate ways to improve outreach programs to employers.	Ongoing	FY 2019

Performance Measure

- Rate of employer satisfaction

System Objective

Increase business and industry involvement.

Strategy

Involve business and industry in Texas Essential Knowledge and Skills review and programs of study.

Partner Agency

Texas Education Agency

Action	Start Date	End Date
Involve business and industry representatives on committees for the review and revision of the Texas Essential Knowledge and Skills (TEKS) for career and technical education (CTE).	Initiate next review cycle	Date set by the State Board of Education
Solicit informal feedback and public comment on drafts of TEKS for career and technical education from specific business and industry representatives.	Initiate next review cycle	Date set by the State Board of Education FY 2019
Identify and review relevant industry-based certifications, and incorporate examples into the revision of programs of study content.	Ongoing	
Request assistance from the Texas Workforce Commission in soliciting business and industry input on revised programs of study.	Ongoing	FY 2019

Performance Measure

- Percentage of revised career and technical education programs of study reviewed by business and industry

System Objective

Expand licensure and industry certification.

Strategy

Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.

Partner Agency

Texas Workforce Commission

Action**Start Date End Date**

Expand training strategies and options to increase industry-based certifications offered in response to employer-defined needs by working through local workforce boards to identify certifications that support local employers and building capacity to provide those certifications.

FY 2016 FY 2017

Performance Measure

- Type and number of third-party, industry-based certifications successfully completed by program participants

System Objective

Expand licensure and industry certification.

Strategy

Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.

Partner Agency

Texas Education Agency

Action	Start Date	End Date
Collect third-party, industry-based certification information on the Perkins annual performance evaluation report.	Ongoing	FY 2019
Identify and include third-party, industry-based certifications, as relevant, as examples in revised programs of study.	Ongoing	FY 2019

Performance Measures

- Type and number of third-party, industry-based certifications successfully completed by program participants
- Certification success rate: total successfully completed certification assessments divided by total attempted certification assessments

System Objective

Expand licensure and industry certification.

Strategy

Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.

Partner Agency

Texas Higher Education Coordinating Board

Action	Start Date	End Date
Identify and incorporate industry-based certifications as milestones in programs of study.	FY 2016	FY 2019
Consider industry-based certifications as potential success points in formula/performance funding.	FY 2019	FY 2019
Revise existing Workforce Education Course Manual course review process to include discipline-specific professional development to encourage statewide adoption and use of industry-based certifications.	FY 2016	FY 2019

Performance Measure

- Type and number of third-party, industry-based certifications successfully completed by program participants

System Objective

Expand licensure and industry certification.

Strategy

Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.

Partner Agency

Texas Veterans Commission

Action	Start Date	End Date
Work with regulatory agencies to use the Texas Department of Licensure and Regulation's primer for developing service credit for occupational licensing as a guide for accurately evaluating military service credit by developing standardized training for other regulatory agencies to adopt and tailor for their specific agency.	Ongoing	FY 2019
Work with regulatory agencies to establish a process for a military service member or veteran to submit an application for a license or apprenticeship and to obtain credit for verified military experience, service, training, or education.	Ongoing	FY 2019
Work with regulatory agencies to post those Military Occupational Standard classifications or designators that correspond to licensed occupations to establish a clear support system to ensure as many veterans as possible are aware of job options.	Ongoing	FY 2019

Performance Measure

- Type and number of third-party, industry-based certifications successfully completed by program participants

System Objective

Expand licensure and industry certification.

Strategy

Use third-party, industry-based certifications where relevant as an education or training outcome to connect graduate competencies to job skill requirements.

Partner Agency

Windham School District (Texas Department of Criminal Justice)

Action	Start Date	End Date
Continue to develop and maintain partnerships between industry and the Windham School District in order to provide certifications to students that will fulfill job requirements in the current workforce market.	FY 2016	FY 2016
Expand the number of career and technical education classes providing industry standard certifications.	FY 2016	FY 2019
Expand the career and technical education programs offered by Windham School District, and evaluate program effectiveness.	FY 2016	FY 2019

Performance Measures

- Type and number of third-party, industry-based certifications successfully completed by program participants
- Certification success rate: total successfully completed certification assessments divided by total attempted certification assessments

System Objective

Expand licensure and industry certification.

Strategy

Align career and technical education program content and outcomes with third-party, industry-based certifications.

Partner Agency

Texas Education Agency

Action	Start Date	End Date
Align Texas Essential Knowledge and Skills to industry-based certifications, where relevant.	Ongoing	FY 2019
Include industry certifications as examples in programs of study and college and career planning guides.	Ongoing	FY 2019
Identify industry certifications offered by Early College High Schools.	Ongoing	FY 2019
Design processes for career and technical education programs of study that identify relevant industry certifications and licenses and incorporate related career and skill information into program content where appropriate.	Ongoing	FY 2019

Performance Measure

Not applicable—qualitative

System Objective

Expand licensure and industry certification.

Strategy

Align career and technical education program content and outcomes with third-party, industry-based certifications.

Partner Agency

Texas Higher Education Coordinating Board

Action**Start Date End Date**

Develop discipline-specific statewide advisory groups to provide input concerning skills, certifications, and licenses required by business and industry.

Varies by
program
disciplines

FY 2019

Construct processes to develop and revise programs of study that identify relevant industry-based certifications and licenses, as well as the occupational information that can be incorporated into those programs.

FY 2016

FY 2019

Provide statewide professional development workshops, by discipline, to share best practices and improve student outcomes.

FY 2018

FY 2019

Performance Measure

Not applicable—qualitative

Goal Area 2: Engage in Partnerships

Through collaborative and transparent processes, workforce system partners focus on outcomes that improve the employability of all program participants—from across a wide spectrum of capabilities and experiences—to meet employer needs. The leveraging of partnerships to enhance system alignment and outcomes depends on trust, a culture of collaboration both within and external to the workforce system, deep working relationships, and technical capacity to communicate to share needs, data, and information. Partnerships can provide for common planning, intake, and reporting on outcomes, as well as ensuring a “no wrong door” approach to the provision of workforce programs and services.

System Partner Strategy	Agency	System Objective	System Goal
Improve rehabilitation employment outcomes by establishing additional partnerships with secondary and postsecondary entities, and employers.	TWC	Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.	<i>Engage in partnerships</i>
Create greater access and effective services by promoting collaboration and regional planning.	TWC		
Increase access to, referral between, and outcomes of adult education programs and services.	TWC THECB		
Establish and leverage regional employer partnerships to benefit students pre- and post-release.	TDCJ		

System Objective

Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.

Strategy

Improve rehabilitation employment outcomes by establishing additional partnerships with secondary and postsecondary entities, and employers.

Partner Agency

Texas Workforce Commission

Action	Start Date	End Date
Develop and expand partnerships with system partners, including independent school districts, educational service centers, community and technical colleges, stakeholders, and employers to increase the availability and coordination of integrated work-based learning opportunities such as work experience, pre-apprenticeship, apprenticeship, internship, job shadowing, and on-the-job training.	FY 2016	FY 2018
Develop and implement a coordinated approach to serving employers through collaboration with local workforce boards and workforce centers.	FY 2016	FY 2019
Expand collaboration with state and federal partners to increase engagement of employers, including federal contractors, to promote awareness, recruitment, hiring, and retention of qualified individuals with disabilities.	FY 2016	FY 2017
Expand partnerships with federal, state, and local partners, such as the Veterans Administration and community mental health service providers, to enhance collaboration and coordination of services for veterans with disabilities.	FY 2016	FY 2019

Performance Measure

- Percentage of consumers participating in integrated work-based learning activities

System Objective

Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.

Strategy

Create greater access and effective services by promoting collaboration and regional planning.

Partner Agency

Texas Workforce Commission

Action

Start Date

End Date

Conduct regional identification and planning in cooperation with local workforce boards, in accordance with the Workforce Innovation and Opportunity Act.

FY 2016

FY 2017

Conduct planning in cooperation with vocational rehabilitation services, in accordance with the Workforce Innovation and Opportunity Act.

FY 2016

FY 2016

Collaborate with the Texas Higher Education Coordinating Board and the Texas Education Agency on initiatives to increase access to consumer information and to develop, implement, and support effective education and training models.

FY 2016

FY 2019

Performance Measure

- Percentage of individuals co-enrolled in vocational rehabilitation and workforce programs

System Objective

Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.

Strategy

Increase access to, referral between, and outcomes of adult education programs and services.

Partner Agency

Texas Workforce Commission

Action	Start Date	End Date
Enhance collaboration between federally funded adult education and literacy grantees and local workforce boards.	FY 2016	FY 2019
Improve the capacity of community-based providers not receiving adult education and literacy funds to provide adult education and literacy services and to effectively coordinate services with federally funded adult education and literacy grantees.	FY 2016	FY 2017
Develop and implement a student referral system between federally funded adult education and literacy providers and community and technical colleges to assist individuals seeking adult education services find a program responsive to their needs. If deemed appropriate, consider integration of community-based providers into the referral system. (Referral system measure to be developed prior to implementation.)	FY 2016	FY 2019

Performance Measure

- Percentage of individuals co-enrolled in adult education and workforce programs

System Objective

Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.

Strategy

Increase access to, referral between, and outcomes of adult education programs and services.

Partner Agency

Texas Higher Education Coordinating Board

Action

Start Date End Date

Increase the number of community and technical colleges providing targeted adult education services that transition students into higher education.

FY 2016

FY 2019

Provide statewide program support and professional development to improve targeted adult education services provided through community and technical colleges.

FY 2016

FY 2019

Increase the number of community and technical colleges partnering with local adult education and literacy providers to support the transition of students into and through higher education.

FY 2016

FY 2019

Develop and implement a student referral system between federally funded adult education and literacy providers and community and technical colleges to assist individuals seeking adult education services find a program responsive to their needs. If deemed appropriate, consider integration of community-based providers into the referral system. (Referral system measure to be developed prior to implementation.)

FY 2016

FY 2019

Performance Measures

- Educational attainment rate of students successfully completing Accelerate TEXAS programs at community and technical colleges
- Entered employment rate of students successfully completing Accelerate TEXAS programs at community and technical colleges

System Objective

Expand partnerships with system partners and stakeholders to promote collaboration, joint planning, and enhanced participant outcomes.

Strategy

Establish and leverage regional employer partnerships to benefit students pre- and post-release.

Partner Agency

Windham School District (Texas Department of Criminal Justice)

Action	Start Date	End Date
Develop partnerships with employers and implement pre-employment career and technical education programs to meet needs of employers for potential student employment.	FY 2016	FY 2019
Expand opportunities for offenders, pre- and post-release, through career expos and reentry job fairs to access service providers and employment in order to reenter society successfully.	FY 2016	FY 2018
Continue to provide access and develop awareness of employment opportunities, service providers, and employer surveys on the Windham School District website.	FY 2016	FY 2019
Establish semi-annual employer survey on pre-employment career and technical education activities and hiring experiences.	FY 2016	FY 2019

Performance Measure

- Rate of employer satisfaction

Goal Area 3: Align System Elements

By improving transitions, aligning programs, and ensuring portability and transferability, Texas improves access and the ability of all students to complete programs of study, earn credentials, transition to further education, and gain critical employability skills. Through the implementation of a common technical core curriculum that is recognized statewide, programs of study can enhance delivery efficiency, dual-credit effectiveness, and improve student outcomes and transitions. Texas employers are better positioned to find and hire the employees they need through an enhanced education and training pipeline.

System Partner Strategy	Agency	System Objective	System Goal
Develop and implement programs of study in community and technical colleges and align with secondary programs of study.	TEA THECB	Improve and enhance services, programs, and policies to facilitate effective and efficient transitions.	<i>Align system elements</i>
Enhance transition services for students and youth with disabilities to competitive integrated employment or to postsecondary education and training followed by competitive integrated employment.	TWC		
Ensure consistent credit transfer based on programs of study and common technical core curriculum.	THECB	Develop and implement policies and processes to ensure portable and transferrable credit and credentials.	
Expand career and technical education courses to provide additional opportunities for dual credit.	TJJD		

System Objective

Improve and enhance services, programs, and policies to facilitate effective and efficient transitions.

Strategy

Develop and implement programs of study in community and technical colleges and align with secondary programs of study.

Partner Agency

Texas Education Agency

Action	Start Date	End Date
Collaborate with the Texas Higher Education Coordinating Board to develop and implement programs of study to facilitate secondary to postsecondary student transition.	Ongoing	FY 2019
Align secondary and postsecondary programs of study systems by working with the Texas Higher Education Coordinating Board.	Ongoing	FY 2019
Collaborate with the Texas Higher Education Coordinating Board to develop and adopt policies and procedures that facilitate consistent credit transfer from secondary to postsecondary-based programs of study.	Ongoing	FY 2019
Enhance programs of study by including statewide-articulated, Advanced Technical Credit, and Workforce Education Course Manual courses.	Ongoing	FY 2019
Provide training to secondary administrators, counselors, and teachers in the proper use of programs of study.	Ongoing	FY 2019
Collaborate with relevant state agencies to align policies related to workforce education.	Ongoing	FY 2019

Performance Measure

- Percentage of grade twelve secondary students who receive career and technical education dual credit, enroll in a two-year institution, and receive credit at the institution

System Objective

Improve and enhance services, programs, and policies to facilitate effective and efficient transitions.

Strategy

Develop and implement programs of study in community and technical colleges and align with secondary programs of study.

Partner Agency

Texas Higher Education Coordinating Board

Action**Start Date End Date**

Develop and adopt programs of study that provide a coordinated non-duplicative sequence of secondary and postsecondary academic and career and technical education courses designed to help students transition seamlessly from high school to a public community or technical college.

FY 2016 FY 2019

Expand and support program of study initiatives and adoption rate of a common group of Workforce Education Course Manual courses per discipline.

FY 2017 FY 2017

Align secondary and postsecondary programs of study systems by working with the Texas Education Agency.

FY 2018 FY 2019

Facilitate consistent credit transfer from secondary to postsecondary based on programs of study by working with the Texas Education Agency to develop and adopt relevant policies, procedures, and rules.

Ongoing FY 2019

Performance Measure

- Career and technical education time to degree

System Objective

Improve and enhance services, programs, and policies to facilitate effective and efficient transitions.

Strategy

Enhance transition services for students and youth with disabilities to competitive integrated employment or to postsecondary education and training followed by competitive integrated employment.

Partner Agency

Texas Workforce Commission

Action	Start Date	End Date
Evaluate, identify, and implement revisions to vocational rehabilitation program policy, procedures, and staffing strategies to improve consistency and effectiveness in the delivery of transition services for students and youth with disabilities.	FY 2016	FY 2016
Develop and deploy a core group of subject matter experts to assist in implementation of program improvements in transition services, including the development and coordination of training and guidance to increase staff capacity to assist students and youth with disabilities.	FY 2016	FY 2017
Collaborate with other states, providers, and system partners to develop policy, curriculum, resources, and staff capacity to enhance provision of transition services for students and youth with disabilities. [Transition services include but are not limited to career exploration, work-based learning experiences, counseling on opportunities for postsecondary education and training, job readiness skills training, and self-advocacy instruction.]	FY 2016	FY 2019

Performance Measures

- Percentage of students and youth with disabilities who participated in transition services and subsequently enrolled in postsecondary education and training
- Percentage of students and youth with disabilities who participated in transition services and subsequently entered competitive integrated employment

System Objective

Develop and implement policies and processes to ensure portable and transferrable credit and credentials.

Strategy

Ensure consistent credit transfer based on programs of study and common technical core curriculum.

Partner Agency

Texas Higher Education Coordinating Board

Action	Start Date	End Date
Solicit input from business and industry in the identification of essential knowledge, skills, and abilities required for each program of study.	Ongoing	FY 2019
Conduct discipline-specific workshops with faculty to identify common program-level learning outcomes and common sequences of courses.	FY 2016	FY 2019
Publish statewide programs of study on the Texas Higher Education Coordinating Board's websites, distribute widely to other state agencies, and link to other career and technical education and workforce activities.	FY 2016	FY 2019
Revise existing rules, policies, and protocols to include adoption of programs of study.	FY 2016	FY 2016
Reduce number of Workforce Education Course Manual courses offered at only one or two colleges.	FY 2018	FY 2019

Performance Measure

- Percentage of community and technical college students who receive program of study-based course credit who transfer to another two-year institution and have that credit recognized

System Objective

Develop and implement policies and processes to ensure portable and transferrable credit and credentials.

Strategy

Expand career and technical education courses to provide additional opportunities for dual credit.

Partner Agency

Texas Juvenile Justice Department

Action	Start Date	End Date
Contact local community colleges and technical schools to broker working relationships and begin discussions regarding dual credit opportunities.	FY 2016	FY 2016
Meet with community college and technical school representatives to outline requirements needed to assess dual credit opportunities.	FY 2016	FY 2016
Gather and provide teacher credential and other information and material request.	FY 2016	FY 2016
Coordinate and host meetings between instructors of eligible career and technical education programs and college or technical school representatives to address curriculum and data reporting.	FY2016	FY 2016
Implement dual credit courses for eligible students.		Timeline: upon completion of instructor accreditation by the Commission on Colleges of the Southern Association of Colleges and Schools.

Performance Measures

- Percentage of career and technical education programs approved for dual credit
- Percentage of students successfully completing dual credit career and technical education courses

TEA APPENDIX 4:
Statewide Program of Study Overview and Framework Documents



Programs of Study Overview

The Division of College, Career, and Military Preparation has engaged members of the workforce, secondary education, and higher education to advise on the development of programs of study, including coherent sequences of courses, industry-based certifications, and work-based learning to ensure students are prepared for in-demand, high-skill, high-wage careers in Texas.

The proposed programs of study go into effect for the 2020-2021 school year and will allow Texas to meet the federal program approval requirements within the Strengthening CTE for the 21st Century Act (Perkins V).

Highlights of Programs of Study Initiative

- Include occupations that meet labor market criteria to include projected job growth, annual job openings, and the state median wage
- Ensure course sequences provide district and campus flexibility in program offerings
- Lead to postsecondary education and training opportunities
- Expand opportunities for students to engage in STEM related occupations
- Include one-page resources to assist in scheduling as well as career planning conversations with students
- Allow districts to request regional programs of study supported by regional workforce data
- Align programs of study to endorsements

Benefits of Programs of Study Initiative

- Align education to the diverse needs of the Texas' economy to increase opportunities for students
- Improve data collection and reporting of CTE concentrators for districts
- Inform future TEKS revisions through gap analysis between course standards and job skills
- Ensure alignment of teacher certifications to the updated programs of study

Programs of Study Implementation Considerations

- Course sequences within each program of study will be used for federal reporting of CTE concentrators CTE completers:
 - New federal definition for a CTE concentrator, as outlined in Perkins V, is the completion of two courses (for two or more credits) within a program of study.
 - Proposed definition for a CTE completer to be the completion of three or more courses for four or more credits including one level 3 or level 4 course.
- Perkins funds can be used to support statewide or approved regional programs of study.
- Current CTE courses not included in the updated programs of study will remain available for districts to offer and can be supported with State CTE funds.



Programs of Study Overview

Programs of Study Definition

Perkins V describes a program of study as a coordinated, nonduplicative sequence of academic and technical content at the secondary and postsecondary level that:

- Incorporates challenging state academic standards
- Addresses academic, technical, and employability skills
- Aligns with the needs of industries in the state, regional, and/or local economy
- Progresses in specificity, beginning with all aspects of industry and leading to more occupation specific instruction
- Has multiple entry and exit points that incorporate credentialing
- Culminates in the attainment of a recognized postsecondary credential

Changes to Career Clusters:

Labor market analysis identified several areas where occupations and postsecondary training overlap across career clusters. The areas of overlap include Business, Marketing, and Finance as well as Law, Public Safety, Corrections, and Security and Government and Public Administration. A new Energy career cluster was created to address Texas' diverse economic landscape. Changes to the career clusters are summarized below:

16 Career Clusters	Change to career cluster
Agriculture, Food, & Natural Resources	No Change
Architecture & Construction	No Change
Arts, A/V Technology, & Communications	No Change
Business Management & Administration	Combined with Marketing and Finance
Government & Public Administration	Combined with Law and Public Safety
Education & Training	No Change
Finance	Combined with Marketing and Business
Health Science	No Change
Hospitality & Tourism	No Change
Human Services	No Change
Information Technology	No Change
Law, Public Safety, Corrections, & Security	Combined with Government
Manufacturing	No Change
Marketing	Combined with Business and Finance
STEM	No Change
Transportation, Distribution, & Logistics	No Change



Programs of Study Overview

Programs of Study Methodology

The TEA conducted a process to identify high wage, high demand occupations in Texas to ensure alignment between industry and postsecondary education. The process included stakeholders from the Texas Workforce Commission, Texas Workforce Investment Council, and the Texas Higher Education Coordinating Board. The course sequencing methodology backwards-mapped occupations from job knowledge and skill demand, through postsecondary preparation (college, trade schools, certifications, etc.), to secondary education and triangulated data sources for the best results of labor projections alongside real-time labor data.

Phase I: Foundation occupations were identified utilizing median growth rate of 17%, median annual salary of \$35,339, and a minimum annual openings floor of 500, each based on the data from all occupations in Texas. Occupations that were related to the foundation occupations were identified to form groupings of occupations and initial focus for programs of study.

Phase II: Groupings of occupations were formed based on: similarities in detailed work activities; directly or closely related postsecondary training and education programs; or directly or closely related through standard occupational classification by ONET. These groupings of occupations were compared to the median data of all occupations in Texas.

Data sources include [EMSI](#) data (real-time labor market information), labor projections, Local Workforce Boards Targeted Occupations, and the Bureau of Labor Statistics.

Considerations for Endorsement Alignment

The statewide programs of study contain course sequences that lead to endorsements. This initiative does not replace endorsements but adds additional support to ensure students have access to CTE programs that lead to in-demand, high-skills, and high-wage occupations. Recommended endorsements are identified on the programs of study resource documents. It remains important for districts to advise students on earning an endorsement. While current rules are in place, future recommendations will be made to the SBOE regarding the following items:

- Allow for additional STEM focused programs of study to qualify for the STEM endorsement
- Allow for innovative courses to serve as the final course in a sequence to earn an endorsement
- Allow for the proposed Practicum in Entrepreneurship course to meet endorsements across multiple career clusters



COURSES

LEVEL 1

Principles of Agriculture, Food, and Natural Resources

LEVEL 2

Professional Standards in Agribusiness
Professional Communications

LEVEL 3

Agribusiness Management and Marketing/Lab

LEVEL 4

Agricultural Leadership, Research, and Communications
Practicum in Agriculture, Food, and Natural Resources
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
	Certified Professional Public Buyer	Agricultural Business and Management, General		
		Banking and Financial Support Services	Finance, General	
		Advertising	Financial Mathematics	
		Marketing/ Marketing Management, General		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Farmers, Ranchers, and Other Agricultural Managers	\$59,134	405	9%
Farm and Ranch Loan Officers	\$45,594	268	25%
Agricultural Advertising and Promotions Managers	\$94,515	164	20%
Buyers and Purchasing Agents, Farm Products	\$46,488	102	20%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Tour a farm machinery products company
Texas FFA

Work Based Learning Activities:
Internship with a farm machinery products company;
Work on a farm or ranch

The Agribusiness program of study explores the occupations and educational opportunities associated with the business of farming and agriculturally-related business that supplies farm inputs, such as machinery and seeds. This program of study may also include exploration into the marketing of farm products, the purchase of farm products either for further processing or resale, and grading or classifying unprocessed food or other agricultural products.

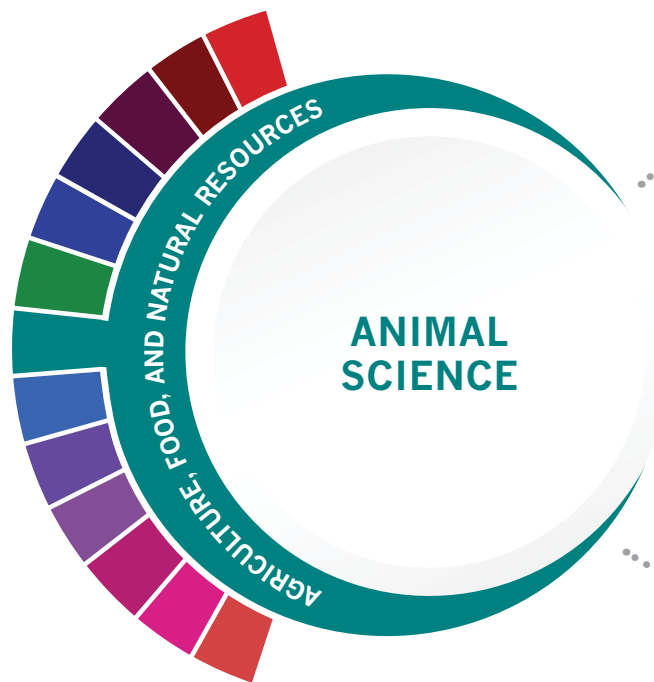


The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist. It also includes non-traditional agricultural occupations like wind energy, solar energy, and oil and gas production.

Successful completion of the Agribusiness program of study will fulfill requirements of a Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Agriculture, Food, and Natural Resources

LEVEL 2

Small Animal Management
Equine Science

LEVEL 3

Livestock Production/Lab

LEVEL 4

Advanced Animal Science
Veterinary Medical Applications/Lab
Practicum in Agriculture, Food, and Natural Resources
Project-Based Research
Scientific Research and Design

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Licensed Veterinary Technician	Pet Groomer	Food Science and Technology	Animal Sciences	Genetics
Feedyard Technician in Cattle Care and Handling	Veterinary Technician	Veterinary Studies	Agriculture	Veterinary Medicine
Certified Veterinary Assistant	Licensed Breeder	Biotechnology Laboratory Technician	Biology	Biological and Physical Sciences
		Biology Technician	Zoology/ Animal Biology	Biological and Biomedical Sciences

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Animal Breeders	\$39,135	28	9%
Animal Scientists	\$57,533	22	12%
Medical Scientists	\$63,898	435	27%
Veterinarians	\$93,496	294	24%
Zoologists and Wildlife Biologists	\$67,309	45	32%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Texas FFA

Work Based Learning Activities:
Agri-Science Fair
4H
Volunteer at a local farm or veterinary office

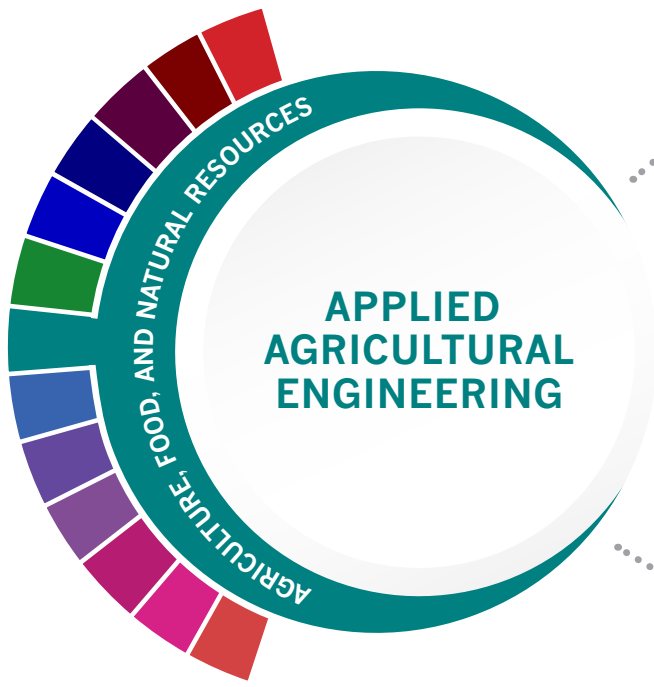
The Animal Science program of study focuses on the science, research, and business of animals and other living organisms. It teaches students how to apply biology and life science to real-world life processes of animals and wildlife, either in laboratories or in the field, which could include a veterinary office, a farm or ranch, or any outdoor area harboring animal life. Students may also research and analyze the growth and destruction of species and research or diagnose diseases and injuries of animals.



The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist.

Successful completion of the Animal Science program of study will fulfill requirements of the Business and Industry Endorsement. Approved Statewide Program of Study - September 2019





COURSES

- LEVEL 1**
Principles of Agriculture, Food, and Natural Resources

- LEVEL 2**
Agricultural Mechanics and Metal Technologies/Lab

- LEVEL 3**
Agricultural Structures Design and Fabrications/Lab
Agricultural Power Systems/Lab
Geographic Information Systems for Agriculture (TBD)

- LEVEL 4**
Agricultural Equipment Design and Fabrication/Lab
Practicum in Agriculture, Food, and Natural Resources
Project-Based Research
Scientific Research and Design

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
OSHA 30 Hour General Industry	Certified Professional Agronomist	Heavy Equipment Maintenance Technology/Technician	Agricultural Engineering	
Feedyard Technician in Machinery, Operation, Repair and Maintenance	Certified Reliability Engineer	Agricultural Mechanization, General	Agricultural Mechanization, General	
AWS SENSE Welding Level 1	Certified Irrigation Designer	Small Engine Mechanics and Repair Technology/Technician		
AWS D1.1 or D9.1 Certification	Fluid Power Mobile Hydraulic Mechanic	Welding Technology/Welder		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Outdoor Power Equipment and Other Small Engine Mechanics	\$32,406	366	16%
Welders	\$41,350	6,171	9%
Farm Equipment Mechanics and Service Technicians	\$39,915	304	17%
Mobile Heavy Equipment Mechanics	\$47,299	1,627	16%
Agricultural Engineers	\$64,792	9	13%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Tour a farm products or machinery plant
Texas FFA

Work Based Learning Activities:
Earn a welding certification; intern at a farm products or machinery plant

The Applied Agricultural Engineering program of study explores the occupations and educational opportunities associated with applying knowledge of engineering technology and biological science to agricultural problems concerned with power and machinery, electrification, structures, soil and water conservation, and processing agricultural products. This program of study may also include exploration into diagnosing, repairing, or overhauling farm machinery and vehicles, such as tractors, harvesters, dairy equipment, and irrigation systems.



The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist. It also includes non-traditional agricultural occupations like wind energy, solar energy, and oil and gas production.

Successful completion of this program of study will fulfill requirements of a Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Agriculture, Food, and Natural Resources

LEVEL 2

Wildlife, Fisheries, and Ecology Management/Lab
Forestry and Woodland Ecology Systems/Lab

LEVEL 3

Range Ecology Management/Lab
Energy and Natural Resources Technology/Lab

LEVEL 4

Advanced Energy and Natural Resource/Lab
Practicum in Agriculture, Food, and Natural Resources
Project-Based Research
Scientific Research and Design

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Wastewater Collections, Class 1	Board Certified Environmental Engineer - Hazardous Waste Management	Environmental Science		
Water Operators, Class D	Certified Water Technologist	Environmental Studies	Environmental/Environmental Health Engineering	
OSHA Hazardous Waste Operations and Emergency Response	Certified Environmental Scientist	Wildlife, Fish, and Woodlands Science and Management		
	Certified in Public Health	Environmental Engineering Technology/Environmental Technology	Natural Resources Law Enforcement and Protective Services	Fishing and Fisheries Science and Management
Additional industry based certification information is available from the TEA CTE website.				
For more information on postsecondary options for this program of study, visit TXCTE.org.				

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Environmental Engineering Technicians	\$53,352	101	32%
Environmental Engineers	\$86,757	288	25%
Environmental Science and Protection Technicians, Including Health	\$40,268	508	17%
Environmental Scientists and Specialists, Including Health	\$77,896	644	24%
Zoologists and Wildlife Biologists	\$67,309	45	32%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Attend summer leadership events
Texas FFA

Work Based Learning Activities:
Intern at a waste treatment plant

The Environmental and Natural Resources program of study explores the occupations and educational opportunities associated with the research, design, and planning of engineering or technical duties in the prevention and control of environmental hazards. This program of study may also include exploration into conducting research for the purpose of identifying, abating, or eliminating sources of pollutants or hazards that affect either the environment or the health of the population.



The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist. It also includes non-traditional agricultural occupations like wind energy, solar energy, and oil and gas production.

Successful completion of the Environmental and Natural Resources program of study will fulfill requirements of a Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019



COURSES

LEVEL 1

Principles of Agriculture, Food, and Natural Resources

LEVEL 2

Food Technology and Safety/Lab

LEVEL 3

Food Processing/Lab

LEVEL 4

Practicum in Agriculture, Food, and Natural Resources
Project Based Research
Scientific Research and Design

FOOD SCIENCE AND TECHNOLOGY

AGRICULTURE, FOOD, AND NATURAL RESOURCES

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
	Certified Professional Agronomist	Food Science	Agricultural and Food Products Processing	Quality Control Technology/Technician
	Certified Crop Advisor		Food Science and Nutrition	
	Certified Weighing Salespersons		Food Science and Technology	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Agricultural and Food Science Technicians	\$34,382	236	11%
Supervisors of Production and Operating	\$62,171	5,094	9%
Inspectors, Testers, Sorters, Samplers, and Weighers	\$37,689	6653	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Tour a food products processing facility
Texas FFA

Work Based Learning Activities:

Intern at a food products processing facility

The Food Science and Technology program of study explores the occupations and educational opportunities associated with working with agricultural and food scientists in food, fiber, and animal research, production, and processing. This program of study may also include assisting with animal breeding and nutrition, and conducting tests and experiments to improve yield and quality of crops or to increase the resistance of plants and animals to disease or insects.



The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist. It also includes non-traditional agricultural occupations like wind energy, solar energy, and oil and gas production.

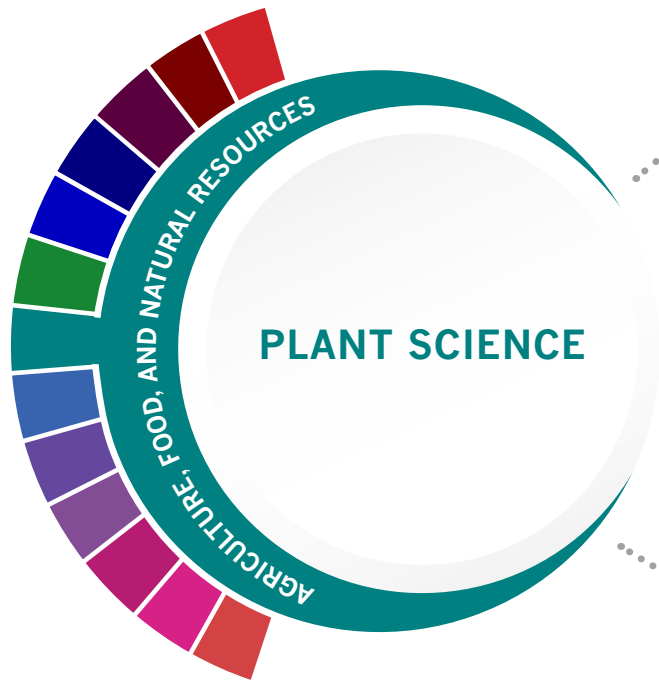
Successful completion of the Food Science and Technology program of study will fulfill requirements of a Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

I-287



COURSES



LEVEL 1

Principles of Agriculture, Food, and Natural Resources

LEVEL 2

Landscape Design and Management
Turf Grass Management
Greenhouse Operation and Production/Lab

LEVEL 3

Floral Design/Lab
Horticultural Science/Lab
Viticulture

LEVEL 4

Practicum in Agriculture, Food, and Natural Resources
Advanced Plant and Soil Science
Advanced Floral Design
Project-Based Research
Scientific Research and Design

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Landscape Irrigation Technician License	Pesticide Applicator	Applied Horticulture/ Horticulture Operations, General		
Commercial/ Noncommercial Pesticide Applicator	Certified Floral Designer	Ornamental Horticulture	Agronomy and Crop Science	
Texas State Floral Association Level One Floral Certification	Accredited Member of AIFD	Agricultural Business and Management, General		
Texas State Floral Association Level Two Floral Certification	Landscape Industry Certified Technician	Turf and Turfgrass Management	Farm/Farm and Ranch Management	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Soil and Plant Scientists	\$54,662	116	21%
Tree Trimmers and Pruners	\$32,240	589	14%
Pesticide Handlers, Sprayers, and Applicators	\$36,733	196	22%
Landscaping Supervisors	\$44,408	807	19%
Biological Technicians	\$42,931	452	17%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Texas FFA

Work Based Learning Activities:
Work part-time at a florist;
start or work for a local landscaping business

The Plant Science program of study focuses on the science, research, and business of plants and other living organisms. It teaches students how to apply biology and life science to real-world life processes of plants and vegetation, either in laboratories or in the field.

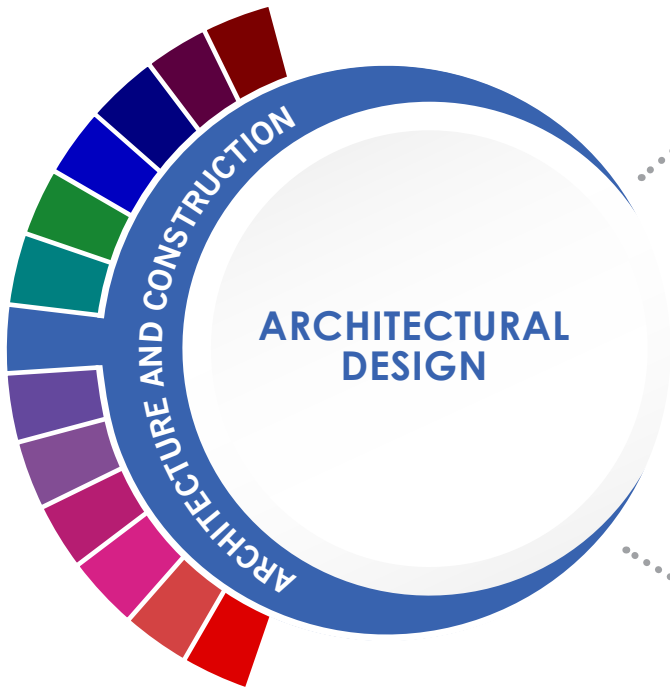


The Agriculture, Food, and Natural Resources (AFNR) Career Cluster® focuses on the essential elements of life—food, water, land, and air. This career cluster includes a diverse spectrum of occupations, ranging from farmer, rancher, and veterinarian to geologist, land conservationist, and florist. It also includes non-traditional agricultural occupations like wind energy, solar energy, and oil and gas production.

Successful completion of the Plant Science program of study will fulfill requirements of a Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Architecture

LEVEL 2

Architectural Design I
Interior Design I
Computer Aided Drafting for Architecture (TBD)

LEVEL 3

Architectural Design II
Interior Design II
Civil Engineering and Architecture (PLTW)

LEVEL 4

Practicum in Architectural Design
Career Preparation I

HIGH SCHOOL / INDUSTRY CERTIFICATION	CERTIFICATE / LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S / DOCTORAL PROFESSIONAL DEGREE
Autodesk Certified Professional or User in AutoCAD	Certified Photogrammetric Technologist	Architecture		
Autodesk Certified Professional or User in AutoCAD Civil 3D	Certified Development, Design & Construction Professional	Interior Design	Interior Architecture	
Autodesk Certified Professional or User in Autodesk Revit Architecture	National Council Certified Interior Designer	Civil Engineering, General		
Autodesk Certified Professional or User in Autodesk Revit MEP Electrical	LEED AP Building Design & Construction	Geographic Information Science and Cartography		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Architects	\$77,043	808	16%
Geographic Information Analysts and Surveyors	\$58,926	162	27%
Architectural/Civil Drafters	\$50,170	1,068	9%
Construction Managers	\$87,402	2,401	14%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Shadow an architect, interior designer, or civil engineer.
SkillsUSA

Work Based Learning Activities:

Intern at an architecture firm.

The Architectural Design program of study explores the occupations and educational opportunities associated with developing, engineering, and designing building structures and facilities. This program of study may also include exploration into collecting and interpreting geographic information, researching and preparing maps, and interior design.

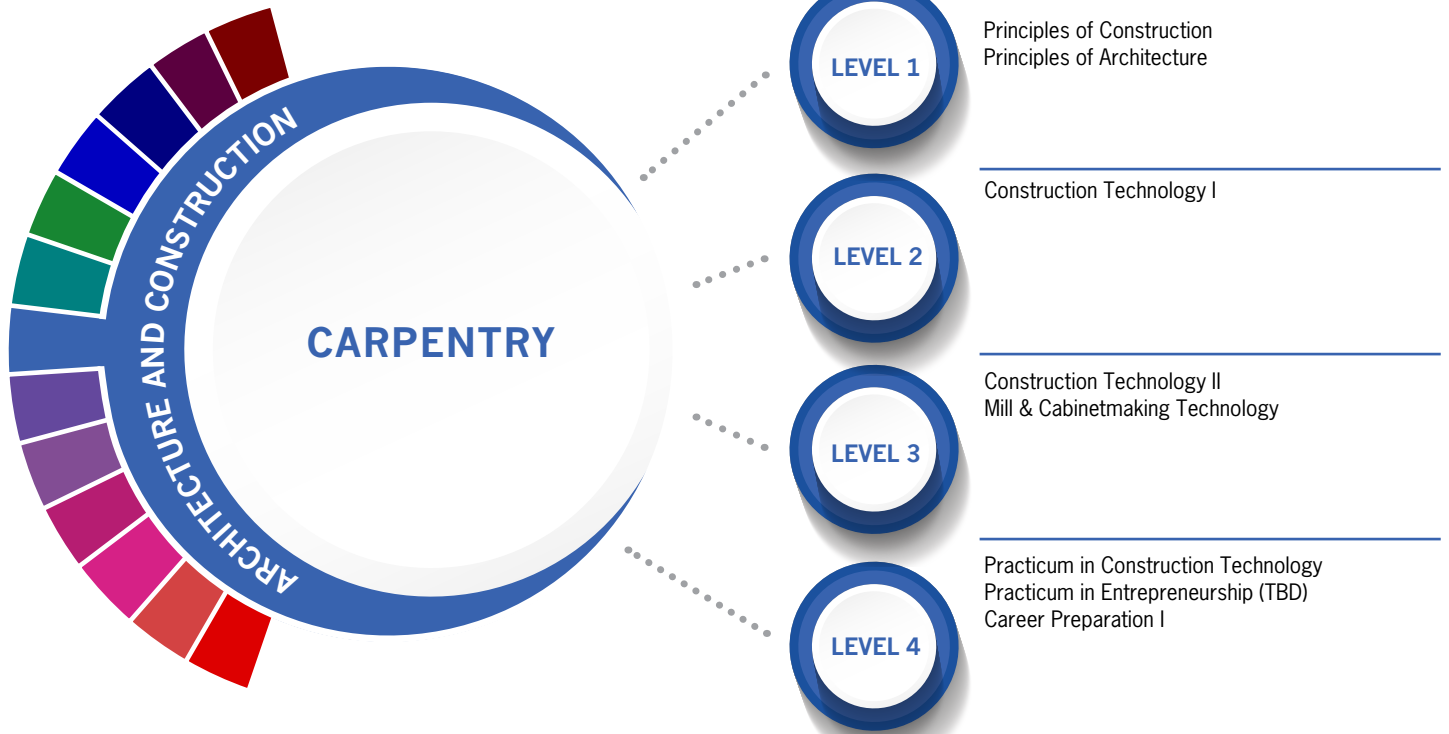


The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Construction Design program of study will fulfill requirements of the Business and Industry Endorsement. Approved Statewide Program of Study - September 2019



COURSES



HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
NCCER Carpentry, Level 1 & 2	Certified Lead Carpenter	Carpentry/ Carpenter	Construction Science	Construction Management
NCCER Commercial Carpenter	Certified Installer	Industrial Mechanics and Maintenance Technology		
NCCER Core Curriculum	Certified Door Consultant			
NCCER Construction Technology	Fluid Power Connector and Conductor			

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Carpenters	\$35,922	5,031	26%
Cost Estimators	\$63,939	2,239	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Shadow a carpenter or millwright.
SkillUSA

Work Based Learning Activities:
Obtain an NCCER certification in Millwright Level 1 or Carpentry Level 1.

The Carpentry program of study explores the occupations and educational opportunities related to constructing, installing, or repairing structures and fixtures made of wood, such as concrete forms (including frameworks, partitions, joists, studding, rafters, and stairways). This program of study may also include exploration into installing, dismantling, or moving machinery and heavy equipment according to layout plans, blueprints, or other drawings.



The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Carpentry program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Construction

LEVEL 2

Building Maintenance Technology I
Construction Management I

LEVEL 3

Building Maintenance Technology II
Construction Management II

LEVEL 4

Practicum in Construction Management
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
NCCER Construction Technology	Code Enforcement Officer, Texas Department of Health Code Enforcement	Construction Engineering Technology/Technician		Materials Engineering
NCCER Core Curriculum	Certified Cost Estimator/ Analyst	Business Administration and Management, General		
OSHA 30 Hour Construction	Certified Professional Estimator	Mechanical Engineering		
NCCER Construction Site Safety Technician	Structural Masonry Special Inspector	Business/Commerce, General	Manufacturing Engineering	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Construction and Building Inspectors	\$53,914	983	17%
Cost Estimators	\$53,939	2,239	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Shadow a building
inspector or cost
estimator
SkillsUSA

**Work Based Learning
Activities:**

Intern with a construction
company shadowing project
managers or inspectors

The Building Codes and Inspection program of study explores the occupations and educational opportunities associated with cost estimates for construction projects or services to aid management in bidding on or determining the price of products or services. This program of study may also include exploration into inspecting structures using engineering skills to determine structural soundness and compliance with specifications, building codes, and other regulations.



The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Building Codes and Inspection program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES

Principles of Construction

LEVEL 1

Electrical Technology I

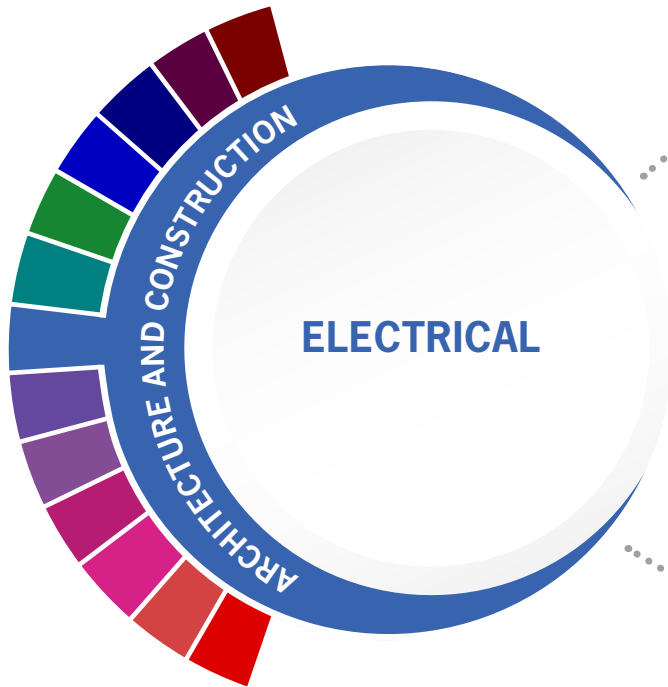
LEVEL 2

Electrical Technology II

LEVEL 3

Practicum in Construction Technology
Practicum in Entrepreneurship (TBD)
Career Preparation I

LEVEL 4



HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE	OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
NCCER Electrical, Level 1 & 2	Electrical Plans Examiner	Electrician	Construction Science	Construction Management	Electrical Linemen	\$54,184	1,314	28%
NCCER Electronic Systems Technician, Level 1 & 2	Certified Electrical Inspector - Master	Communications Systems Installation and Repair Technology			Electricians	\$44,013	8,460	21%
Electrical Apprenticeship Certificate, Level 1	Fiber Optics Technician - Outside Plant				Electrical and Electronics Installers	\$37,544	245	19%
NCCER Commercial Electrician	Certification in Fire Alarm Systems - Level 1				Security and Fire Alarm Installers	\$43,638	1,112	22%
					Telecommunication Line Installers and Repairers	\$49,150	1,228	10%
Additional industry based certification information is available from the TEA CTE website.					WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES			
For more information on postsecondary options for this program of study, visit TXCTE.org.					Exploration Activities: Shadow an electrician or fiber optics line installer SkillsUSA	Work Based Learning Activities: Intern or shadow an electrician		

The Electrical program of study explores the occupations and educational opportunities associated with installing, maintaining, and repairing electrical wiring, equipment, and fixtures. This program of study may also include exploration into installing and repairing telecommunications cable including fiber optics.

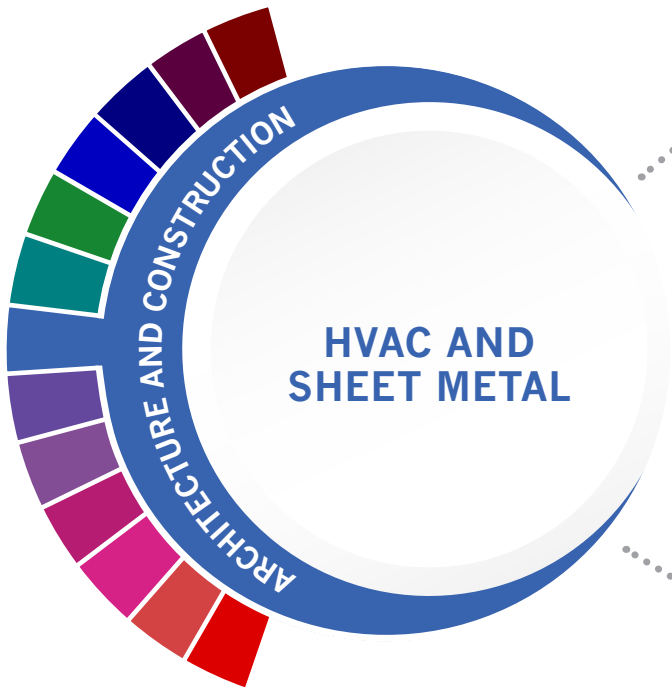


The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Electrical Program of Study will fulfill requirements of a Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Construction

LEVEL 2

Heating, Ventilation, and Air Conditioning (HVAC) and Refrigeration Technology I

LEVEL 3

Heating, Ventilation, and Air Conditioning (HVAC) and Refrigeration Technology II
Sheet Metal (TBD)

LEVEL 4

Practicum in Construction Technology
Practicum in Entrepreneurship (TBD)
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Refrigerant Handling (EPA 608)	Residential HVAC Design for Quality Installation	Business Administration and Management, General		
OSHA 30 Hour Construction	Certified Cost Technician	Mechanical Engineering		
NCCER HVAC, Level 1	Precision Sheet Metal Operator Certification	Heating, Ventilation, Air Conditioning and Refrigeration Engineering Technology/Technician	Construction Engineering Technology/Technician	Construction Engineering
NCCER Sheet Metal, Level 1	Certified Ventilation System Inspector	Business/Commerce, General		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Heating, Air Conditioning, and Refrigeration Mechanics	\$41,808	3,356	26%
Sheet Metal Workers	\$37,419	1,479	17%
Cost Estimators	\$63,939	2,239	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Shadow an HVAC worker or cost estimator
SkillUSA

Work Based Learning Activities:

Intern with a company that works with HVAC and/or sheetmetal

The HVAC and Sheet Metal program of study explores the occupations and educational opportunities associated with installing, serving, or repairing heating and air conditioning systems and also the fabrication, assembly, installation, and repair of sheet metal products and equipment, such as ducts, control boxes, drainpipes, and furnace casings. This program of study may also include exploration into preparing cost estimates for certain construction projects involving heating and air conditioning and sheet metal.

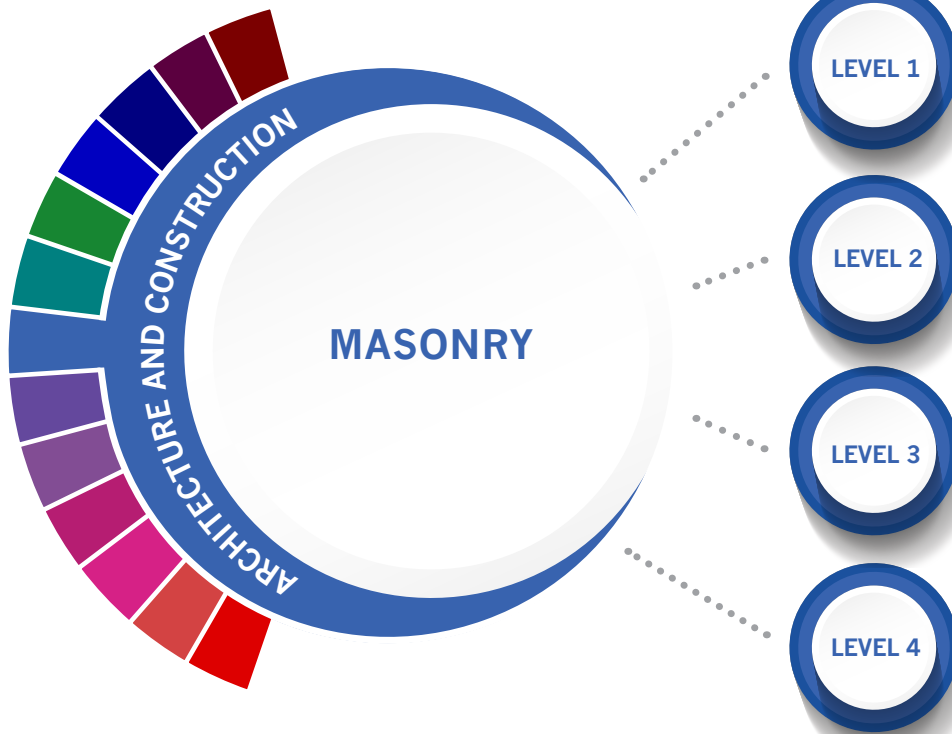


The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the HVAC and Sheet Metal program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

COURSES



LEVEL 1
Principles of Construction

LEVEL 2
Masonry Technology I

LEVEL 3
Masonry Technology II

LEVEL 4
Practicum in Masonry Technology
Practicum in Construction Technology
Practicum in Entrepreneurship (TBD)
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE	OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
NCCER Masonry, Level 1 & 2	Structural Masonry Special Inspector	Mason/ Masonry	Construction Science	Construction Management	Brickmasons and Blockmasons	\$44,013	605	47%
NCCER Core Curriculum	Structural Steel and Bolting Special Inspector				Cement Masons and Concrete Finishers	\$32,739	2,883	12%
NCCER Construction Technology, Level 1	Masonry Contractor				Cost Estimators	\$63,939	2,239	21%
NCCER Weatherization, Level 1	Masonry Field Testing Technician							

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Job shadow a brickmason, stonemason, or ironworker.
SkillsUSA

Work Based Learning Activities:

Intern with a person working within masonry.

The Masonry program of study explores the occupations and educational opportunities related to laying and binding materials, such as brick, structural tile, concrete block, and other types of mortar and substances to construct or repair walls and other structures. This program of study may also include exploration into raising and uniting iron or steel to form completed structures or structural frameworks, and building structures using stone.

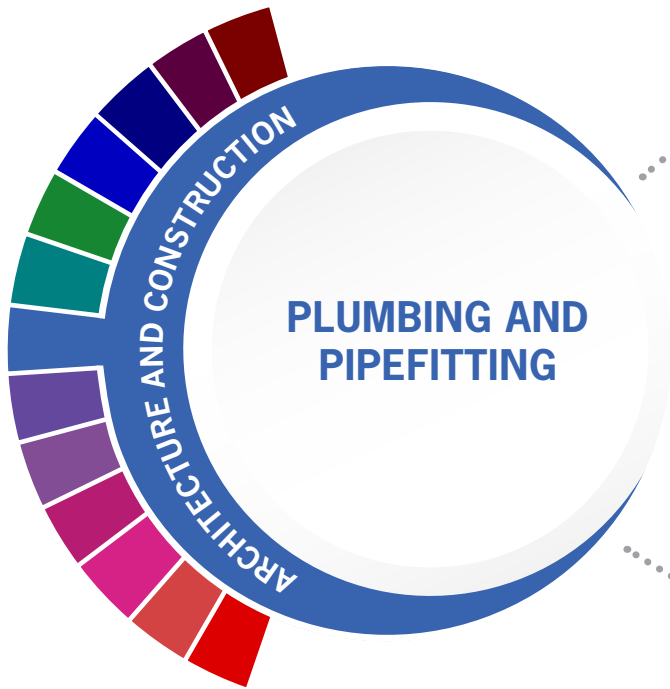


The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Masonry program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Construction
Introduction to Welding

LEVEL 2

Plumbing Technology I
Pipefitting Technology I

LEVEL 3

Plumbing Technology II
Pipefitting Technology II

LEVEL 4

Practicum in Construction Technology
Practicum in Entrepreneurship (TBD)
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
NCCER Pipefitting, Level 1	Commercial Plumbing Inspector	Plumbing Technology/ Plumber	Construction Science	Construction Management
NCCER Plumbing, Level 1 & 2	Journey Level Pipefitter- Steamfitter	Electrical and Power Transmission Installation/ Installer, General	Operations Management and Supervision	
NCCER Construction Technology	Plumbing Plans Inspector	Pipefitting/ Pipefitter and Sprinkler Fitter		
Tradesman Plumber - Limited License	Certified Service Manager	High Performance and Custom Engine Technician/ Mechanic		

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Mechanics, Installers, and Repairers	\$63,710	4,243	17%
Plumbers, Pipefitters and Steamfitters	\$44,928	5,765	23%
Helpers-Pipelayers, Plumbers, Pipefitters, and Steamfitters	\$30,098	1,567	18%
Pipe Installers	\$31,616	802	21%

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit
TXCTE.org.

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Job shadow a plumber,
pipefitter, or steamfitter
SkillsUSA

**Work Based Learning
Activities:**
Obtain a Core Curriculum
NCCER certification in
Pipefitting Level 1 or
Plumbing Level 1

The Plumbing and Pipefitting program of study explores the occupations and educational opportunities related to assembling, installing, or repairing pipes, fittings, or fixtures of heating, water, or drainage systems. This program of study may also include exploration into maintaining pipe supports or related hydraulic or pneumatic equipment for steam, hot water, heating, cooling, lubricating, sprinkling, or industrial production or processing systems.

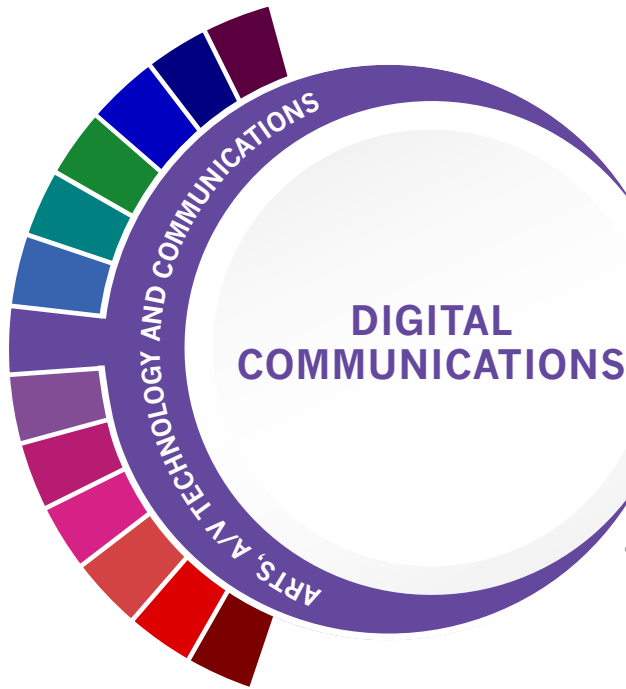


The Architecture and Construction Career Cluster® focuses on designing, planning, managing, building, and maintaining the built environment. Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management.

Successful completion of the Plumbing and Pipefitting Program of Study will fulfill requirements of a Business and Industry
Endorsement.

Approved Statewide Program of Study - September 2019

COURSES



LEVEL 1

Principles of Arts, A/V Technology, and Communications
Professional Communications
Web Communications
Digital Communications in the 21st Century

LEVEL 2

Audio/Video Production/Lab
Digital Audio Technology

LEVEL 3

Audio Video Production II/Lab
Digital Audio Technology II

LEVEL 4

Practicum of Audio/Video Production
Practicum of Digital Audio (TBD)
Practicum of Entrepreneurship (TBD)

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Apple Final Cut Pro X	Certified Video Engineer	Recording Arts Technology/Technician		Communications Technology/Technician
Apple Logic Pro X	Commercial Audio Technician	Cinematography and Film/Video Production		
Adobe Certified Associate Premiere Pro	Certified AM Directional Specialist	Radio and Television Broadcasting Technology/Technician	Radio and Television	
Adobe Certified Associate Certifications	Certified Broadcast Radio Engineer	Music Technology	Agricultural Communication/Journalism	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Sound Engineering Technicians	\$39,562	79	27%
Camera Operators, Television, Video and Motion Picture	\$50,024	129	9%
Audio and Video Equipment Technicians	\$40,581	757	29%
Film and Video Editors	\$47,382	118	23%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Shadow a production team
SkillsUSA, TSA

Work Based Learning Activities:
Intern at a local television station or video production company

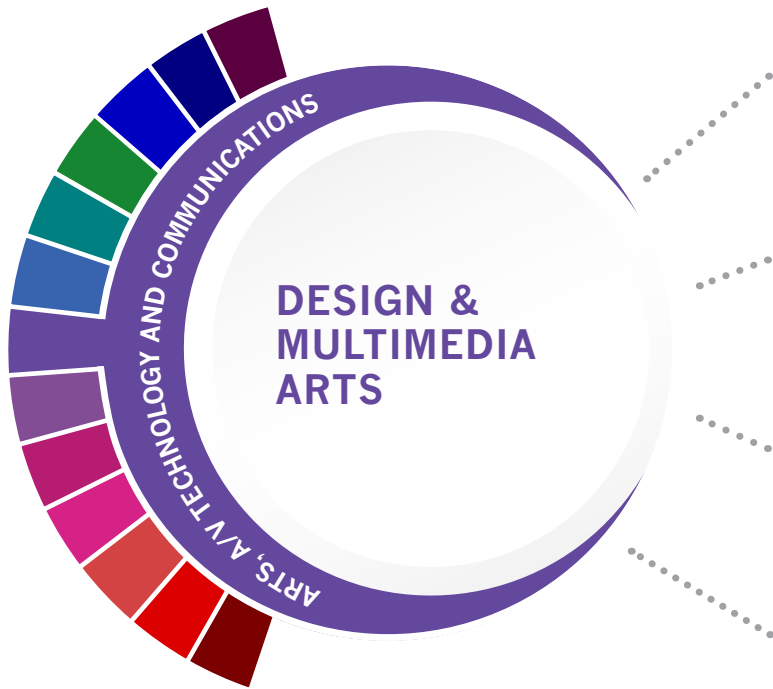
The Digital Communications program of study explores the occupations and educational opportunities associated with the production of audio and visual media formats for various purposes, such as TV broadcasts, advertising, video production, or motion pictures. This program of study may also include exploration into operating machines and equipment to record sound and images, such as microphones, sound speakers, video screens, projectors, video monitors, sound and mixing boards, and related electronic equipment.



The Arts, A/V Technology and Communications (AAVTC) Career Cluster® focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services. Careers in the AAVTC career cluster require a creative aptitude, a strong background in computer and technology applications, a strong academic foundation, and a proficiency in oral and written communication.

Successful completion of the Digital Communications program of study will fulfill requirements of a Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019



COURSES

LEVEL 1

Principles of Arts, A/V Technology, and Communications
Video Game Design
Digital Media

LEVEL 2

Graphic Design and Illustration I/Lab
Animation I/Lab
Video Game Programming
Commercial Photography I/Lab
Fashion Design I/Lab
Digital Design and Media Productions
Game Programming and Design

LEVEL 3

Graphic Design and Illustration II/Lab
Animation II/Lab
Advanced Video Game Programming
Commercial Photography II/Lab
Fashion Design II/Lab
Digital Art and Animation
3-D Modeling and Animation

LEVEL 4

Practicum in Graphic Design and Illustration
Practicum in Animation
Practicum in Commercial Photography
Practicum in Entrepreneurship (TBD)
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Adobe Certified Associate Certifications	Certified Digital Designer	Animation, Interactive Technology, Video Graphics and Special Effects		
Adobe Certified Expert Certifications	WOW Certified Web Designer Apprentice	Graphic Design		
Apple Logic Pro X	Adobe Suite Certifications	Game and Interactive Media Design		Intermedia/Multimedia

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Graphic Designers	\$44,824	1,433	15%
Multimedia Artists and Animators	\$67,392	186	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Join a website development or coding club.
SkillsUSA, TSA

Work Based Learning Activities:

Intern with a multimedia or animation studio.
Obtain a certificate in graphic design.

The Graphic Design and Multimedia Arts program of study explores the occupations and educational opportunities associated with designing or creating graphics to meet specific commercial or promotional needs, such as packaging, displays, or logos. This program of study may also include exploration into designing clothing and accessories, and creating special effects, animation, or other visual images using film, video, computers, or other electronic tools and media, for use in computer games, movies, music videos, and commercials.



The Arts, A/V Technology and Communications (AAVTC) Career Cluster® focuses on careers in designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services. Careers in the AAVTC Career Cluster require a creative aptitude, a strong background in computer and technology applications, a strong academic foundation, and a proficiency in oral and written communication.

Successful completion of the Graphic Design & Multimedia Arts program of study will fulfill requirements of a Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019
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COURSES



LEVEL 1

Principles of Business, Marketing, and Finance
Money Matters
Business Information Management I/Lab

LEVEL 2

Accounting I
Banking and Financial Services
Financial Mathematics

LEVEL 3

Accounting II
Financial Analysis
Insurance Operations

LEVEL 4

Securities and Investments
Practicum in Business Management
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
QuickBooks Certified User	Certified Management Accountant	Real Estate	Accounting	Financial Accounting
Microsoft Office Specialist or Expert - Excel	Certified Internal Auditor	Financial, General		Business Administration
Certified Insurance Service Representative	Certified Income Specialist	Financial Planning and Services		Financial Planning
	Certified Public Accountant	Certified Income Specialist		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options
for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Accountants and Auditors	\$71,469	14,436	22%
Loan Officers	\$68,598	2,419	19%
Personal Financial Advisors	\$86,965	1,861	52%
Administrative Service Managers	\$96,138	2,277	21%
Insurance Underwriters	\$66,206	594	14%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Business Professionals
of America (BPA), Future
Business Leaders of
America (FBLA), and
DECA

**Work Based Learning
Activities:**
Internship with local
accounting firm;
Microsoft Office Specialist
(MOS) certifications

The Accounting and Financial Services program of study teaches CTE concentrators how to examine, analyze, and interpret financial records. Through this program of study, students will learn the skills necessary to perform financial services, prepare financial statements, interpret accounting records, give advice, or audit and evaluate statements prepared by others. This program of study will also introduce students to mathematical modeling tools.



The Business, Marketing, and Finance Career Cluster® focuses on careers in planning, organizing, directing, and evaluating business functions essential to efficient and productive business operations.

Successful completion of the Accounting & Financial Services program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Business, Marketing, and Finance
Business Information Management I/Lab

LEVEL 2

Business Law
Virtual Business
Business Information Management II/Lab

LEVEL 3

Business Management
Global Business
Human Resources Management

LEVEL 4

Statistics and Business Decision Making
Practicum in Business Management
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Microsoft Office Specialist or Expert - Excel	Certified Records Manager	Business Administration		
Microsoft Office Specialist or Expert - Word	Certified Facility Manager	Business/ Commerce		Business Management
Google Cloud Certified Professional - G-Suite	Certified Commercial Contracts Manager	Public Administration		
Certified Associate in Project Management	Teradata 14 Basics/ Certified Technical Specialist	Business Management	Management Science	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Administrative Service Managers	\$96,138	2,277	21%
Management Analysts	\$87,651	4,706	32%
General and Operations Managers	\$107,640	18,679	20%
Operations Research Analysts	\$78,083	1,128	38%
Supervisors of Administrative Support Workers	\$57,616	14,982	20%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Business Professionals of America (BPA),
Future Business Leaders of America (FBLA), and
DECA

Work Based Learning Activities:
Internship with local business or chamber of commerce;

The Business Management program of study teaches CTE concentrators how to plan, direct, and coordinate the administrative services and operations of an organization. Through this program of study, students will learn the skills necessary to formulate policies, manage daily operations, and allocate the use of materials and human resources. This program of study will also introduce students to mathematical modeling tools and organizational evaluation methods.



The Business, Marketing, and Finance Career Cluster® focuses on careers in planning, organizing, directing, and evaluating business functions essential to efficient and productive business operations.

Successful completion of the Business Management program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

COURSES



LEVEL 1

Principles of Business, Marketing, and Finance
Business Information Management I/Lab

LEVEL 2

Entrepreneurship

LEVEL 3

Mobile Application Development
Entrepreneurship II (TBD)

LEVEL 4

Practicum in Business Management
Practicum in Marketing
Practicum in Entrepreneurship (TBD)
Project-Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE	OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Microsoft Office Expert - Excel	Certified Facility Manager	Business Administration and Management			General and Operations Managers	\$107,640	18,679	20%
Microsoft Office Expert - Word	Certified Management Accountant	Business/ Commerce			Management Analysts	\$87,651	4,706	32%
Entrepreneurship and Small Business	Certified Project Consultant	Public Administration			Managers, All Others	\$113,110	1,794	26%
	Accredited Management Consultant	Business Management	Management Science		WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES			
Additional industry based certification information is available from the TEA CTE website.					Exploration Activities: Business Professionals of America (BPA), Future Business Leaders of America (FBLA), and DECA	Work Based Learning Activities: Internship with local management consulting firm		
For more information on postsecondary options for this program of study, visit TXCTE.org.								

The Entrepreneurship program of study teaches CTE concentrators how to plan, direct, and coordinate the management and operations of public or private sector organizations. Through this program of study, students will learn the skills necessary to formulate policies, manage daily operations, analyze management structures, and plan for the use of materials and human resources.



The Business, Marketing, and Finance Career Cluster® focuses on careers in planning, organizing, directing, and evaluating business functions essential to efficient and productive business operations.

Successful completion of the Entrepreneurship program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

- LEVEL 1**
Principles of Business, Marketing, and Finance

- LEVEL 2**
Fashion Marketing
Sports and Entertainment Marketing
Virtual Business
Marketing (TBD)

- LEVEL 3**
Social Media Marketing
Advertising
Retail Management
Sports and Entertainment Marketing II
Statistics and Business Decision Making
Fundamentals of Real Estate

- LEVEL 4**
Advanced Marketing
Practicum in Marketing
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL / INDUSTRY CERTIFICATION	CERTIFICATE / LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S / DOCTORAL PROFESSIONAL DEGREE
Microsoft Office Specialist or Expert - Excel	Certified Product Manager	Marketing/Marketing Management, General		Marketing
Microsoft Office Specialist or Expert - Word	DMA Certified Marketing Professional	Consumer Merchandising/Retailing Management	Business Administration	
Google Analytics Individual Qualification	Certified Salesperson	International Marketing	Applied Economics	
Entrepreneurship and Small Business	Real Estate Appraiser	Business	Marketing Research	Advertising

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Marketing Research Analysts and Marketing Specialists	\$70,346	4,664	40%
Insurance Sales Agents	\$43,181	5,886	30%
First-Line Supervisors of Retail Sales Workers	\$72,550	2,826	15%
Wholesale and Retail Buyers	\$51,106	1,299	19%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Business Professionals of America (BPA), Future Business Leaders of America (FBLA), and DECA

Work Based Learning Activities:

Internship with local marketing firm; shadow a real estate agent; operate a school store on campus

The Marketing and Sales program of study teaches CTE concentrators how to collect information to determine potential sales of a product or service and/or create a marketing campaign to market or distribute goods and services. Through this program of study, students will learn the skills necessary to understand and apply data on customer demographics, preferences, needs, and buying habits.



The Business, Marketing, and Finance Career Cluster® focuses on careers in planning, organizing, directing, and evaluating business functions essential to efficient and productive business operations.

Successful completion of the Marketing and Sales program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Education and Training
Principles of Human Services

LEVEL 2

Child Development
Child Development Associate Preparation Course (TBD)

LEVEL 3

Child Guidance

LEVEL 4

Practicum in Early Learning (TBD)
Project Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
	Child Development Associate	Early Childhood Education and Teaching		
Educational Aide I	Texas Educator Certification Program	Multicultural Early Childhood Development		
	County Librarian	Kindergarten/Preschool Education and Training	Early Childhood	Educational, Instructional, and Curriculum Supervision
	Professional Counselor	Psychology/Sociology		Educational Leadership and Administration

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Kindergarten Teachers, except Special Education	\$53,310	1,848	17%
Preschool Teachers	\$27,851	4,330	17%
Special Education Teachers, Preschool	\$55,670	148	27%
Elementary School Teachers	\$54,140	13,121	16%
Education Administrators, Elementary and Secondary School	\$79,830	2,407	16%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Texas Association of Future Educators; Family, Career, & Community Leaders of America

Work Based Learning Activities:

Teach a community education class; volunteer as a teaching assistant.

The Early Learning program of study focuses on early childhood education, which consists of instructing and supporting preschool and early elementary school students in activities that promote social, physical and intellectual growth as well as in basic elements of science, art, music, and literature. This program of study introduces CTE concentrators to tasks necessary for planning, directing, and coordinating activities for young children.



The Education and Training Career Cluster® focuses on planning, managing, and providing education and training services and related learning support services. All parts of courses are designed to introduce learners to the various careers available within the Education and Training career cluster.

Successful completion of the Early Learning program of study will satisfy the requirements for the Public Service Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Education and Training
Principles of Human Services

LEVEL 2

Human Growth and Development
Child Development
Communication and Technology in Education (TBD)

LEVEL 3

Instructional Practices
Special Populations (TBD)

LEVEL 4

Practicum in Education and Training
Project Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Educational Aide I	Texas Educator Certification Program	Teacher Education	Bilingual and Multilingual Education	Instruction and Learning
	Educational Instructional Technology	Education, General (or specific subject area)		Educational Leadership and Administration, General
	Counselor, Professional	Special Education		
	Athletic Trainer	Health and Physical Education/Fitness	Social and Philosophical Foundations of Education	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Adult Basic and Secondary Education and Literacy Teachers and Instructors	\$48,069	862	17%
Middle School Teachers, Except Special and Career/ Technical Education	\$54,510	6,407	15%
Career and Technical Education Teachers, Secondary School	\$56,360	719	9%
Special Education Teachers, Secondary School	\$56,720	980	18%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Texas Association of Future Educators, or Family, Career and Community Leaders of America

Work Based Learning Activities:
Teach a community education class; intern as a teaching assistant or tutor; serve as a camp counselor.

The Teaching and Training program of study prepares students for careers related to teaching, instruction, and creation of instructional and enrichment materials. The program of study introduces CTE concentrators to a wide variety of student groups and their corresponding needs. It familiarizes them with the processes for developing curriculum, coordinating educational content, and coaching groups and individuals.



The Education and Training Career Cluster® focuses on planning, managing, and providing education and training services and related learning support services. All parts of courses are designed to introduce learners to the various careers available within the Education and Training career cluster.

Successful completion of the Teaching and Training program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Oil and Gas Production I
Foundations of Energy

LEVEL 2

Oil and Gas Production II
Occupational Safety and Environmental
Technology I

LEVEL 3

Oil and Gas Production III
Occupational Safety and Environmental
Technology II
Career Preparation I

LEVEL 4

Oil and Gas Production IV
Project-Based Research
Applied Mathematics for Technical Professionals
Practicum in Energy (TBD)

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
	Above Ground Storage Tanks Inspector Certification	Petroleum Engineering		
	Pressure Vessels Inspector Certification	Chemical Engineering		
	Piping Inspector Certification	Petroleum Technology/ Technician	Mechanical Engineering	
	API QUTE - Qualification of Ultrasonic Testing Examiners	Industrial Mechanics and Maintenance Technology	Industrial Engineering	

*Includes Level I and Level II Certificates

For more information on postsecondary options for this program of study, visit TXCTE.org

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Extraction Workers - All Other	\$44,616	145	25%
Extraction Workers	\$34,570	1,000	7%
Drill Operators, Oil and Gas	\$52,083	925	14%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Career Preparation:
Intern at an oil or gas
company, American
Petroleum Institute
Certification

**Work Based Learning
Activities:**
Read trade publications
to understand economic
and political issues

The Oil and Gas Exploration and Production program of study focuses on processing, refining, and distributing petroleum and gas. It introduces students to the process of regulating the flow of oil into pipelines, controlling pumping systems, and operating and maintaining machinery to generate electric power.

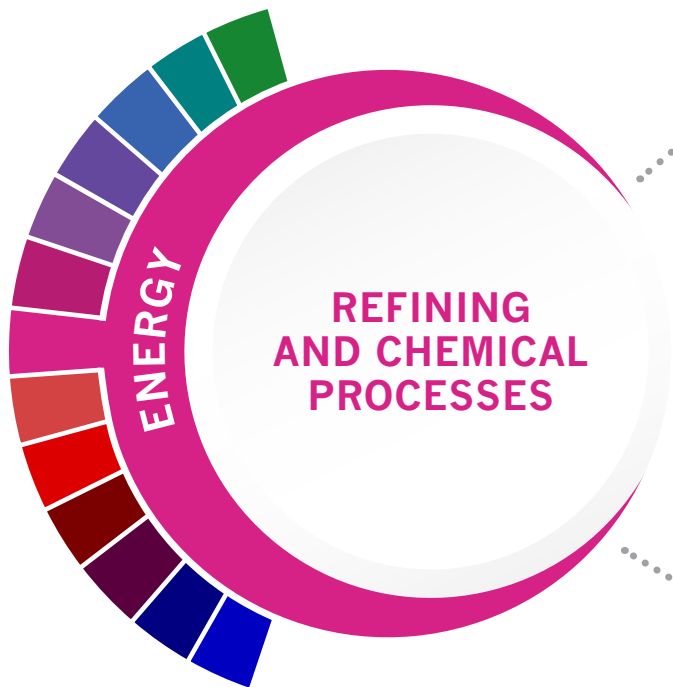


The Energy Career Cluster® prepares individuals for careers in the designing, planning, maintaining, generating, transmission, and distribution of traditional and alternative energy.

Successful completion of the Oil and Gas Exploration and Production program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019
I-304





COURSES

LEVEL 1

Foundations of Energy

LEVEL 2

Introduction to Process Technology
Introduction to Instrumentation and Electrical (TBD)

LEVEL 3

Petrochemical Safety, Health, and Environment
Advanced Instrumentation and Electrical (TBD)

LEVEL 4

Project-Based Research
Applied Mathematics for Technical Professionals
Practicum in Energy (TBD)

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
MSSC Certified Production Technician (CPT)	Process Technology Certificate Level II	Process Technology	Business Administration and Management, General	
	Petroleum Energy Technology Certificate	Process Operating Technology	Business/ Commerce, General	
	Qualification of Ultrasonic Testing Examiners (Sizing)	Logistics, Material, and Supply Chain Management	Industrial Engineering	
	Certified Plant Supervisor	Petroleum Technology/ Technician	Petroleum Engineering	

*Includes Level I and Level II Certificates

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Gas Plant Operators	\$62, 650	312	9%
Petroleum Pump System Operators, Refinery Operators, and Gaugers	\$71,448	1,181	9%
Power Plant Operators	\$71, 635	309	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Tour a power plant or refinery

Work-Based Learning Activities:

Participate in summer conferences.

The Refining and Chemical Processes program of study helps students discover how to monitor, adjust, and control different equipment housed in petrochemical plants and refineries. It introduces students to the computer technology and instrumentation used to operate a variety of equipment systems and industrial processes, helping students build the skills needed to operate these systems.



The Energy Career Cluster® prepares individuals for careers in the designing, planning, maintaining, generating, transmission, and distribution of traditional and alternative energy.

Successful completion of the Refining and Chemical Processes program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

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COURSES

LEVEL 1

Lifetime Nutrition and Wellness
Principles of Exercise Science and Wellness (TBD)

LEVEL 2

Kinesiology I (TBD)

LEVEL 3

Anatomy and Physiology
Kinesiology II (TBD)

LEVEL 4

Practicum in Entrepreneurship (TBD)
Project Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Certified Personal Trainer	Physical Therapist Assistant	Kinesiology and Exercise Science		Exercise Physiology
	Physical Therapy Aides	Therapeutic Recreation/ Recreational Therapy		
	Dietetic Technician	Athletic Training/ Trainer		
			Dietitians and Nutritionists	Physical Therapist

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Athletic Trainers	\$53,450	215	22%
Exercise Physiologists	\$41,662	33	33%
Coaches and Scouts	\$40,010	2,133	23%
Dietitians and Nutritionists	\$57,762	428	24%
Recreational Therapists	\$45,906	74	24%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Health Occupation Students of America (HOSA)

Work Based Learning Activities:

Volunteer at a hospital or rehabilitation center; manage a school sports team

The Exercise Science and Wellness program of study introduces students to the fields that assist patients with maintaining physical, mental, and emotional health. Students will research diet and exercise needed to maintain a healthy, balanced lifestyle and learn about and practice techniques to help patients recover from injury, illness, or disease.



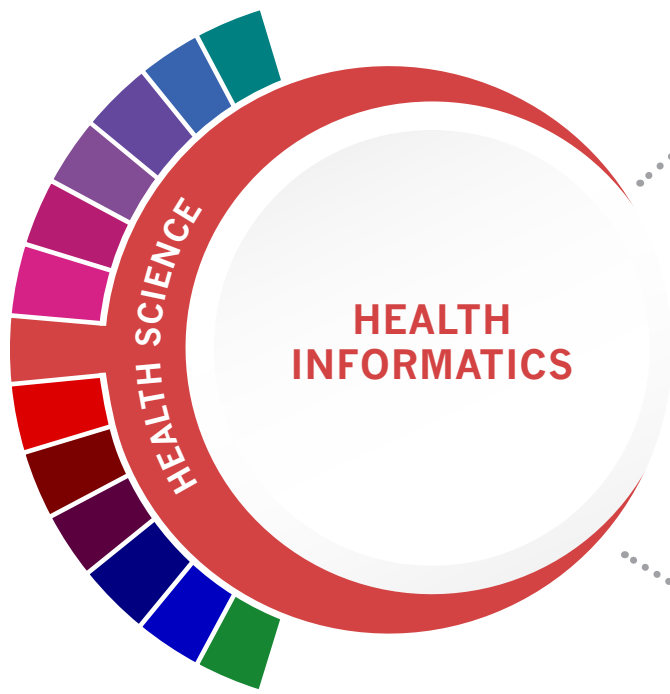
The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Exercise Science and Wellness program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019

I-306



COURSES



LEVEL 1

Principles of Health Science
Medical Terminology
Principles of Health Informatics (TBD)

LEVEL 2

Business Information Management I/Lab
Medical Intervention Evaluation and Research (TBD)

LEVEL 3

Health Informatics
Healthcare Information Systems and Management (TBD)

LEVEL 4

Mathematics for Medical Professionals
World Health Research
Project-Based Research

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Certified Coding Associate	Certified Professional in Informatics	Health Information/Medical Records Technology/Technician	Medical and Health Service Managers	
Medical Coding and Billing Specialist	Medical Transcriptionist			

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Medical Records and Health Information Technicians	\$35,922	1,588	24%
Medical and Health Service Managers	\$93,995	2,562	29%
Billing and Posting Clerks	\$35,485	5,775	25%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Health Occupations Students of America (HOSA)

Work Based Learning Activities:

Volunteer at a community wellness center, hospital, assisted living center, or nursing home

The Health Informatics program of study focuses on exposing students to the management and use of patient information in the healthcare field. Students may learn about and research recent modifications of computerized healthcare and the process of creating and maintaining hospital and patient records in accordance with regulatory requirements of the healthcare system. Students may also practice writing and interpreting medical reports.

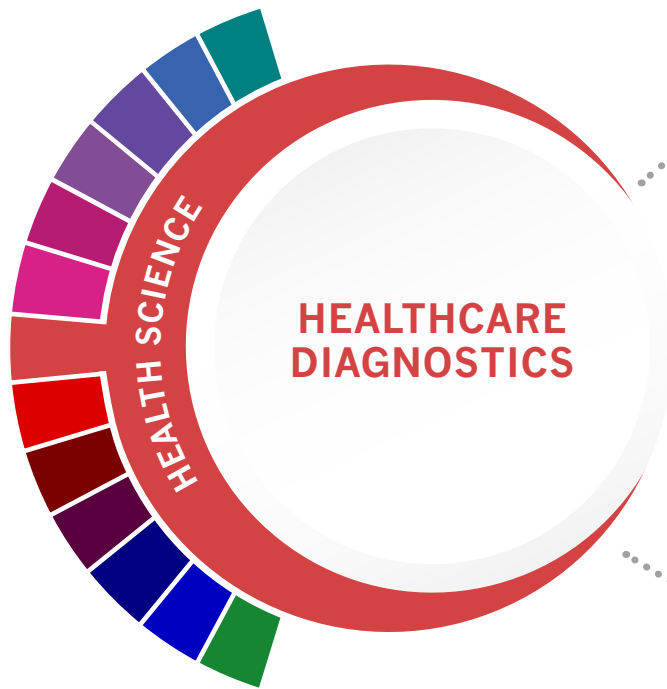


The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Health Informatics program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Health Science
Principles of Diagnostic Healthcare (TBD)
Introduction to Imaging Technology (TBD)

LEVEL 2

Medical Terminology
Imaging Technology I (TBD)

LEVEL 3

Health Science Theory
Medical Microbiology
Imaging Technology II (TBD)

LEVEL 4

Anatomy and Physiology
Pathophysiology
Practicum in Health Science

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE S DEGREE	BACHELOR S DEGREE	MASTER S/ DOCTORAL PROFESSIONAL DEGREE
Limited Licensed Radiology Technologist	Medical Sonographer	Nuclear Medical Technology/ Technologist		Radiologist
EKG/ ECG Technician	Radiologic Technologist	Magnetic Resonance Imaging (MRI) Technology/ Technician	Medical Radiologic Technology/ Science Radiation Therapist	Radiologic Technology/ Science - Radiographer
Medical Laboratory Technician				
Phlebotomy Technician				

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Diagnostic Medical Sonographers	\$69,909	495	35%
Phlebotomists	\$30,597	1,442	36%
Nuclear Medicine Technologists	\$75,962	91	13%
Radiologic Technologists	\$55,494	1,196	19%
Magnetic Resonance Imaging Technologists	\$68,661	217	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Health Occupation Students of America (HOSA)

Work Based Learning Activities:

Clinical rotations at a community wellness center, hospital, assisted living, nursing home

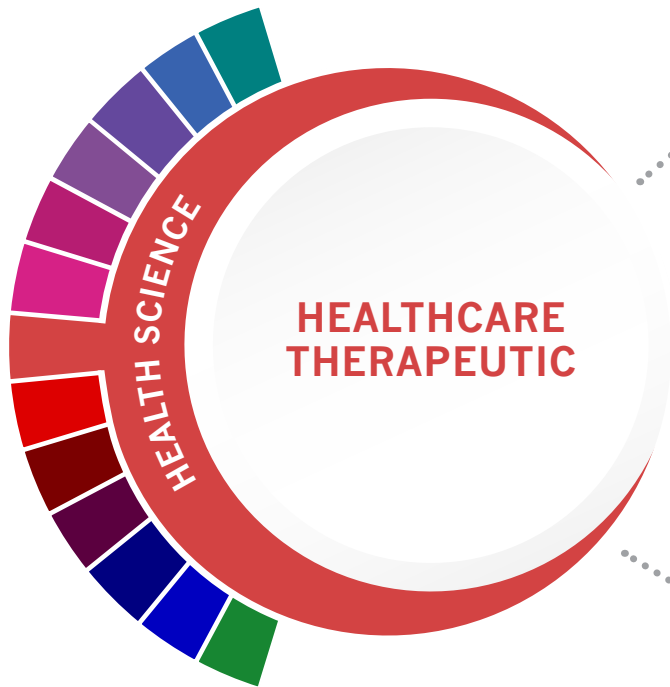
The Healthcare Diagnostics program of study introduces students to occupations and educational opportunities related to performing complex medical laboratory tests for the diagnosis, treatment, and prevention of disease. This program of study may also include exploration into the opportunities associated with blood laboratories as well as radiologic technology, and ultrasonic technology.



The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Healthcare Diagnostics program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Health Science
Principles of Therapeutic Healthcare (TBD)
Introduction to Pharmacy Science (TBD)
Introduction to Dental Science (TBD)

LEVEL 2

Medical Terminology
Dental Anatomy and Physiology (TBD)
Pharmacy I (TBD)

LEVEL 3

Anatomy and Physiology
Health Science Theory
Medical Microbiology
Pharmacy II (TBD)
Medical Assistant (TBD)
Dental Equipment and Procedures (TBD)

LEVEL 4

Pathophysiology
Pharmacology
Practicum in Health Science

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Registered Dental Assistant	Dental Assistant	Dental Hygienist		Dentist
Certified Patient Care Technician	Surgical Technologist			Physician Assistant
Certified Nurse Aide/Assistant	Medical Assistant	Medical/ Clinical Assistant		Family and General Practitioners
Pharmacy Technician	Pharmacy Aides			Pharmacist

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Medical Assistants	\$29,598	8,862	30%
Surgical Technologists	\$45,032	1,150	20%
Dental Hygienists	\$73,507	1,353	38%
Physicians and Surgeons	\$213,071	1,151	30%
Dental Assistants	\$34,840	4,422	31%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

SkillsUSA
Health Occupation
Students of America
(HOSA)

Work Based Learning Activities:

Volunteer at a community wellness center, hospital, assisted living, or nursing home.

The Healthcare Therapeutic program of study introduces students to occupations and educational opportunities related to diagnosing and treating acute, episodic, or chronic illness independently or as part of a healthcare team. This program of study also includes an introduction to the opportunities associated with providing treatment and counsel to patients as well as rehabilitative programs that help build or restore daily living skills to persons with disabilities or developmental delays.

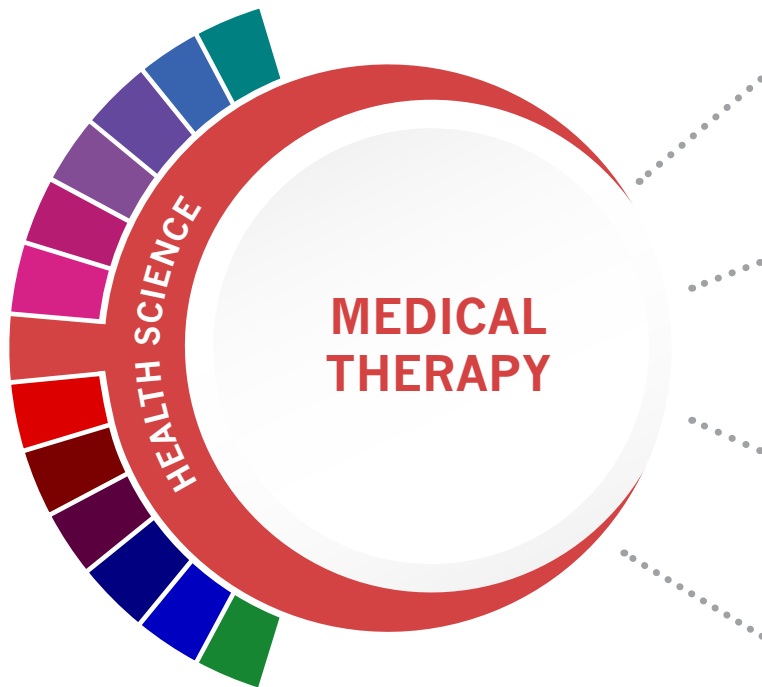


The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Healthcare Therapeutic program of study will fulfill requirements of the Public Service Endorsement.

Approved Statewide Program of Study - September 2019

COURSES



LEVEL 1

Principles of Health Science
Introduction to Speech Pathology and Audiology
Principles of Allied Health (TBD)

LEVEL 2

Medical Terminology
Speech and Language Development
Allied Health Therapeutic Services (TBD)

LEVEL 3

Speech Communication Disorder
Health Science Theory
Physical Therapy I (TBD)
Occupational Therapy I (TBD)
Radiation Therapy I (TBD)
Respiratory Therapy I (TBD)

LEVEL 4

Practicum in Health Science
Occupational Therapy II (TBD)
Physical Therapy II (TBD)
Radiation Therapy II (TBD)
Respiratory Therapy II (TBD)

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Certification in Orthopedic Manual Therapy	Certified Respiratory Therapist	Occupational Therapy Assistant	Respiratory Therapists	Occupational Therapists
Limited Licensed Radiology Technologist	Certified Physical Therapy Assistant	Radiation Therapists		Speech Language Pathologist
		Respiratory Therapists		Physical Therapists
		Physical Therapy Assistant		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Speech Language Pathologists	\$73,070	1,068	25%
Respiratory Therapists	\$57,429	17,493	20%
Occupational Therapists	\$92,227	84	34%
Physical Therapy Assistants	\$70,200	1,268	44%
Radiation Therapists	\$70,658	101	23%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Health Occupation Students of America (HOSA)

Work Based Learning Activities:

Lab internship
Job shadow
Clinical rotations

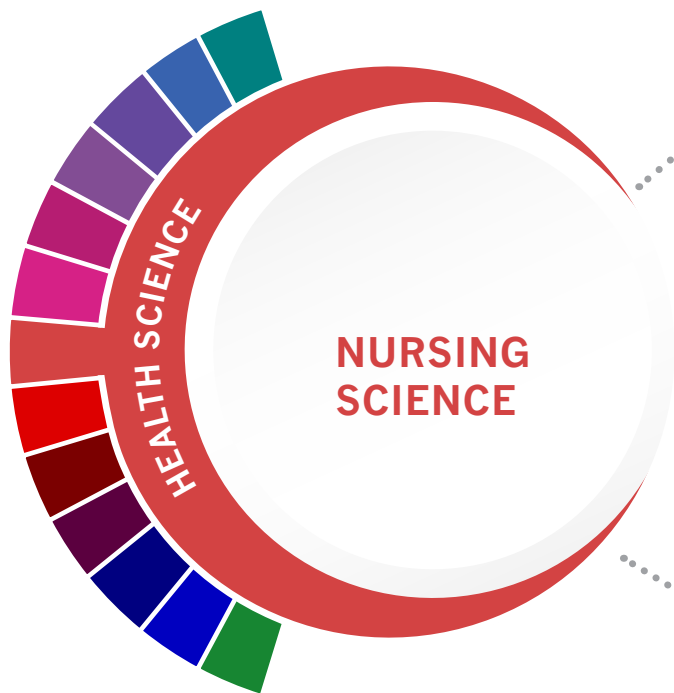
The Medical Therapist program of study focuses on the study of biology and medicine in order to introduce students to the knowledge and skills necessary to be successful in the healthcare field in occupations such as, Respiratory, Occupational, Physical, or Speech Therapist. Students may also practice patient care and communication.



The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Medical Therapist program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Health Science
Principles of Nursing (TBD)

LEVEL 2

Medical Terminology
Science of Nursing (TBD)

LEVEL 3

Medical Microbiology
Anatomy and Physiology
Clinical Ethics (TBD)
Leadership and Management in Nursing (TBD)

LEVEL 4

Pathophysiology
Pharmacology
Practicum in Nursing (TBD)

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Certified Medical Assistant	Licensed Vocational Nurse	Registered Nursing/ Registered Nurse	Informatics Nurse Specialists	Nurse Practitioner
Certified Nurse Aide/Assistant				Nursing Administration
Certified Patient Care Technician				Nurse Anesthetist
Additional industry based certification information is available from the TEA CTE website.				
For more information on postsecondary options for this program of study, visit TXCTE.org.				

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Licensed Vocational Nurses	\$45,178	7,186	21%
Registered Nurses	\$68,682	17,493	26%
Nurse Practitioners	\$107,827	977	50%
Nurse Anesthetists	\$154,856	357	23%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Health Occupation Students of America (HOSA)

Work Based Learning Activities:
Volunteer at a community wellness center, hospital, assisted living center, or nursing home.

The Nursing Program of Study introduces students to knowledge and skills related to patient care. CTE concentrators may learn about or practice caring for patients, routine procedures such as monitoring vital signs, development and implementation of care plans, maintenance of medical records, and disease or pain management. Students may focus on the healthcare system and research system designs and make recommended modifications.



The Health Science Career Cluster® focuses on planning, managing, and providing therapeutic services, diagnostics services, health informatics, support services, and biotechnology research and development. To pursue a career in the health science industry, students should learn to reason, think critically, make decisions, solve problems, communicate effectively, and work well with others.

Successful completion of the Nursing program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Introduction to Culinary Arts
Principles of Hospitality and Tourism

LEVEL 2

Culinary Arts
Foundations of Restaurant Management (TBD)

LEVEL 3

Advanced Culinary Arts

LEVEL 4

Food Science
Practicum in Culinary Arts
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Certified Fundamentals Cook	Certified Chef	Hotel and Restaurant Management		
Certified Fundamentals Pastry Cook	Foodservice Management Professional	Restaurant Culinary and Catering Management	Food Service Systems Administration/Management	
ServSafe Manager	Comprehensive Food Safety	Hospitality Administration/Management, General		
ManageFirst Professional	Certified Food and Beverage Executive	Culinary Arts/ Chef Training	Culinary Science and Food Service Management	Business Administration Management, General

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Food Service Managers	\$55,619	1,561	28%
Chef and Head Cooks	\$43,285	1,366	25%
Food Science Technicians	\$34,382	236	11%
Food and Beverage Managers	\$55,619	1,561	28%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities: Work Based Learning Activities:

Family, Career, Community Leaders of America (FCCLA), SkillsUSA, American Culinary Federation, Texas Restaurant Association

Plan a catering event or work for a catering company; participate in a cooking course; work in a restaurant; cook at home

The Culinary Arts program of study introduces students to occupations and educational opportunities related to the planning, directing, or coordinating activities of a food and beverage organization or department. This program of study also explores opportunities involved in directing and participating in the preparation and cooking of food.



The Hospitality and Tourism Career Cluster® focuses on the management, marketing, and operations of restaurants and other food/beverage services, lodging, attractions, recreation events, and travel-related services. Students acquire knowledge and skills focusing on communication, time management, and customer service that meet industry standards. Students will explore the history of the hospitality and tourism industry and examine characteristics needed for success.

Successful completion of the Culinary Arts program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

- LEVEL 1**
Principles of Hospitality and Tourism

- LEVEL 2**
Hotel Management
Travel and Tourism Management

- LEVEL 3**
Hospitality Services
Introduction to Event and Meeting Planning (TBD)

- LEVEL 4**
Practicum in Hospitality Services
Practicum in Event and Meeting Planning (TBD)
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Certified Hospitality & Tourism Management Professional	Certified Hospitality Supervisor	Hotel/Motel Administration/Management	Hospitality Administration/Management, General	
Certified Associate in Project Management	Certified Hotel Administrator	Business Administration and Management, General		
Entrepreneurship and Small Business	Certification in Hotel Industry Analytics	Tourism and Travel Services Management	Hotel and Restaurant Management	Hospitality Administration
	Certified Guest Service Professional	Business Administration and Management	Marketing/ Management, General	

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
General and Operations Managers	\$107,640	18,679	20%
Lodging Managers	\$48,381	396	19%
Administrative Services Managers	\$96,138	2,277	21%
Meeting, Convention, and Event Planners	\$47,446	1,083	21%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities: Family, Career, and Community Leaders of America (FCCLA), American Hotel and Lodging Association

Work Based Learning Activities: Intern at a resort or lodging property; work at a hotel, summer camp or theme park;

Additional industry based certification information is available from the TEA CTE website.
 For more information on postsecondary options for this program of study, visit TXCTE.org.

The Lodging and Resort Management program of study introduces students to occupations and educational opportunities related to the logistical and operational management of lodging and resorts. This program of study also explores opportunities related to human resources, financial analysis, and marketing.



The Hospitality and Tourism Career Cluster® focuses on the management, marketing, and operations of restaurants and other food/beverage services, lodging, attractions, recreation events, and travel-related services. Students learn knowledge and skills focusing on communication, time management, and customer service that meet industry standards. Students will explore the history of the hospitality and tourism industry and examine characteristics needed for success.

Successful completion of the Lodging and Resort Management program of study will fulfill requirements of the Business and Industry Endorsement.
 Approved Statewide Program of Study - September 2019
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COURSES

Principles of Hospitality and Tourism

LEVEL 1

Travel and Tourism Management
Entrepreneurship
Sports and Entertainment Marketing

LEVEL 2

Global Business
Tourism Marketing Concepts and Applications (TBD)

LEVEL 3

Practicum in Hospitality Services
Practicum in Entrepreneurship (TBD)
Career Preparation I

LEVEL 4



POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Certified Hospitality and Tourism Management Professional	Travel and Tourism Professional	Tourism Management		
Entrepreneurship and Small Business	Certified Tourism Executive	Business Administration and Management, General		
Certified Associate in Project Management	Communication Management Professional	Tourism and Travel Services Management	Tourism Management	Recreation and Resources Development
	Certified Marketing Analyst	Tourism and Travel Services Marketing	Sport Event and Tourism Management	Recreation, Park, and Tourism Sciences

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Advertising and Promotions Managers	\$94,515	164	20%
Fundraisers	\$54,850	875	21%
Market Research Analysts and Marketing Specialists	\$70,346	4,664	40%
Marketing Managers	\$144,269	1,297	32%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Family, Career, and Community Leaders of America (FCCLA), SkillsUSA, Texas Travel Industry Association

Work Based Learning Activities:

Work at a local tourist attraction, theme park, or summer camp; volunteer at a local community event (fair or rodeo)

The Travel, Tourism, and Attractions program of study introduces students to occupations and educational opportunities related to the marketing or sales of travel and tourism services. This program of study allows students to learn how to plan, direct, and coordinate marketing or business policies and programs, including identifying potential customers and determining demand and promotional strategies for products and services.



The Hospitality and Tourism Career Cluster® focuses on the management, marketing, and operations of restaurants and other food/beverage services, lodging, attractions, recreation events, and travel-related services. Students learn knowledge and skills focusing on communication, time management, and customer service that meet industry standards. Students will explore the history of the hospitality and tourism industry and examine characteristics needed for success.

Successful completion of the Travel, Tourism, and Attractions program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019
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COURSES

LEVEL 1

Principles of Human Services
Professional Communications
Interpersonal Studies
Dollars and Sense
Principles of Community Services (TBD)

LEVEL 2

Lifetime Nutrition and Wellness
Human Growth and Development
Child Development
Social and Community Services (TBD)

LEVEL 3

Counseling and Mental Health
Family and Community Services

LEVEL 4

Practicum in Human Services
Practicum in Entrepreneurship (TBD)
Project-Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Community Health Worker	Human Development and Family Studies	Human Development and Family Studies		
Certified Associate in Project Management	Community Health Services/Liaison/Counseling	Human Services/Sciences, General		Marriage and Family Therapy/Counseling
	Distance Credentialed Counselor	Family and Consumer Sciences		Human Services/Sciences
	Educator Certification in Family and Consumer Sciences	Community Health Services	Child and Family Services	Family Studies

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Child, Family, and School Social Workers	\$41,350	2,221	17%
Social and Community Services Managers	\$65,146	608	33%
Marriage and Family Therapists	\$42,266	217	35%
Social and Human Service Assistants	\$32,448	2,822	25%
Mental Health and Substance Abuse and Behavioral Disorder Counselors	\$42,120	576	39%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
American Association of Family and Consumer Sciences, Family, Career and Community Leaders of America

Work Based Learning Activities:
Volunteer at a community center; intern for a community non-profit organization

The Family and Community Services program of study introduces students to knowledge and skills related to social services, including child and human development and consumer sciences. CTE concentrators may learn about or practice managing social and community services or teaching family and consumer sciences. Students may follow career paths in social work or therapy for children, families, or school communities.

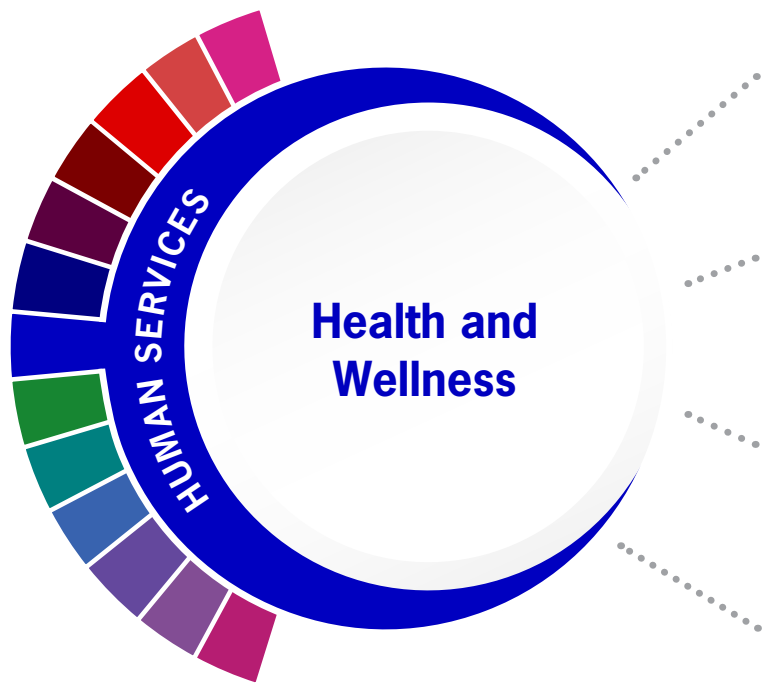


The Human Services Career Cluster® focuses on preparing individuals for employment in career pathways that relate to families and human needs such as counseling and mental health services, family and community services, personal care services, and consumer services.

Successful completion of the Family and Community Services program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Human Services

LEVEL 2

Lifetime Nutrition and Wellness
Human Growth and Development
Interpersonal Studies

LEVEL 3

Applied Nutrition and Dietetics (TBD)

LEVEL 4

Practicum in Human Services
Practicum in Entrepreneurship (TBD)
Advanced Nutrition and Dietetics (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Community Health Worker	Registered Dietitian	Nutrition Sciences		
Entrepreneurship and Small Business	Counselor, Professional	Community Health Services/Liaison/Counseling	Mental Health Counseling/Counselor	Community Health and Preventative Medicine
	Registered Dietitian Nutritionist	Health and Wellness, General	Nutrition	
	Social Worker	Public Health	Human Nutrition and Foods	Exercise and Sports Nutrition

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Community Health Workers	\$38,064	592	25%
Substance Abuse and Behavior Disorder Counselors	\$37,024	614	35%
Mental Health Counselors	\$41,558	812	38%
Health Care Social Workers	\$55,515	1,583	35%
Rehabilitation Counselors	\$43,930	586	23%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
American Association of Family and Consumer Sciences; Family, Career and Community Leaders of America

Work Based Learning Activities:
Job shadow a dietitian or nutritionist; work part-time at a counseling services center, health department or hospital

The Health and Wellness program of study introduces students to knowledge and skills related to promoting physical, emotional, social, and mental health and wellness. Students who choose this program of study may learn how to assist patients in planning for their health and wellness, respond to crises, and advise, provide education or counseling, or make referrals. CTE concentrators may also focus on addressing barriers to access health and wellness services.



The Human Services Career Cluster® focuses on preparing individuals for employment in career pathways that relate to families and human needs such as counseling and mental health services, family and community services, personal care services, and consumer services.

Successful completion of the Health and Wellness program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Information Technology
Geographic Information Systems

LEVEL 2

Computer Maintenance/Lab
Raster Based GIS

LEVEL 3

Computer Technician Practicum
Spatial Technology and Remote Sensing
IT Troubleshooting (TBD)

LEVEL 4

Computer Technician Practicum (2nd time)
Practicum of Information Technology
Practicum in Entrepreneurship (TBD)
Project-Based Research
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Microsoft Technology Associate Windows Operating System Fundamentals	IBM Certified Specialist - InfoSphere Optim for Distributed Systems Fundamentals	Computer and Information Sciences, General		
ERSI ArcGIS Desktop Entry	IBM Certified Database Associate - DB2 11 Fundamentals for z/OS	Computer and Information Systems Security/Information Assurance	Computer Systems Analysis/ Analyst	
CompTIA A+	HP ASE - ProLiant Server Solutions Integrator V2	Information Technology	Computer Engineering, General	
CompTIA IT Fundamentals +	Oracle Linux 6 Advanced System Administration	Computer Systems Networking and Telecommunications	Information Technology	

Additional industry based certification information is available from the TEA CTE website

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Database Administrator	\$83,075	1,063	19%
Computer Hardware Engineer	\$111,738	343	24%
Computer System Analyst and Support	\$87,568	5,937	29%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Join TSA
Job shadow a database administrator or computer hardware engineer

Worked Based Learning Activities:

Obtain a Certification

The Information Technology Support and Services program of study explores the occupations and educational opportunities associated with administering, testing, and implementing computer databases and applying knowledge of database management systems. This program of study may also include analyzing user requirements and problems to automate or improve existing systems and review computer system capabilities. This program of study may also include exploration into the research, design, or testing of computer or computer-related equipment for commercial, industrial, military, or scientific use.



The Information Technology (IT) Career Cluster® focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.

Successful completion of the Information Technology Support and Services program of study will fulfill requirements of a Business and Industry Endorsement.

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COURSES



LEVEL 1

Computer Science I
Principles of Information Technology
Principles of Cloud Computing (TBD)

LEVEL 2

Internetworking Technologies I
Computer Maintenance/Lab
AP Computer Science Principles
Cloud Networking (TBD)

LEVEL 3

Internetworking Technologies II
Networking/Lab

LEVEL 4

Practicum in Information Technology
Practicum in Entrepreneurship (TBD)
Project Based Research
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE	OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Oracle Certified Associate Java SE 8	AEM 6 Business Practitioner	Computer and Information Sciences, General			Computer Network Architects	\$111,633	1,082	23%
Oracle Certified Database Associate	Intelligence Planner Certification Program	Computer Systems Networking and Telecommunications		Information Technology	Computer Systems Analysts	\$87,568	5,937	29%
Cisco Certified Entry Networking Technician (CCENT)	Cisco Certified Entry Networking Technician	Information Technology	Computer and Information Systems Security/Information Assurance		Computer Network Support Specialists	\$68,037	1,824	19%
Associate of (ISC)2	Microsoft Networking Fundamentals	Network and System Administration/Adm inistrator	Computer Engineering, General					
*Includes Level 1 and Level II Certificates					WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES			
For more information on postsecondary options for this program of study, visit TXCTE.org .					Exploration Activities:		Work Based Learning Activities:	
					Join TSA Job shadow a computer network architect or support specialist		Earn an industry-based certification.	

The Networking Systems program of study explores the occupations and educational opportunities associated with designing and implementing computer and information networks, such as local area networks (LAN), wide area networks (WAN), intranets, extranets, and other data communications networks. This program of study may also include exploration into analyzing science, engineering, and other data processing problems to implement and improve computer systems.



The Information Technology (IT) Career Cluster® focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.

Successful completion of the Networking Systems program of study will fulfill requirements of a Business and Industry Endorsement. Approved Statewide Program of Study - September 2019



COURSES

LEVEL 1

Principles of Information Technology

LEVEL 2

Computer Programming I
Web Technologies

LEVEL 3

Web Design
Web Game Development

LEVEL 4

Practicum in Information Technology
Practicum in Entrepreneurship (TBD)
Project Based Research
Career Preparation

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Oracle Certified Associate Java SE 8	AEM 6 Developer	Computer Programming/Programmer, General	Web/Multimedia Management and Webmaster	Computational Science
WD Certified Web Design Certification	Certified Webmaster Professional	Computer Science		
Microsoft Technology Associate Introduction to Programming Certifications	Adobe Campaign Developer	Web Page, Digital/Multimedia and Information Resources Design		Information Science/ Studies
App Development with Swift Certification Level 1	IBM Certified Solution Developer - OpenSocial	Computer Systems Networking and Telecommunications		

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Computer Network Architects	\$111,633	1,079	39%
Web Administrators, Computer Occupations	\$85,197	1,616	20%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Join TSA
Participate in a coding or computer programming club
Create a web page

Work Based Learning Activities:

Get an Oracle or CISCO Certification

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

The Web Development program of study explores the occupations and educational opportunities associated with designing, creating, and modifying websites. This program of study may also explore integrating websites with other computer applications, and converting written, graphic, audio, and video components to compatible web formats by using software designed to facilitate the creation of web and multimedia content.



The Information Technology (IT) Career Cluster® focuses on building linkages in IT occupations for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.

Successful completion of the Web Development program of study will fulfill requirements of a Business and Industry Endorsement.
Approved Statewide Program of Study September 2019



COURSES



LEVEL 1

Principles of Law, Public Safety, Corrections, and Security

LEVEL 2

Disaster Response

LEVEL 3

Firefighter I
Emergency Medical Technician - Basic
Anatomy and Physiology
National Security
Counseling and Mental Health

LEVEL 4

Firefighter II
Practicum in Law, Public Safety, Corrections, and Security
Project-Based Research

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Emergency Medical Technician - Basic		Emergency Medical Technology/Technician (EMT Paramedic)		
Emergency Telecommunicator	Fire Protection Personnel/Firefighter	Fire Prevention and Safety Technology/Technician	Natural Resources Law Enforcement and Protective Services	
Basic Structure Fire Protection Certification	Fire Protection System Contractor	Fire Science/Fire-fighting		
	Fire Inspector			

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Firefighters	\$50,149	2,309	13%
Fire Inspectors and Investigators	\$54,787	161	14%
Emergency Medical Technicians	\$34,091	1,880	31%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Attend local emergency awareness events; Texas Public Service Association

Work Based Learning Activities:

Volunteer at a hospital or a fire station

The Emergency Services program of study focuses on training students to respond to emergency situations, namely medical emergencies and fire-based emergencies. Students may learn how to prevent emergencies, respond appropriately and in accordance with rules and regulations during crises, and investigate and delineate the source of the emergency.



The Law and Public Service Career Cluster® focuses on planning, managing, and providing legal services, public safety, protective services, and homeland security, including professional and technical support services. Students will examine the roles and responsibilities of police, courts, corrections, private security, and protective agencies of fire and emergency services.

Successful completion of the Emergency Services program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Government and Public Administration

LEVEL 2

Political Science I
Federal Law Enforcement and Protective Services

LEVEL 3

Planning and Governance
Political Science II
Dimensions of Diplomacy

LEVEL 4

Public Management and Administration
Revenue, Taxation, and Regulation
Practicum in Local, State, and Federal Government

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
	Accountant, Certified Public	Accounting and Business/Management	Accounting and Finance	Accounting
	Tax Professional/ Appraiser/ Assessor- Collector	Financial Mathematics		Taxation
	Real Estate Broker/Sales Agent	Finance, General		
	Real Estate Inspector	Real Estate		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Tax Examiners and Collectors, Revenue Agents	\$47,445	307	9%
Financial Examiners	\$76,731	412	27%
Appraisers and Assessors of Real Estate	\$54,496	529	21%
Financial Analysts	\$79,414	2,798	24%
Financial Specialists	\$67,995	997	17%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Attend local council and board meetings; Texas Public Service Association

Work Based Learning Activities:
Intern with a legislator or city official; develop and present a solution for an identified problem

The Government and Public Administration program of study explores the occupations and educational opportunities associated with examining, evaluating, and investigating conformity with laws and regulations. This program of study may also explore the opportunities related to developing comprehensive plans and programs for use of land and physical facilities of jurisdictions, such as towns, cities, counties, and metropolitan areas.



The Law and Public Service Career Cluster focuses on planning, managing, and providing legal services, public safety, protective services, and homeland security, including professional and technical support services. Students will examine the roles and responsibilities of police, courts, corrections, private security, and protective agencies of fire and emergency services.

Successful completion of the Government and Public Administration program of study will fulfill requirements of the Public Service Endorsement.

Approved Statewide Program of Study - September 2019

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COURSES



LEVEL 1

Principles of Law, Public Safety, Corrections, and Security

LEVEL 2

Law Enforcement I
Federal Law Enforcement and Protective Services
Criminal Investigations

LEVEL 3

Law Enforcement II
Correctional Services
Forensic Psychology

LEVEL 4

Counseling and Mental Health
Forensic Science
Practicum in Law, Public Safety Corrections, and Security

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Non-Commissioned Security Officer Level II	Law Enforcement Officer	Criminal Justice/Safety Studies/Law Enforcement Administration		
	Private Investigator/ Security Guard	Criminal Justice/ Police Science		
	Code Enforcement Officer	Corrections	Juvenile Corrections	
	Certified Law Enforcement Planner	Criminalistics and Criminal Science	Cyber/ Computer Forensics and Counterterrorism	Natural Resources Law Enforcement and Protective Services

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Police and Sheriff's Patrol Officers	\$60,112	5,241	13%
Probation Officers and Correctional Treatment Officers	\$44,054	793	9%
Correctional Officers and Jailers	\$40,186	4,683	9%
Immigration and Customs Inspectors	\$78,104	1,236	9%
First-Line Supervisors of Police and Detectives	\$91,312	253	25%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Texas Public Service Association;
criminal justice clubs

Work Based Learning Activities:
Attend court hearings and other legal procedures.

The Law Enforcement program of study teaches students about the development of, adherence to, and protection of various branches of law. Students may learn how to appropriately and legally respond to breaches in the law according to statutory rules and regulations as well as investigate how and why the breaches occurred.



The Law and Public Service Career Cluster® focuses on planning, managing, and providing legal services, public safety, protective services, and homeland security, including professional and technical support services. Students will examine the roles and responsibilities of police, courts, corrections, private security, and protective agencies of fire and emergency services.

Successful completion of the Law Enforcement, Investigations, Security, and Corrections program of study will fulfill requirements of the Public Service Endorsement. Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Law, Public Safety, Corrections, and Security

LEVEL 2

Court Systems and Practices
Business Law
Political Science I

LEVEL 3

Legal and Research Writing
Political Science II
Advanced Court Systems (TBD)

LEVEL 4

Practicum in Law, Public Safety, Corrections, and Security
Project-Based Research
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
	Attorney	Legal Assistant/Paralegal	Legal Assistant/Paralegal	Law
	Certified Paralegal			Intellectual Property Law
	Board Certification in Types of Law			Advanced Legal Research/ Studies, General
	Certified Legal Video Specialist			International Law and Legal Studies

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Lawyers	\$126,131	2,801	19%
Paralegal and Legal Assistants	\$50,544	2,837	19%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Attend court hearings and other legal procedures;
Texas Public Service Association

Work Based Learning Activities:
Intern with a local attorney;
script and conduct a mock trial

The Legal Studies program of study introduces students to the occupations and educational opportunities related to representing clients in criminal and civil litigation and other legal proceedings, as well as assisting lawyers and preparing legal documents. This program of study explores possible specializations in a single area of law.



The Law and Public Service Career Cluster® focuses on planning, managing, and providing legal services, public safety, protective services, and homeland security, including professional and technical support services. Students will examine the roles and responsibilities of police, courts, corrections, private security, and protective agencies of fire and emergency services.

Successful completion of the Legal Services program of study will fulfill requirements of the Public Service Endorsement.
Approved Statewide Program of Study - September 2019





COURSES



POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
FANUC Robot Operator 1	Engineer, Professional	Electro-mechanical Engineering/Technology	Electrical Engineering	
Mastercam Associate Level Certification	PMMI Mechatronics: Programmable Logic Controllers 1	Robotics Technology/Technician	Engineering, General	
NCCER Industrial Maintenance Mechanic	Certified Quality Technician	Instrumentation Technology/Technician	Industrial Engineering	
NIMS Industrial Technology Maintenance - Maintenance Operations	Plant Maintenance Technologist	Industrial Mechanics and Maintenance Technology	Mechanical Engineering	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Electro-Mechanical Assemblers	\$30,160	951	9%
Electro-Mechanical Technicians	\$56,555	127	9%
Industrial Machinery Mechanics	\$49,816	3,788	27%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate in SkillsUSA and local STEM events

Work Based Learning Activities:
Apprenticeship at a local business or industry
American Welding Society

The Advanced Manufacturing and Machinery Mechanics program of study focuses on the assembly, operation, maintenance, and repair of electromechanical equipment or devices. Students may work in a variety of mechanical fields, gaining knowledge and experience in robotics, refinery and pipeline systems, deep ocean exploration, or hazardous waste removal. CTE concentrators may work in a variety of fields of engineering.



The Manufacturing Career Cluster® focuses on planning, managing, and performing the processing of materials into intermediate or final products and related professional and technical support activities such as production planning and control, maintenance, and manufacturing/process engineering.

Successful completion of the Advanced Manufacturing and Machinery Mechanics program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019
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COURSES

LEVEL 1

Blueprint Reading for Manufacturing Applications
Principles of Manufacturing
Occupational Safety and Environmental Technology I
Principles of Applied Engineering

LEVEL 2

Metal Fabrication and Machining I
Diversified Manufacturing I
Occupational Safety and Environmental Technology II

LEVEL 3

Precision Metal Manufacturing I
Metal Fabrication and Machining II
Diversified Manufacturing II
Occupational Safety and Environmental Technology III
Computer Integrated Manufacturing (PLTW)

LEVEL 4

Precision in Metal Manufacturing II/Lab
Practicum in Manufacturing
Practicum in Entrepreneurship (TBD)

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
MSSC Certified Production Technician	Certified Welder or Welder Inspector	Welding Technology/Welder	Welding Engineering Technology/Technician	
ISCET Associate-Level Certified Electronics Technician	Machining Level 1 - CNC Milling: Programming Setup & Operations	Machine Shop Technology/Assistant	Biomedical Technology/Technician	Occupational Health and Industrial Hygiene
Mastercam Professional Level Certification	Certified Welding Engineering	Operations Management and Supervision		
NIMS Industrial Technology Maintenance - Basic Mechanical Systems	Certified Environmental, Safety, and Health Trainer	Occupational Safety and Health Technology/Technician	Environmental Health	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Mechanical Engineering Technicians	\$57,117	453	9%
CNC Machine Operators	\$39,250	1,319	12%
Aerospace Engineering and Operations Technicians	\$60,757	114	9%
Electrical and Electronics Engineering Technicians	\$60,382	1,439	9%
Industrial Engineering Technicians	\$61,672	326	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate and compete in SkillsUSA
Job shadow a machinist

Work Based Learning Activities:
Apprenticeship at a local business or industry
American Welding Society

The Manufacturing Technology program of study focuses on the development and use of automatic and computer-controlled machines, tools, and robots that perform work on metal or plastic. Students will learn how to set up and operate a variety of machine tools to produce precision parts and instruments. Students will also learn how to modify parts to make or repair machine tools or maintain individual machines, and how to use hand-welding or flame-cutting equipment.

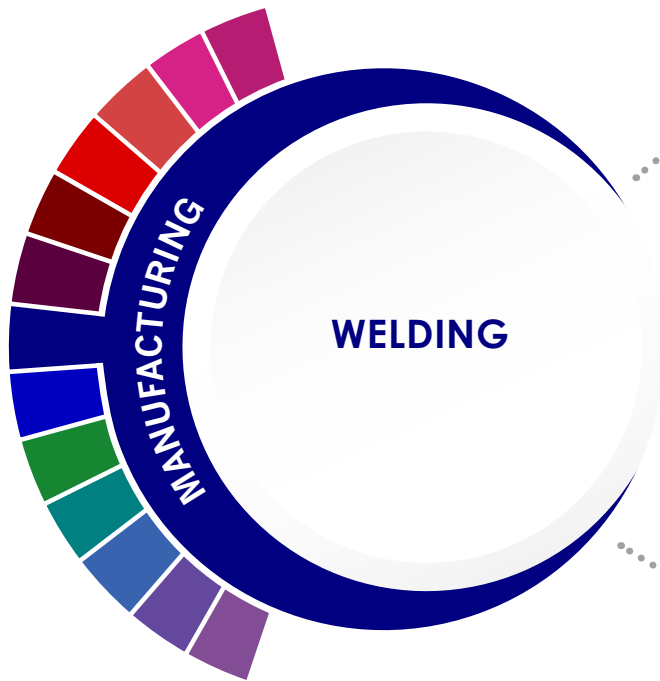


The Manufacturing Career Cluster® focuses on planning, managing, and performing the processing of materials into intermediate or final products and related professional and technical support activities such as production planning and control, maintenance, and manufacturing/process engineering.

Successful completion of the Manufacturing Technology program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

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COURSES

Introduction to Welding

LEVEL 1

Welding I

LEVEL 2

Welding II/Lab

LEVEL 3

Practicum in Manufacturing
Practicum in Entrepreneurship (TBD)
Career Preparation I

LEVEL 4

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
AWS Certified Welder, D1.1, D9.1	Certified Welder or Welder Inspector	Welding Technology/Welder	Welding Engineering Technology/Technician	
ASW SENSE Level 1	Machining Level 1 - CNC Milling: Programming Setup & Operations	Machine Shop Technology/Assistant	Biomedical Technology/Technician	Occupational Health and Industrial Hygiene
API 1104 Welding Certificate	Certified Welding Engineering	Operations Management and Supervision		
NCCER Welding, Level 1	Certified Environmental, Safety, and Health Trainer	Occupational Safety and Health Technology/Technician	Environmental Health	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Welders, Cutters, Solderers, and Brazers	\$41,350	6,171	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate and compete in SkillsUSA
Job shadow a machinist

Work Based Learning Activities:
Apprenticeship at a local business or industry
American Welding Society

The Welding program of study focuses on the development and use of automatic and computer-controlled machines, tools, and robots that perform work on metal or plastic. Students will learn how to modify parts to make or repair machine tools or maintain individual machines, and how to use hand-welding or flame-cutting equipment.



The Manufacturing Career Cluster® focuses on planning, managing, and performing the processing of materials into intermediate or final products and related professional and technical support activities such as production planning and control, maintenance, and manufacturing/process engineering.

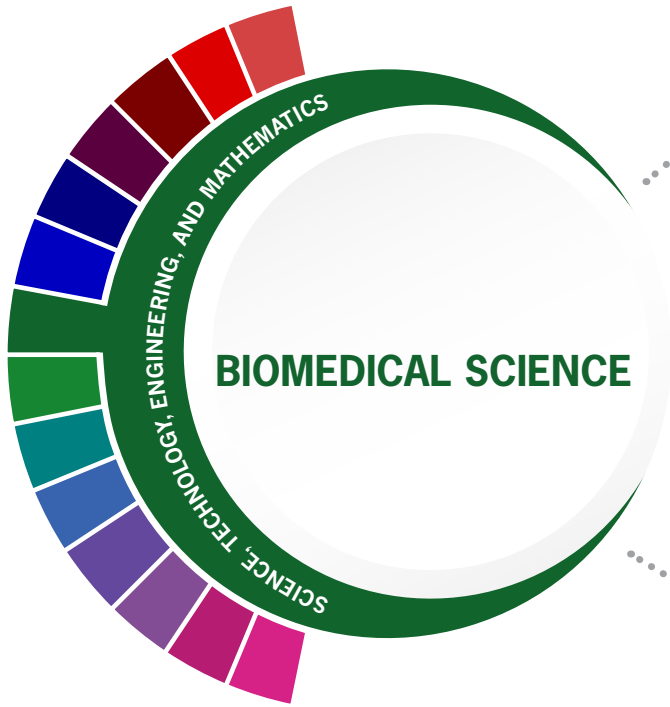
Successful completion of the Manufacturing Technology program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019

I-326



COURSES



LEVEL 1

Principles of Biosciences
Principles of Biomedical Science (PLTW)

LEVEL 2

Human Body Systems (PLTW)
Biotechnology I

LEVEL 3

Biotechnology II
Medical Microbiology
Medical Interventions (PLTW)

LEVEL 4

Pathophysiology
Biomedical Innovations (PLTW)
Practicum in Science, Technology, Engineering,
and Mathematics
Scientific Research and Design

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Medical Laboratory Assistant	Medical and Clinical Laboratory Technologists	Histologic Technician	Molecular Biology	Genetic Counseling
Medical Laboratory Technician			Biomedical Engineers	Medical Scientist
		Clinical Laboratory Science/ Medical Technology/ Technologist	Clinical Laboratory Science/ Medical Technology/ Technologist	Epidemiology

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Medical and Laboratory Technicians	\$37,981	1,159	28%
Biological Technicians	\$42,931	452	17%
Forensic Science Technicians	\$48,152	171	35%
Chemical Technicians	\$49,733	672	10%
Medical and Clinical Laboratory Technologists	\$58,760	1,166	25%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Health Occupations Students of America (HOSA)

Work Based Learning Activities:

Lab internship or shadow a healthcare or medical professional

The Biomedical Science program of study focuses on the study of biology and medicine in order to introduce students to the knowledge and skills necessary to be successful in the healthcare field, such as researching and diagnosing diseases, pre-existing conditions, or other determinants of health. Students may also practice patient care and communication.



The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing, scientific research and professional and technical services, including laboratory and testing services, and research and development services.

Successful completion of the Biomedical Science program of study will fulfill requirements of the Public Service Endorsement or STEM Endorsement, dependent upon courses chosen.



COURSES

LEVEL 1

Principles of Information Technology
Fundamentals of Computer Science
Foundations of Cybersecurity

LEVEL 2

Internetworking Technologies I
Computer Programming I
Computer Science I
AP Computer Science Principles
Computer Maintenance/Lab

LEVEL 3

Internetworking Technologies II
Engineering Applications of Computer Science
Principles
Networking/Lab
Digital Forensics
AP Computer Science A

LEVEL 4

Cybersecurity Capstone
Practicum in Information Technology
Practicum in STEM
Project-Based Research

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Oracle Certified Associate Java SE 8	GIAC Reverse Engineering Malware	System Networking, and LAN/WAN Management	Computer Systems Networking and Telecommunications	Computer Systems Analysis/Analyst
Oracle Certified Database Associate	Certified Advanced Windows Forensic Examiner	Information Technology	Computer Systems Networking and Telecommunications	Information Technology
Cisco Certified Entry Networking Technician (CCENT)	SAP Certified Technology Professional System Security Architect	Computer and Information Sciences, General		
Associate of (ISC)2	Cisco Certified Network Professional Security Certification	Computer Science		
Additional industry based certification information is available from the TEA CTE Website				
For more information on postsecondary options for this program of study, visit TXCTE.org.				

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Information Security Analysts	\$91,915	814	29%
Network and Computer System Administrators	\$82,597	2,814	19%
Computer Systems Analyst	\$87,568	5,937	29%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Join TSA
Job shadow a computer system analyst or information security analyst.

Work Based Learning Activities:

Obtain an industry based certification.

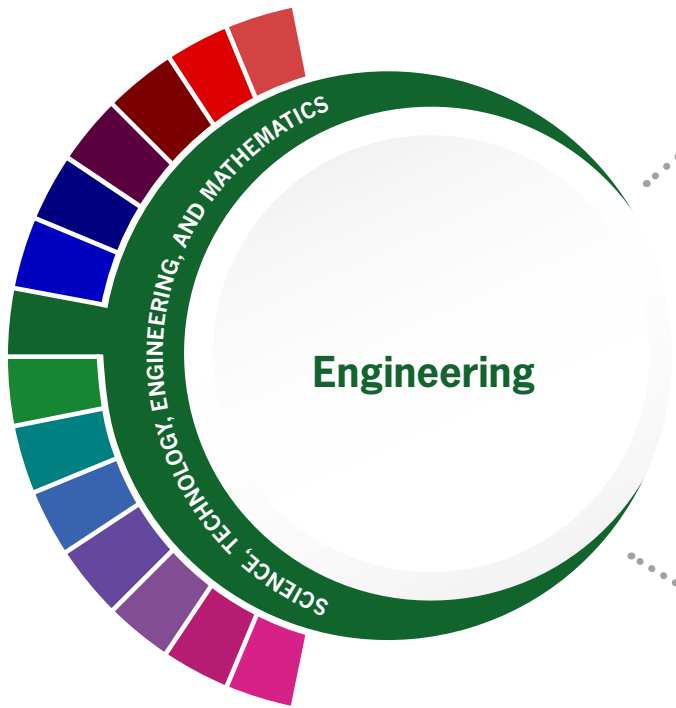
The Cybersecurity program of study includes the occupations and educational opportunities related to planning, implementing, upgrading, or monitoring security measure for the protection of computer networks and information. This program of study may also include exploration into responding to computer security breaches and virus and administering network security measures.



The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing, scientific research and professional and technical services, including laboratory and testing services, and research and development services.

Successful completion of the Cybersecurity program of study will fulfill requirements of a Business and Industry or STEM Endorsement. Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Principles of Applied Engineering
Computer Aided Drafting for Manufacturing (TBD)
Introduction to Engineering Design (PLTW)

LEVEL 2

Manufacturing Engineering Technology I

LEVEL 3

Engineering Design and Development (PLTW)
Engineering Design and Presentation I
Computer Integrated Manufacturing (PLTW)
Aerospace Engineering (PLTW)
Digital Electronics
Civil Engineering and Architecture (PLTW)
Engineering Science
Environmental Sustainability (PLTW)

LEVEL 4

Engineering Design and Problem Solving
Engineering Design and Presentation II
Practicum in STEM
Scientific Research and Design

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Autodesk Certified Professional or User (ACU) - Inventor	Engineer, Professional	Electrical and Electronics Engineering	Electrical and Electronics Engineering	Electrical and Electronics Engineering
Certified SolidWorks Associate (CSWA)	Fluid Power Systems Designer	Drafting and Design Technology/ Technician, General	CAD/CADD Drafting and/or Design Technology/ Technician	Mechanical Engineering
Certified Engineering Technician - Audio Systems	Certified Biomedical Auditor	Engineering Technology	Bioengineering and Biomedical Engineering	Bioengineering and Biomedical Engineering
	Certified Cost Estimator/ Analyst		Construction Engineering Technology/ Technician	

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Aerospace Engineers	\$110,843	481	9%
Industrial Engineers	\$97,074	1,263	10%
Mechanical Engineers	\$91,707	1,535	11%
Chemical Engineers	\$112,819	474	9%
Electrical Engineers	\$98,405	1,137	10%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate in competitions like Skills USA

Career Preparation Activities:
Engineering internship
Job shadow a machinist

The Engineering program of study focuses on the design, development, and use of engines, machines, and structures. Students will learn how to apply science, mathematical methods, and empirical evidence to the innovation, design, construction, operation, and maintenance of different manufacturing systems.



The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster® focuses on planning, managing, and providing scientific research and professional and technical services, including laboratory and testing services, and research and development services.

Successful completion of the Engineering program of study will fulfill requirements of the Business and Industry or STEM Endorsement.

Approved Statewide Program of Study - September 2019
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COURSES



LEVEL 1

Fundamentals of Computer Science

LEVEL 2

Computer Programming I
AP Computer Science Principles
Computer Science I

LEVEL 3

Introduction to C# Programming
Applications
AP Computer Science A
Mobile App Development
Computer Programming II
Computer Science II

LEVEL 4

Computer Science III
Practicum in Information Technology
Practicum of A/V Production
Practicum in STEM
Career Preparation I

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
Oracle Certified Association JAVA SE 8 Programmer	Certified Computing Professional	Computer Programming/Pro grammer General	Management Information Systems, General	
Oracle Certified Database Associate	Cloud Technology Associate Certification	Computer Software Engineer		
	AEM 6 Developer	Computer Science		
	Certified Software Analyst	Information Science/Studies		
*Includes Level I and Level II Certificates				
For more information on postsecondary options for this programs of study, visit TXCTE.org				

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Computer Network Architect	\$111, 633	1,454	9%
Software Developer, Systems Software	\$103, 334	2985	25%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

Join TSA
Participate in a coding club
at school.

Work Based Learning Activities:

Obtain an industry based
certification.

The programming and Software Development program of study explores the occupations and education opportunities associated with researching, designing, developing, and testing operating systems-level software, compilers, and network distribution software for medical, industrial, military, communications, aerospace, business, scientific, and general computer applications. This program of study may also include exploration into creating, modifying, and testing the codes, forms, and script that allow computer applications to run

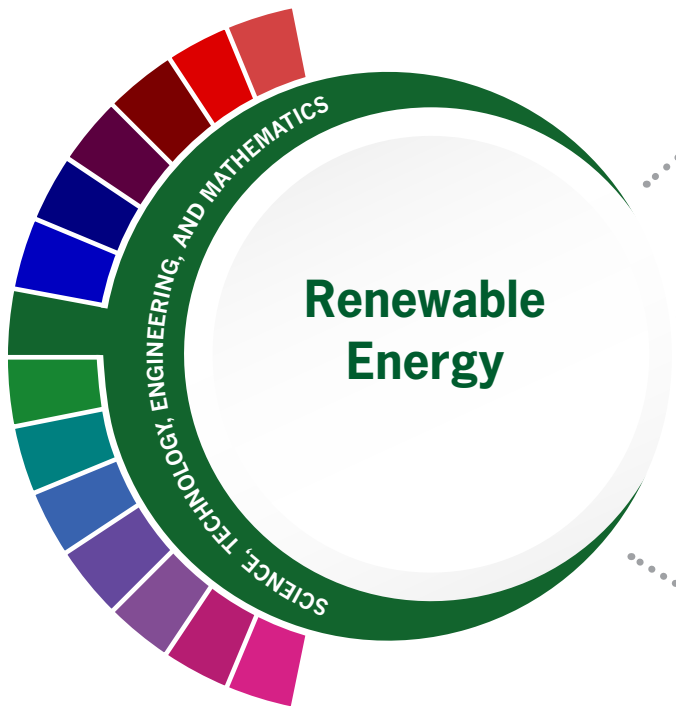


The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing, scientific research and professional and technical services, including laboratory and testing services, and research and development services.

Successful completion of the Programming and Software Development program of study will fulfill requirements of a Business and Industry or STEM Endorsement.

Approved Statewide Program of Study -





COURSES

LEVEL 1

Principles of Applied Engineering
Foundations of Energy

LEVEL 2

AC/DC Electronics
Energy and Natural Resources Technology
Introduction to Renewable Energy (TBD)

LEVEL 3

Environmental Sustainability (PLTW)
Solid State Electronics
Scientific Research and Design

LEVEL 4

Digital Electronics
Engineering Design and Problem Solving
Project-Based Research
Applied Mathematics for Technical Professionals
Practicum in STEM
Practicum in Energy (TBD)

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
	Photovoltaic Installer-Level 1 Professional	Industrial Mechanics and Maintenance Technology	Surveying Engineering	
	Solar Photovoltaic Certification	Solar Energy Technology/	Systems Engineering	
	Small Wind Installer-Level 1	Engineering, Mechanics	Manufacturing Engineering	
		Engineering, General		

*Includes Level I and Level II Certificates

For more information on postsecondary options for this program of study, visit TXCTE.org

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Wind Turbine Services Technician	\$51,334	387	108%
Solar Photovoltaic Installer	\$43,957	470	81%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:

SkillsUSA
Science Club

Work Based Learning Activities:

Research four renewable
energy companies and
compare them.

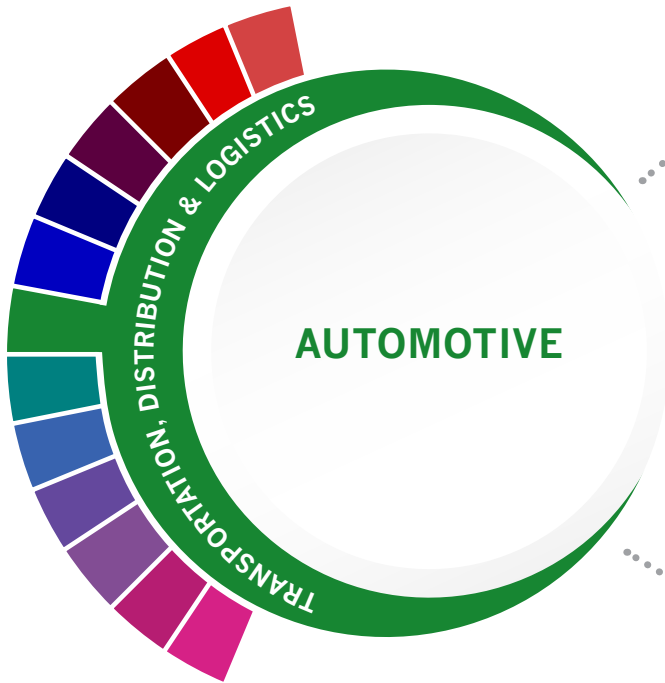
The Renewable Energy program of study helps students discover to assemble, inspect, maintain, and repair different equipment required for renewable energy. It introduces students to solar photovoltaic equipment and wind turbines, the systems and processes used to maintain and manage these types of equipment, and helps students develop the skills needed to do so.



The Science, Technology, Engineering, and Mathematics (STEM) Career Cluster focuses on planning, managing, and providing, scientific research and professional and technical services, including laboratory and testing services, and research and development services.

Successful completion of the Renewable Energy program of study will fulfill requirements of the Business and Industry or STEM endorsement.

COURSES



LEVEL 1

Principles of Transportation Systems
Small Engine Technology I
Basic Collision Repair and Refinishing

LEVEL 2

Automotive Basics
Introduction to Transportation Technology
Small Engine Technology II
Collision Repair/Lab
Occupational Safety and Environmental Technology I

LEVEL 3

Automotive Technology I
Energy and Power of Transportation Systems
Paint and Refinishing/Lab

LEVEL 4

Automotive Technology II/Lab
Practicum in Transportation Systems
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Automotive Service Excellence (ASE) Entry Level	Master Collision Repair and Refinishing Technician	Autobody/Collision and Repair Technology/Technician		Mechanical Engineering
Automotive Service Excellence (ASE) Professional Level	Automobile Technician: various systems and parts	Medium/Heavy Vehicle and Truck Technology/Technician		
	Engine Machinist Technician	Mechanical Engineering/Mechanical Technology/Technician		
	Collision Repair and Refinish			

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Automotive Body and Related Repairers	\$40,144	1,456	25%
Automotive Service Technician and Mechanics	\$38,459	5,557	18%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
SkillsUSA competition
Automotive Service Association

Work Based Learning Activities:
Work at a local automotive repair or body shop.

The Automotive program of study teaches students how to repair and refinish automobiles and service various types of vehicles. Students may learn to collect payment for services or supplies and perform typical vehicle maintenance procedures such as lubrication, oil changes, installation of antifreeze, or replacement of accessories like wiper blades or tires.



The Transportation, Distribution, and Logistics Career Cluster® focuses on careers in planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water. It also includes related professional support services such as transportation infrastructure planning and management, logistics services, mobile equipment and facility maintenance.

Successful completion of the Automotive program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019





COURSES

LEVEL 1

Introduction to Aircraft Technology

LEVEL 2

Occupational Safety and Environmental Technology I
Aviation Maintenance (TBD)

LEVEL 3

Aircraft Airframe Technology/Lab

LEVEL 4

Aircraft Powerplant Technology/Lab
Practicum in Transportation Systems
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/INDUSTRY CERTIFICATION	CERTIFICATE/LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/DOCTORAL PROFESSIONAL DEGREE
Aerospace Manufacturing Certification	Avionics Electronics Technician	Avionics Maintenance Technology/Technician	Airframe Mechanics and Aircraft Maintenance Technology/Technician	
	Aircraft Electronics Technician	Aircraft Powerplant Technology/Technician		
	Aerospace/Aircraft Assembly Maintenance Certification	Airframe Mechanics and Aircraft Maintenance Technology/Technician		

*Includes Level I and II Certificates

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Aircraft Mechanics and Technicians	\$58,698	1,469	9%
Avionics Technicians	\$59,114	170	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate in SkillsUSA
Explore virtual aviation websites.

Work Based Learning Activities:
Seek part-time work at an airport, aviation services agency, or airline.

The Aviation Maintenance program of study introduces students to the occupations and education opportunities related to inspecting aircraft, maintenance procedures, air navigational aids, air traffic controls, and communications equipment to ensure conformance with federal safety regulations.

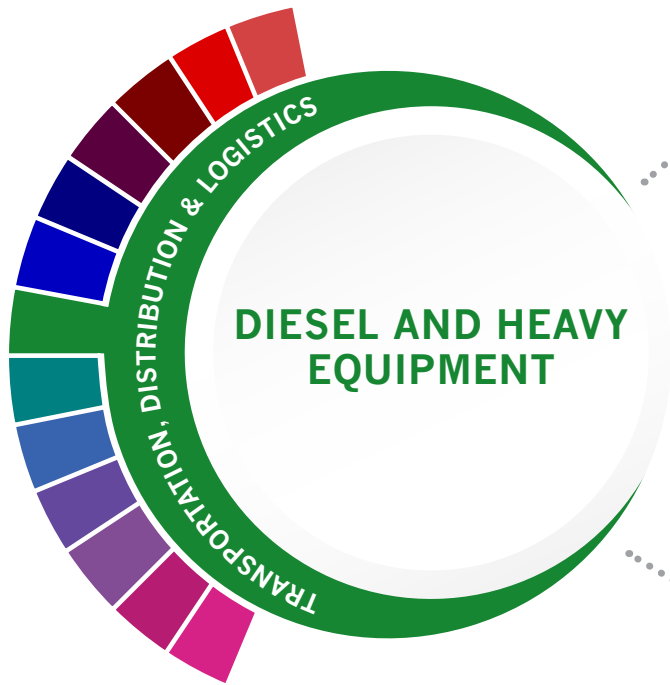


The Transportation, Distribution, and Logistics Career Cluster® focuses on careers in planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water. It also includes related professional support services such as transportation infrastructure planning and management, logistics services, mobile equipment and facility maintenance.

Successful completion of the Aviation program of study will fulfill requirements of the Business and Industry Endorsement.
Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Introduction to Transportation Technology
Principles of Transportation Systems

LEVEL 2

Diesel Equipment Technology I
Occupational Safety and Environmental
Technology I

LEVEL 3

Diesel Equipment Technology II/Lab

LEVEL 4

Practicum in Transportation Systems
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE	OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
ASE Medium/ Heavy Truck Technician, Brakes (T4)	Engine Machinist Technician	Diesel Mechanics Technology/ Technician			Bus and Truck Mechanics and Diesel Engine Specialists	\$44,574	3,150	21%
ASE Medium/Heavy Truck Technician, Diesel Engines (T2)	Light Vehicle Diesel Engines	Medium/Heavy Vehicle and Truck Technology/ Technician			Mobile Heavy Equipment Mechanics, Except Engines	\$47,299	1,627	16%
ASE Medium/Heavy Truck Technician, Drive Train (T3) - Professional	Transit Bus Technician	Heavy Equipment Maintenance Technology/ Technician						
ASE Medium/ Heavy Truck Technician, Electrical/ Electronic Systems (T6)	Fluid Power Mechanic							

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
Participate in SkillsUSA

Work Based Learning Activities:
Volunteer or work part-time for a repair shop that works on engines

The Diesel and Heavy Equipment program of study teaches students to diagnose, repair, modify, or redo mechanical and hydraulic equipment on crane, bulldozer, grader, conveyor, construction equipment, bus, and truck diesel engines.



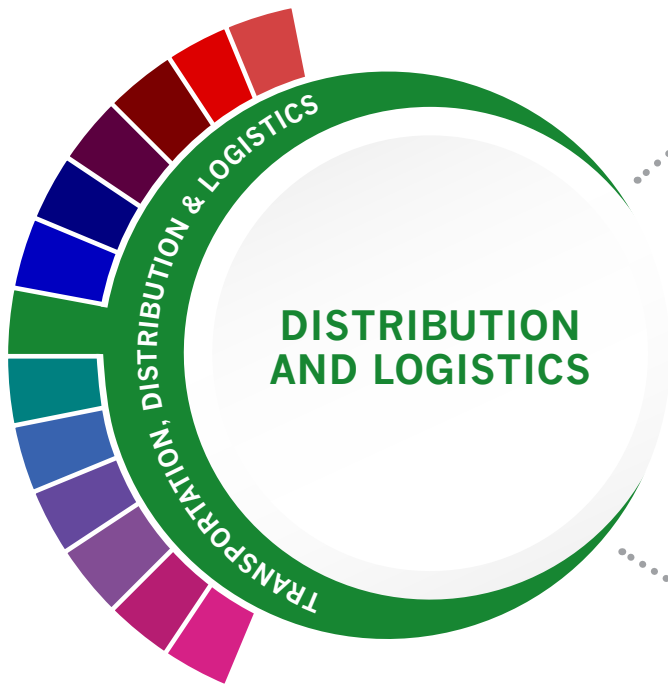
The Transportation, Distribution, and Logistics Career Cluster® focuses on careers in planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water. It also includes related professional support services such as transportation infrastructure planning and management, logistics services, mobile equipment and facility maintenance.

Successful completion of the Diesel and Heavy Equipment program of study will fulfill requirements of the Business and Industry Endorsement.

Approved Statewide Program of Study - September 2019



COURSES



LEVEL 1

Principles of Distribution and Logistics

LEVEL 2

Management of Transportation Systems
Concepts of Distribution and Logistics
Technology (TBD)
Occupational Safety and Environmental
Technology I

LEVEL 3

Distribution and Logistics
Raster-Based Geographic Information
Systems
Logistics Engineering (TBD)

LEVEL 4

Practicum in Distribution and Logistics
Practicum in Entrepreneurship (TBD)
Career Preparation I

POSTSECONDARY OPTIONS

HIGH SCHOOL/ INDUSTRY CERTIFICATION	CERTIFICATE/ LICENSE*	ASSOCIATE'S DEGREE	BACHELOR'S DEGREE	MASTER'S/ DOCTORAL PROFESSIONAL DEGREE
MSSC Certified Logistics Technicians	Emergency Number Professional	Business Administration and Management, General		
	SAP Certified Application Associate - Logistics Execution and Warehouse Management	Operations Management and Supervision		
	Certified Billing and Coding Specialist	General Office Occupations and Clerical Services	Business/Commerce, General	Public Administration
	Cargo Shipper's Agent	Business Administration and Management, General		

Additional industry based certification information is available from the TEA CTE website.

For more information on postsecondary options for this program of study, visit TXCTE.org.

OCCUPATIONS	MEDIAN WAGE	ANNUAL OPENINGS	% GROWTH
Logisticians	\$77,210	1,550	13%
Supply Chain Managers	\$113,110	1,794	26%
Transportation, Storage, and Distribution Managers	\$89,045	965	17%
Purchasing Managers	\$121,722	497	14%
Purchasing Agents, Except Wholesale, Retail, and Farm Products	\$64,293	2,727	9%

WORK BASED LEARNING AND EXPANDED LEARNING OPPORTUNITIES

Exploration Activities:
SkillsUSA, FBA, FBLA, or
Technology Student
Association

Work Based Learning Activities:
Intern at a distribution or
warehousing center.

The Distribution and Logistics program of study teaches students how to plan, coordinate, and direct people and operational plans related to distributed goods and services. Students will learn how to manage daily operations and logistics personnel.



The Transportation, Distribution, and Logistics Career Cluster® focuses on careers in planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water. It also includes related professional support services such as transportation infrastructure planning and management, logistics services, mobile equipment and facility maintenance.

Successful completion of the Distribution and Logistics program of study will fulfill requirements of the Business and Industry Endorsement.

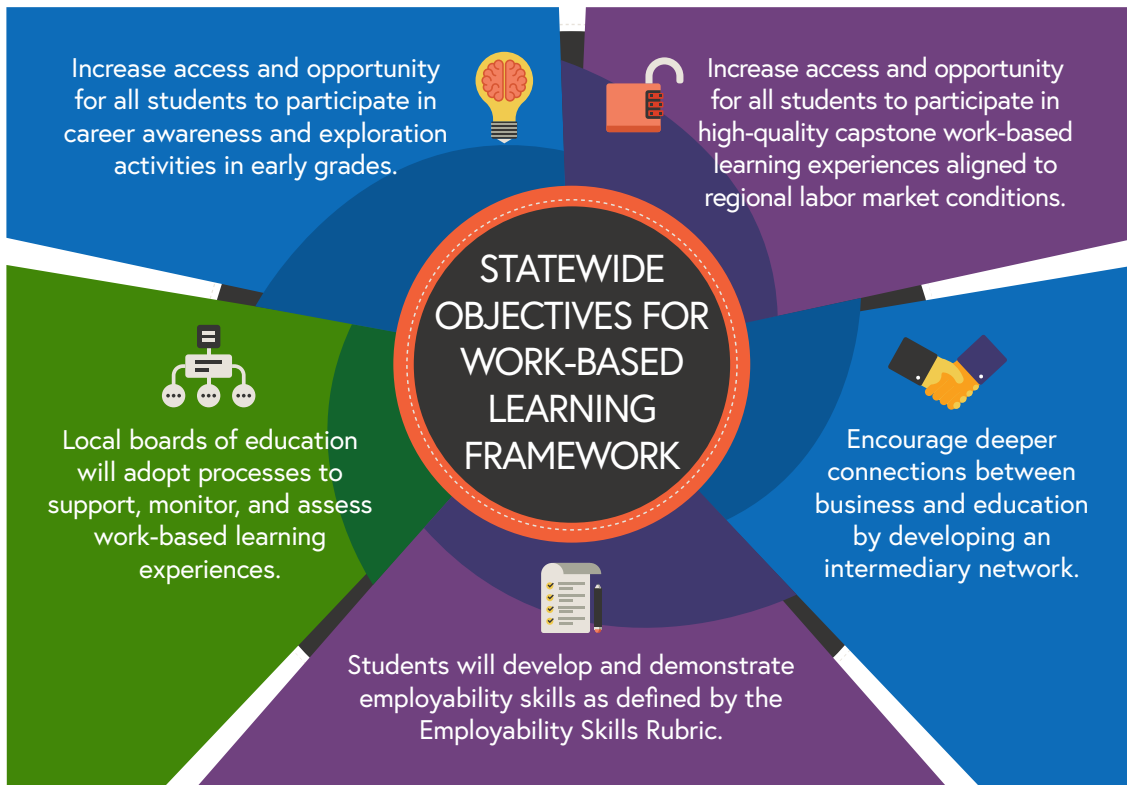
Approved Statewide Program of Study - September 2019



**TEA APPENDIX 5:
Statewide Work-Based Learning Framework and Employability Skills Rubric**

WORK-BASED LEARNING

POWERED BY



DEFINITION OF WORK-BASED LEARNING

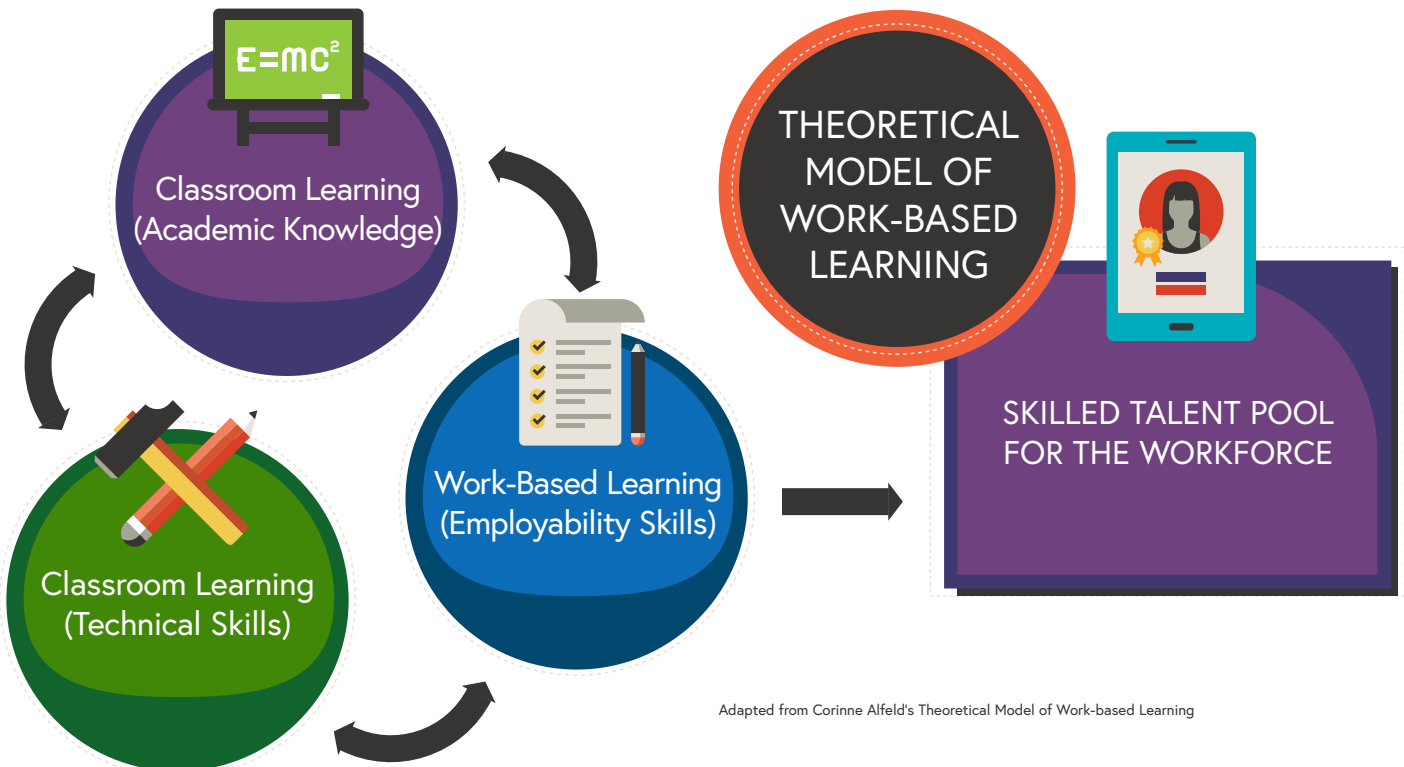
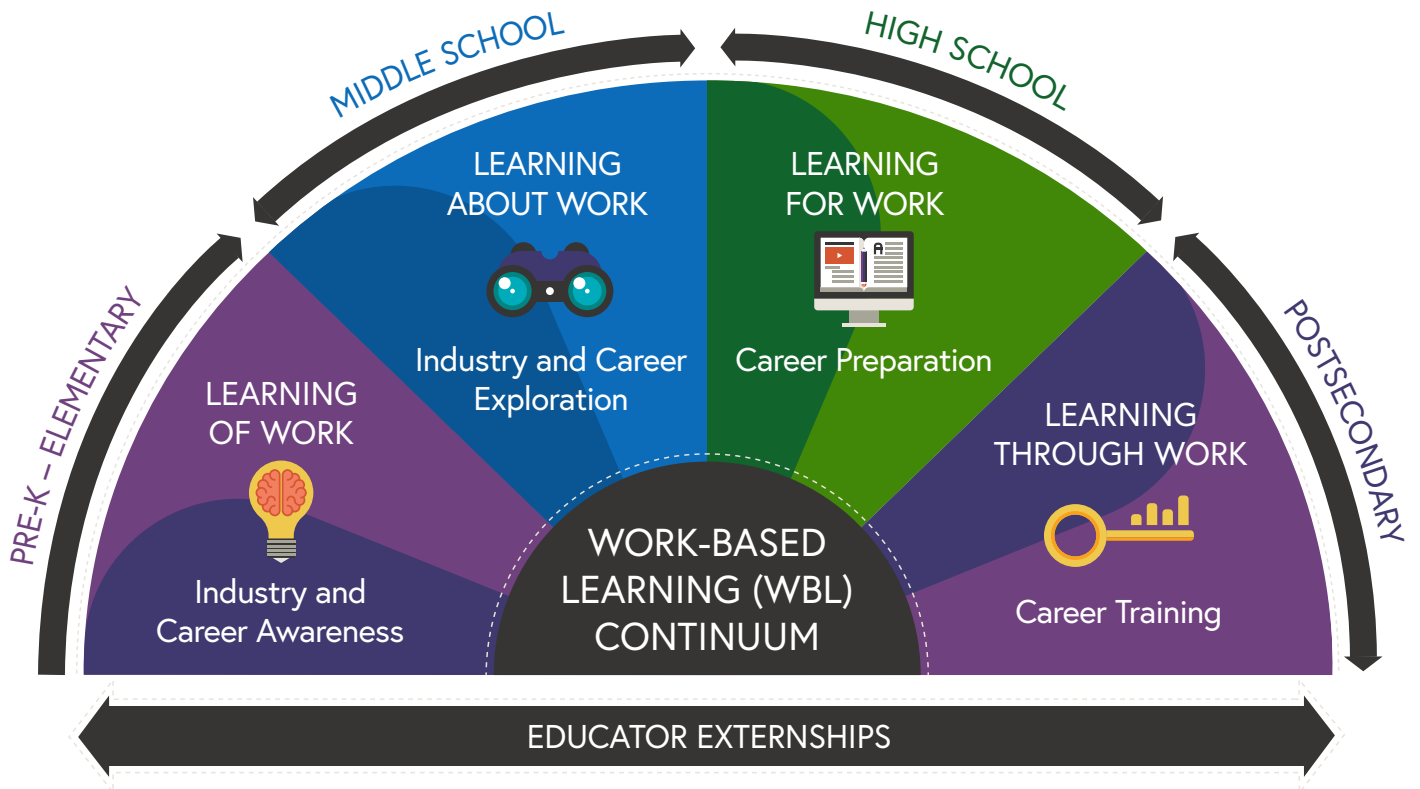
Work-Based Learning is a continuum of intentional activities and experiences designed to expand the boundaries of the classroom and prepare students for future career opportunities. Activities and experiences begin as early as pre-kindergarten and continue through postsecondary education.

Work-Based Learning provides opportunities for students to:

- Apply academic and technical knowledge and skills learned in the classroom in a realistic setting
- Engage with business and industry professionals
- Explore and experience potential career options
- Develop and practice essential employability skills

WORK-BASED LEARNING

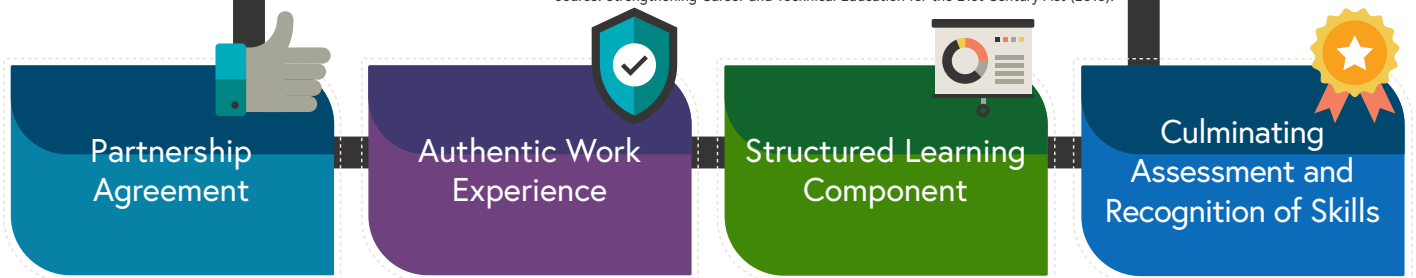
POWERED BY



ELEMENTS OF HIGH-QUALITY CAPSTONE WORK-BASED LEARNING EXPERIENCES

Capstone work-based learning experiences provide "sustained interactions with industry or community professionals in real workplace settings, to the extent practicable, or simulated environments at an educational institution that foster in-depth, firsthand engagement with the tasks required in a given career field, that are aligned to curriculum and instruction."

Source: Strengthening Career and Technical Education for the 21st Century Act (2018).



Source: Hauge, K. (2018). *States Continue Advancing Strategies to Scale Work-Based Learning*. Washington, DC: National Governors Association.



Work Based Learning Employability Skill Rubric

Skill	Criteria	Emerging	Developing	Accomplished	Exemplary
Effective Relationships					
Interpersonal Skills	<i>Teamwork</i>	<ul style="list-style-type: none"> • Demonstrates respect and courtesy • Shows sincere interest in others and their concerns • Relates to people in an open, friendly, accepting manner • Collaborates well in a diverse team • Collaborates well in a team to solve problems 	<p>...and</p> <ul style="list-style-type: none"> • Understands individual and team roles • Gives feedback to teammates 	<p>...and</p> <ul style="list-style-type: none"> • Exercises leadership within a team • Reflects on the collaboration and makes recommendations for improvement • Solicits ideas and feedback from teammates 	<p>...and</p> <ul style="list-style-type: none"> • Inspires and motivates others to perform at a high level • Analyzes how teams function • Sees differences in people (i.e., strengths, personality, culture, or background) as opportunities for learning about and approaching things differently
	<i>Conflict resolution</i>	<ul style="list-style-type: none"> • Talks through conflicts with others • Identifies the needs of others • Listens effectively to others 	<p>...and</p> <ul style="list-style-type: none"> • Responds or adjusts to the needs of others • Receptive to feedback from others 	<p>...and</p> <ul style="list-style-type: none"> • Seeks out resources to resolve conflicts • Provides alternative solutions or options to others 	<p>...and</p> <ul style="list-style-type: none"> • Anticipates challenges and conflicts and seeks to mitigate • Persuades and influences others to take needed actions • Adapts product or process to meet the needs of the audience, customer, or project
Personal Qualities	<i>Initiative</i>	<ul style="list-style-type: none"> • With some supervision, completes assigned tasks on time and at a high-quality level • Communicates any potential delays to supervisor/teacher • Demonstrates diligence, perseverance, and self-control 	<p>...and</p> <ul style="list-style-type: none"> • Asks questions to complete tasks • Plans out tasks 	<p>...and</p> <ul style="list-style-type: none"> • Understands and adheres to performance and accountability expectations • Seeks leadership opportunities 	<p>...and</p> <ul style="list-style-type: none"> • Identifies and completes tasks without being told • Gives suggestions of new tasks or ways to improve current processes • Completes high-quality, independent work on time without direct supervision
	<i>Adaptability</i>	<ul style="list-style-type: none"> • Asks for help • Seeks feedback, guidance, and information in a proactive manner 	<p>...and</p> <ul style="list-style-type: none"> • Compromises • Shows resilience in the face of constraints, frustrations, or adversity 	<p>...and</p> <ul style="list-style-type: none"> • Accepts constructive criticism and modifies behavior • Embraces new methods or approaches 	<p>...and</p> <ul style="list-style-type: none"> • Seeks new learning opportunities • Adjusts to multiple demands, shifting priorities, ambiguity, and rapid change

Work Based Learning Employability Skill Rubric

Skill	Criteria	Emerging	Developing	Accomplished	Exemplary
	<i>Professionalism and integrity</i>	<ul style="list-style-type: none"> Understands and adheres to ethical codes of conduct Demonstrates principles and values that align to the workplace/ classroom Demonstrates trustworthiness, honesty, loyalty, punctuality, and reliability Possesses a positive attitude and demeanor when working with others Dresses and grooms appropriately Handles information confidentially and appropriately Maintains a professional and appropriate social media presence 	<p>...and</p> <ul style="list-style-type: none"> Attributes ideas and information to source materials and people Understands own strengths and opportunities for improvement Follows through on promises and commitments 	<p>...and</p> <ul style="list-style-type: none"> Advocates for oneself by communicating needs Takes actions to build skills 	<p>...and</p> <ul style="list-style-type: none"> Maintains a positive attitude and professional demeanor under difficult situations Admits mistakes and takes personal responsibility Takes ownership for professional growth
Workplace Skills					
Resource Management	<i>Manages time, money, resources, and personnel</i>	<ul style="list-style-type: none"> Arrives on time Identifies resources available and needed to complete project or tasks Completes tasks in the allotted time and manages own time appropriately Adheres to budget or resources allocated 	<p>...and</p> <ul style="list-style-type: none"> Uses resources and materials effectively Understands roles of others and the value of their time Takes inventory of materials Understands project or task timeline 	<p>...and</p> <ul style="list-style-type: none"> Creates a plan to complete work on time Identifies and understands strengths and opportunities for growth of team members Assigns staff roles or tasks based on strengths 	<p>...and</p> <ul style="list-style-type: none"> Understands how resources affect profitability and timelines Maximizes resources to save money and/or time Prioritizes use of resources based on organizational goals or classroom guidelines

Work Based Learning Employability Skill Rubric

Skill	Criteria	Emerging	Developing	Accomplished	Exemplary
Information Use	<i>Locate, organize, analyze, use, and communicate information</i>	<ul style="list-style-type: none"> Utilizes handbooks or documents to guide information flow Identifies valid, reliable, and relevant sources Follows guidelines for information storage and organization Applies relevant and credible information and sources to complete tasks 	<p>...and</p> <ul style="list-style-type: none"> Organizes information based on clear patterns Identifies which information is relevant and important to tasks 	<p>...and</p> <ul style="list-style-type: none"> Prioritizes information Communicates with clarity to others Presents analyzed data and communicates findings in a variety of formats 	<p>...and</p> <ul style="list-style-type: none"> Seeks out resources and information relevant to the work or project in an independent manner Analyzes relationships and patterns in information or data Understands the connection of information to other tasks or parts of the project
Communication	<i>Verbal communication</i>	<ul style="list-style-type: none"> Speaks clearly and audibly with proper enunciation Expresses ideas clearly in groups and one-to-one conversations Uses nonverbal cues appropriately aligned to message 	<p>...and</p> <ul style="list-style-type: none"> Uses appropriate and professional language Uses technical terminology and academic vocabulary accurately Identifies appropriate communication style to achieve goals 	<p>...and</p> <ul style="list-style-type: none"> Communicates persuasively Checks for understanding and rephrases 	<p>...and</p> <ul style="list-style-type: none"> Plans and presents oral presentations Paces presentations appropriately to convey message and ideas Understands cultural implications of communication
	<i>Active listening</i>	<ul style="list-style-type: none"> Exhibits culturally appropriate body language Responds to verbal and nonverbal cues from others Applies what was heard to the task 	<p>...and</p> <ul style="list-style-type: none"> Takes notes while listening 	<p>...and</p> <ul style="list-style-type: none"> Restates or repeats what was heard to confirm information Responds and asks clarifying questions 	<p>...and</p> <ul style="list-style-type: none"> Summarizes key points discussed
	<i>Comprehends written material</i>	<ul style="list-style-type: none"> Understands and follows written directions and policies Reads materials specific to work or tasks 	<p>...and</p> <ul style="list-style-type: none"> Asks clarifying questions regarding technical or work-specific written materials 	<p>...and</p> <ul style="list-style-type: none"> Summarizes key points from technical or work-specific written materials 	<p>...and</p> <ul style="list-style-type: none"> Offers feedback and critiques to technical or work-specific written materials

Work Based Learning Employability Skill Rubric

Skill	Criteria	Emerging	Developing	Accomplished	Exemplary
	<i>Conveys information in writing</i>	<ul style="list-style-type: none"> Writes clearly and coherently using standard writing conventions Cites properly 	<p>...and</p> <ul style="list-style-type: none"> Identifies appropriate method, medium, format, and style to convey information 	<p>...and</p> <ul style="list-style-type: none"> Conveys written information in multiple industry or career-specific mediums and formats Reviews and edits written work constructively 	<p>...and</p> <ul style="list-style-type: none"> Writes using the industry or academic-specific terminology Conveys information effectively and accurately through formal and informal documents
Systems Thinking	<i>Understands, uses, monitors, and improves systems</i>	<ul style="list-style-type: none"> Understands how information and processes flow within organizations Understands relationship between various departments and systems Understands organizational makeup and structure Identifies processes and procedures used within organizations 	<p>...and</p> <ul style="list-style-type: none"> Understands how components fit within and support a system Understands how processes and procedures create efficiencies within organizations 	<p>...and</p> <ul style="list-style-type: none"> Evaluates inefficiencies within a system Recommends improvements to processes and procedures to address inefficiencies 	<p>...and</p> <ul style="list-style-type: none"> Takes appropriate action based on systems in the school or workplace Understands assumptions and beliefs of different entities and/or groups within the system Identifies approaches or strategies to monitor systems
Technology Use	<i>Understands and uses technology</i>	<ul style="list-style-type: none"> Understands and follows safety and guidelines procedures for tools and technology Identifies which technologies are necessary for the job or career 	<p>...and</p> <ul style="list-style-type: none"> Understands which technologies are needed to complete specific academic or workplace tasks 	<p>...and</p> <ul style="list-style-type: none"> Uses appropriate technology to complete tasks 	<p>...and</p> <ul style="list-style-type: none"> Produces a product using appropriate technology Seeks opportunities to improve technological skills
Applied Knowledge					
Applied Academic Knowledge	<i>Academic application</i>	<ul style="list-style-type: none"> Identifies academic knowledge (i.e., reading, writing, mathematics, science, social studies) most relevant to achieving college and career goals 	<p>...and</p> <ul style="list-style-type: none"> Understands which academic knowledge is most relevant to classroom or work tasks 	<p>...and</p> <ul style="list-style-type: none"> Applies relevant academic knowledge to complete a classroom or workplace task 	<p>...and</p> <ul style="list-style-type: none"> Applies relevant academic knowledge to solve a classroom or workplace problem

Work Based Learning Employability Skill Rubric

Skill	Criteria	Emerging	Developing	Accomplished	Exemplary
Critical Thinking	<i>Problem solving</i>	<ul style="list-style-type: none"> • Identifies the problem or core issue • Utilizes a process to solve problems 	<p>...and</p> <ul style="list-style-type: none"> • Negotiates pros and cons of ideas, approaches, and solutions • Develops a plan to address problems • Learns from mistakes from past issues or problems 	<p>...and</p> <ul style="list-style-type: none"> • Debates an issue and converges to an understanding by questioning and assessing problems • Displays analytical and strategic thinking • Develops and applies multiple strategies to solve a problem 	<p>...and</p> <ul style="list-style-type: none"> • Develops and defends solutions to problems based on evidence • Evaluates potential solutions for best possible outcomes • Considers a broad range of internal and external factors when solving problems and making decisions
	<i>Creative thinking</i>	<ul style="list-style-type: none"> • Proposes familiar approaches to address challenges or complete tasks • Offers ideas that are outside the norm 	<p>...and</p> <ul style="list-style-type: none"> • Generates alternative solutions and ideas to address challenges and complete tasks 	<p>...and</p> <ul style="list-style-type: none"> • Creates and shares innovative solutions to address challenges and ideas to complete tasks 	<p>...and</p> <ul style="list-style-type: none"> • Contributes to a culture of innovation • Takes risks when justified • Understands design in products and processes

**TEA APPENDIX 6:
College and Career Readiness School Models for Early College High Schools,
P-Tech/ICIA High Schools and T-STEM High Schools**

The Early College High School Blueprint

Design Elements



All designated ECHSs (Provisional, Early College, Distinguished Early College) are required to meet all of the design elements for each benchmark annually.



All designated ECHSs (Provisional, Early College, Distinguished Early College) are required to meet OBMs on data indicators related to access, achievement, and attainment.

Outcomes-Based Measures (OBMs)

PROVISIONAL EARLY COLLEGE



Provisional Early Colleges are new ECHSs that demonstrate they can implement all the design elements for each benchmark and meet the Provisional Early College OBMs. For public purposes, campuses are identified as Early College.

EARLY COLLEGE



Early College designees maintain designation by demonstrating they can implement all of the design elements for each benchmark and meet the Early College OBMs.

DISTINGUISHED EARLY COLLEGE



Distinguished Early Colleges have been designated as Early Colleges for at least five years, and demonstrate that they can implement all of the design elements for each benchmark and meet the Distinguished Early College OBMs.

Needs Improvement



At any time, if an ECHS doesn't meet the OBMs, the ECHS may be categorized as needs improvement and will receive targeted technical assistance and has no more than two years to meet the OBMs or no longer receive designation. If a Distinguished Early College doesn't meet the OBMs, the ECHS will be designated as an Early College, given that they meet the Early College OBMs.

TEA is currently in a phase-in process for the new ECHS Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.





Benchmark 1: Target Population

The Early College High School shall serve, or include plans to scale up to serve, students in grades 9 through 12, and shall target and enroll students who are at risk of dropping out of school as defined by the Public Education Information Management System (PEIMS) and who might not otherwise go to college.

Design Elements

All ECHSs must implement and meet the following requirements:

1. The ECHS recruitment and enrollment processes shall identify, recruit, and enroll the subpopulations of at-risk students (as defined by PEIMS), including, but not limited to, students who are of limited English proficiency, students with disabilities, or students who have failed a state administered assessment. Enrollment decisions shall not be based on state assessment scores, discipline history, teacher recommendation, parent or student essays, minimum grade point average (GPA), or other criteria that create barriers for student enrollment.
2. The ECHS shall identify, recruit, and enroll subpopulations (in addition to those who are at risk as defined by PEIMS) that are historically underrepresented in college courses (e.g., first generation college goers, students of low socioeconomic status, African American, Hispanic, Native American.)
3. The ECHS shall clearly document recruitment and enrollment policies and practices; refining and improving them annually based on data reviews.
4. Recruitment and enrollment processes (including marketing and recruitment plans, materials, and timelines) shall include input from key stakeholders (e.g., parents and community members; postsecondary partners); target student populations as described in 1 and 2 above; and include regular activities to educate students, counselors, principals, parents, and school board and community members.
5. For admissions, the ECHS shall use either a performance-blind, open-access lottery system that encourages and considers applications from all students (all students have an equal opportunity for acceptance, regardless of background or academic performance) or a weighted lottery that favors students who are at risk or who are part of the targeted subpopulations for the ECHS.

Required Activities and Products

Activities:

- All products shall be published on the ECHS’s website and be made available to TEA upon request.
- All products shall be maintained in accordance with the local records retention policy.

Products:

- Written admission policy and enrollment application
- Written recruitment plan including a timeline of recruitment and enrollment events, and recruitment materials for distribution at feeder schools and other appropriate locations in the community
- Brochures and marketing in Spanish, English, and/or other relevant language(s)
- Written communication plan for targeting identified audiences, parents, community members, school board, higher education personnel, etc.



Benchmark 2: Partnership Agreement

The Early College High School shall have a current, signed Memorandum of Understanding (MOU) for each school year that:

- Defines the partnership between the school district(s) and the institution(s) of higher education (IHE) and addresses topics including, but not limited to, the ECHS location; transferability of college credit between a 2-year and 4-year institution; the allocation of costs for tuition, fees, and textbooks; and student transportation;
- States that the school district or charter in which the student is enrolled shall pay for college tuition (for all dual credit courses, including retakes), fees (including TSI administration fees), and required textbooks to the extent those charges are not waived by the partner IHE;
- Defines an active partnership between the school district(s) and the IHE(s), which shall include joint decision-making procedures that allow for the planning and implementation of a coherent program across institutions; and
- Includes provisions and processes for collecting, sharing, and reviewing program and student data to assess the progress of the ECHS.

Design Elements

All ECHSs shall develop, sign, and execute a MOU that includes the following components (at a minimum):

- Courses of study, which enables a student to combine high school courses and college-level courses to earn either an associate degree or at least 60 semester credit hours toward a baccalaureate degree
- Curriculum alignment
- Policy for advising students on the transferability of all college credit offered and earned
- Policy to ensure the IHE transcripts college credit earned through dual credit in the same semester that credit is earned
- Policy regarding advising students as to the transferability and applicability to baccalaureate degree plans for all college credit offered and earned (college credits earned during high school should allow students to progress from an associates degree to a bachelor's degree and beyond in their chosen field)
- ECHS students access to the IHE facilities, services and resources
- Policies regarding eligibility of ECHS students for financial assistance from the higher education partner(s), specifically, waivers for tuition and fees
- Professional development for ECHS faculty (including both district and IHE faculty/staff)
- Data sharing agreement that includes provisions for:
- Teacher data such as qualifications
- Student level data such as credit hours taken and earned; GPA, formative data to assess if student is on track to be successful in college level courses
- Administration of statewide instruments under TEC Subchapter B, Chapter 39
- Transportation costs and fees

- Grading periods and policies
- Instructional materials
- Instructional calendar including location of each course that will be offered
- Student enrollment and attendance policies
- Provisions for discontinuing ECHS operation and the ensure students previously enrolled will have opportunity to complete their course of study

Required Activities and Products

Activities:

- All products shall be published on the ECHS's website and be made available to TEA upon request.
- All products shall be maintained in accordance with the local records retention policy.
- Campuses must submit their final signed MOU to TEA when initially applying for early college designation or are provisionally designated.
- ECHS Campuses that are designated early college or distinguished early college are not required to submit the MOU during the annual designation process (but must have it available upon TEA request).
- ECHS campuses in needs improvement may be required to resubmit their MOU to TEA.

Products:

- Final, signed, and executed MOU



Benchmark 3: P-16 Leadership Initiatives

The school district and institution(s) of higher education (IHE) partners shall develop and maintain a leadership team that meets regularly (e.g., quarterly) to address issues of design, implementation, ongoing implementation, and sustainability. Membership should include the Early College High School leader and individuals with decision-making authority from the district(s) and IHE(s).

Design Elements

All ECHSs must implement and meet the following requirements:

1. The ECHS shall establish a leadership team that includes high-level personnel with decision-making authority who meet regularly and report to each organization. Regularly scheduled meetings must address the following topics:
 - a. Identify members and the role each member will play in the design, governance, operations, accountability, curriculum development, professional development, outreach, sustainability, and continuous monitoring and improvement of the ECHS
 - b. Annually review the MOU for necessary revisions
 - c. Assume shared responsibility (between the school district and the IHE) for meeting annual outcomes-based measures and providing annual reports to their district and IHE boards, as well as to the public.
 - d. Monitor progress on meeting the Blueprint, including reviewing data to ensure the ECHS is on-track to meet outcomes-based measures
 - e. Guide mid-course corrections as needed
2. The leadership team shall include and meet regularly—in person and/or virtually—with the leaders from the district and IHE who have decision-making authority:

District leaders (may include):

- Superintendent
- Assistant superintendent of curriculum and instruction, or equivalent position
- ECHS principal or director
- CTE Director (if applicable to the ECHS model)
- Department Chairs
- School counselors
- School-business partners

IHE leaders (may include):

- College or university president
- Provost
- Department Chairs for core academic disciplines
- ECHS liaison

3. Sustainability structures shall be identified and implemented to address and minimize the challenges of staff turnover and potential fluctuations in funding.

Required Activities and Products

Activities:

- All products shall be published on the ECHS’s website and be made available to TEA upon request.
- All products shall be maintained in accordance with the local records retention policy.

Products:

- ECHS/IHE leadership meeting agendas and minutes
- School board and board of regents’ presentations
- Description of each member and role in committee



Benchmark 4: Curriculum and Support



The Early College High School shall provide a rigorous course of study that enables a participating student to receive a high school diploma and complete the Texas Higher Education Coordinating Board's (THECB) core curriculum (as defined by the Texas Administrative Code (TAC) §4.28), obtain certifications, or earn an associate's degree, or earn at least 60 credit hours toward a baccalaureate degree during grades 9-12. The ECHS shall provide students with academic, social, and emotional support in their course of study.

Design Elements

All ECHSs must implement and meet the following requirements:

1. The ECHS shall provide a course of study that enables participating students the opportunity to complete high school graduation requirements and earn an associate's degree or at least 60 semester credit hours toward a baccalaureate degree. A four-year crosswalk must be in place detailing how students will progress toward this goal including alignment of high school and college level courses. This crosswalk must provide pathways to a certification, an associate's degree, or a baccalaureate degree and must follow the courses and fields of study listed in the THECB Lower Division Academic Course Guide Manual (ACGM) and/or the Workforce Education Course Manual (WECM). The campus may implement multiple dual enrollment delivery models:
 - a. College courses taught on the college campus by college faculty
 - b. College courses taught on the high school campus by college faculty
 - c. College courses taught on the high school campus by qualified high school faculty
 - d. College courses taught virtually, via distance/online/blended learning
2. The ECHS shall support students in their course of study.
 - a. The ECHS shall provide academic support to the students by personalizing the learning environment in the following ways:
 - Developing individualized student plans for ongoing academic support,
 - Providing tutoring and/or Saturday school for identified students in need of academic supports,
 - Providing advisory and/or college readiness and support time built into the program of study for all students, and
 - Establishing a mentorship program available to all students.
 - b. The ECHS shall provide social and emotional support to the students as needed, including:
 - connections to social services
 - parent outreach and involvement opportunities
 - c. The ECHS shall provide enrichment opportunities, including:
 - A structured program of community service to promote community involvement.
 - Partnering with community businesses to expose students to a variety of potential career options and possible internship opportunities.
 - Providing college awareness to current and prospective students and families, including:
 - i. Application assistance,

- II. Financial aid counseling, and
 - III. College and career counseling.
3. The ECHS shall biannually implement a structured data review processes designed to identify student strengths and weaknesses and develop individual instructional support plans.

Required Activities and Products

- Activities:**
- All products shall be published on the ECHS’s website and be made available to TEA upon request.
 - All products shall be maintained in accordance with the local records retention policy.
- Products:**
- 60 college credit hours crosswalk
 - Calendar of family outreach events
 - Professional learning community agendas and notes
 - Advisory/study skills curriculum material
 - Master schedules





Benchmark 5: Academic Rigor and Readiness

The Early College High School shall administer a Texas Success Initiative (TSI) college placement exam (as defined by TAC §4.53) to all accepted ECHS students to assess college readiness, design individual instructional support plans, and enable students to begin college courses based on their performance on the exam.

Design Elements

All ECHSs must implement and meet the following requirements:

1. The ECHS shall provide a TSI assessment to accepted students as early as possible (however, not as a prerequisite for admissions to the ECHS).
 - a. The ECHS shall implement a plan for TSI success, including academic preparation classes for accepted students, academic interventions for students who do not pass TSI, and assessments fee waivers for all administrations of the TSI test.
 - b. The ECHS shall publish on their website the dates the TSI will be administered.
 - c. The ECHS shall review TSI testing data, particularly the number/percentage of students who have currently passed each section of the TSI assessment, to ensure the ECHS is on track to meeting outcomes-based measures (see below).
2. The ECHS is a TSI assessment site, or is in the process of becoming a TSI assessment site, allowing frequent testing and access to raw data that can be used to identify student weaknesses and create tailored interventions and individualized instructional plans to improve student readiness and success.
3. The ECHS provides a bridge program (an intensive academic preparation program that provides opportunities to strengthen academic skills necessary for high school and college readiness) to prepare students for TSI and provide academic interventions for those who do not pass TSI.

Required Activities and Products

Activities:

- All products shall be published on the ECHS's website and be made available to TEA upon request.
- All products shall be maintained in accordance with the local records retention policy.

Products:

- Calendar of TSI test administration dates
- Aggregate reports of TSI exam performance
- Tutoring and bridge program schedules
- Bridge program curriculum



Benchmark 6: School Design

The Early College High School must provide a full-day program (i.e., full day as defined in PEIMS) at an autonomous high school (i.e., a high school with ECHS leader assigned to ECHS responsibilities who has scheduling, hiring, and budget authority), an IHE liaison with decision-making authority, and a highly qualified staff with support and training.

Design Elements

All ECHSs must implement and meet the following:

1. The ECHS location shall be:
 - a. On a college or university campus, or
 - b. In a high school—as a standalone high school campus or in a smaller learning community within a larger high school.
2. ECHS staff shall include:
 - a. An ECHS leader who has scheduling, hiring, and budget autonomy
 - b. An IHE liaison with decision-making authority and interacts directly and frequently (in-person or virtually) with ECHS the leader and the dual credit provider
 - c. Highly qualified ECHS teachers who work directly with the ECHS students, which may include adjunct high school faculty capable of teaching college-level courses
 - d. Counseling staff who support the ECHS students, including activities such as: coordinating with the IHE for registration and monitor of students' high school and college transcripts, monitoring high school and college courses to ensure both requirement are met.
3. The ECHS students shall be cohorted for core classes to the extent possible; this does not exclude non-ECHS students from enrolling in the same class.
4. ECHS shall implement an annual professional development plan for teachers and staff, focused on research-based instructional strategies that focus on rigor, build college- and career-readiness, is based on needs assessment of student data, and includes both high school and dual credit teachers. Professional development should include, but is not limited to:
 - a. A mentoring and induction program for newly hired staff, providing them with the instructional and interpersonal skills and capacities needed for success in an ECHS.
 - b. Provide opportunities for ECHS teachers and higher-education faculty to receive extensive training and support through regularly scheduled formative peer observations and collaboration opportunities with IHE faculty.

Required Activities and Products

Activities:

- All products shall be published on the ECHS's website and be made available to TEA upon request.
- All products shall be maintained in accordance with the local records retention policy.

Products:

- Mentor/induction program plans
- Annual training or professional development plan with ECHS and IHE faculty
- ECHS leader/liaison meeting agendas and notes

Access Outcomes-Based Measures

TEA is currently in a phase-in process for the new ECHS Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional Early College	Early College	Distinguished Early College
Requirements	Must meet at-risk students for incoming 9th graders and at least three additional target population data indicators	Must meet at-risk students for incoming 9th graders and at least three additional target population data indicators	Must meet at-risk students for incoming 9th graders and at least four additional target population data indicators
ECHS proportionate to or over-represents at-risk students for incoming 9th graders	No more than 20% points under district	No more than 15% points under district	No more than 10% points under district
ECHS proportionate to or over-represents economically disadvantaged students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
ECHS proportionate to or over-represents African American students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
ECHS proportionate to or over-represents Hispanic students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
ECHS proportionate to or over-represents males	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
ECHS proportionate to or over-represents ELL and SWDs	Not taken into account for designation	Not taken into account for designation	No more than 5% points under district

Attainment Outcomes-Based Measures

TEA is currently in a phase-in process for the new ECHS Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators		Provisional Early College	Early College	Distinguished Early College
Requirements		Must meet college English, college math, and 15 college credit targets	Must meet targets on at least five attainment data indicators	Must meet targets on at least six attainment data indicators
Grade-to-grade persistence by subgroup (weighted)		Not taken into account for designation	Calculated to ensure the school meets the 4-year graduation target	Calculated to ensure the school meets the 4-year graduation target
Completing one college-level English course by end of 11th grade (any)		80% of students (by the fourth year of implementation)	90% of students	100% of students
Completing one college-level math course by end of 11th grade (any)		80% of students (by the fourth year of implementation)	90% of students	100% of students
Earning 15 college credits (any) by graduation		50% of students (by the fourth year of implementation)	80% of students	95% of students
Earning 30 college credits (any) by graduation		Not taken into account for designation	50% of students	65% of students
Earning postsecondary degree and/or credential by high school graduation		Not taken into account for designation	30% of students	40% of students
Graduating high school in 4 years (4-year cohort graduation rate)		Not taken into account for designation	Meets the statewide 4-year graduation rate	Exceeds the statewide 4-year graduation rate

Achievement Outcomes-Based Measures

TEA is currently in a phase-in process for the new ECHS Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional Early College	Early College	Distinguished Early College
Requirements	Must meet at least three TSI targets	Must meet at least four achievement data indicators	Must meet at least five achievement data indicators
TSI College Readiness Standards in reading	65% passing rate	70% passing rate	75% passing rate
TSI College Readiness Standards in writing	75% passing rate	80% passing rate	85% passing rate
TSI College Readiness Standards in math	50% passing rate	60% passing rate	75% passing rate
TSI College Readiness Standards in all 3 subjects	35% passing rate	40% passing rate	50% passing rate
Algebra I EOC assessment in 9 th grade	Not taken into account for designation	85% of students passing	45% percent of students passing and meeting the advanced standard
English II EOC assessment (grades 9-11)	Not taken into account for designation	85% of students passing	25% percent of students passing and meeting the advanced standard

P-TECH/ICIA Blueprint



Benchmark 1: School Design

The P-TECH/ICIA program must offer open enrollment and flexible scheduling structures that enable students to combine high school, postsecondary courses and work-based learning, at no cost to participating students.

Design Elements

All P-TECH/ICIAs must implement and meet the following requirements:

1. The P-TECH/ICIA location shall be:
 - a. In a high school, or
 - i. as a standalone high school campus or
 - ii. in a smaller learning community within a larger high school
 - b. At a central location, such as a CTE Center where students are enrolled at their home campus, or
 - c. On a college or university campus
2. P-TECH/ICIA staff shall include:
 - a. A building level leader who has scheduling, hiring, and budget decisions
 - b. Industry/Business partner liaison with decision making authority who interacts directly and frequently (in person or virtually) with P-TECH/ICIA leader
 - c. An Institute of Higher Education (IHE) liaison with decision making authority and interacts directly and frequently (in person or virtually) with P-TECH/ICIA leader
 - d. Highly qualified P-TECH/ICIA teachers who work directly with the students, which may include adjunct high school faculty capable of teaching college-level courses
 - e. Counseling staff who support P-TECH/ICIA students, including activities such as: coordinating with Institutions of Higher Education (IHE) for registration, monitoring of students' high school and college transcripts, and monitoring high school and college courses to ensure all requirements are met
3. The P-TECH/ICIA shall establish a leadership team that includes high-level personnel from the school district, campus, industry/business partners, and IHE with decision-making authority who meet regularly and report to each organization. Regularly scheduled meetings must address the following topics:
 - a. Identification of members and the role each member will play in the design, governance, operations, accountability, curriculum development, professional development, outreach, sustainability, and continuous monitoring and improvement of the P-TECH/ICIA
 - b. Share responsibility (between the school district, campus, industry/business partners, and IHE) for meeting annual outcomes-based measures and providing annual reports to their respective boards as well as to the public
 - c. Monitoring of progress on meeting the Blueprint, including reviewing data to ensure the P-TECH/ICIA is on-track to meet outcomes-based measures
 - d. Mid-course corrections as needed
 - e. Sustainability structures to address and minimize the challenges of staff turnover and potential fluctuations in funding
4. The leadership team shall include and meet regularly (in person and/or virtually) with the leaders from the school district, campus, business/industry, chambers of commerce, non-profit foundations, and IHE who have decision-making authority:

P-TECH/ICIA Blueprint

Benchmark 1: School Design

The P-TECH/ICIA program must offer open enrollment and flexible scheduling structures that enable students to combine high school, postsecondary courses and work-based learning, at no cost to participating students.

Design Elements

District leaders (may include):

- a. Superintendent
- b. Assistant superintendent of curriculum and instruction, or equivalent position
- c. P-TECH/ICIA principal or director
- d. CTE Director (if applicable to the P-TECH/ICIA model)
- e. Department chairs
- f. School counselors

Business/Industry Partner (may include):

- a. CEO/President
- b. Education/Community Outreach Specialist/Community Organizations such as a Chamber of Commerce and Non-Profit Foundations

IHE leaders (may include):

- a. College or university president
- b. Provost
- c. Department chairs for core academic disciplines
- d. P-TECH/ICIA liaison

5. Implement an annual professional development plan for teachers and staff, focused on research-based instructional strategies that focus on rigor, build college- and career-readiness, are based on needs assessment of student data, and includes both high school and dual credit teachers. Professional development may include, but is not limited to:
 - a. A mentoring and induction program for newly hired staff, providing them with the instructional and interpersonal skills and capacities needed for success in an advanced academic setting
 - b. An externship program to expose teachers, counselors, and/or administrators to content in careers in the pathways identified by the P-TECH/ICIA
 - c. Opportunities for teachers to collaborate, plan and engage in relevant professional development
6. Provide opportunities for P-TECH/ICIA teachers to receive extensive training and support through regularly scheduled formative peer observations and collaboration opportunities with feeder pattern focus groups, industry/business and/or IHE partners
7. The P-TECH/ICIA program shall provide flexible, individualized scheduling that allows students the opportunity to earn a high school diploma, industry certifications, an associate degree, and engage in appropriate work-based learning at every grade level
8. The P-TECH/ICIA students shall be cohorted into core classes to the extent possible; this does not exclude non-P-TECH/ICIA students from enrolling in the same class
9. The P-TECH/ICIA program shall be offered at no cost to students

P-TECH/ICIA Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the P-TECH/ICIA website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy

Products

- a. Mentor/induction program plans
- b. Annual training or professional development plan with P-TECH/ICIA and IHE faculty
- c. P-TECH/ICIA leadership meeting agendas and notes

P-TECH/ICIA Blueprint

Benchmark 2: Target Population

The P-TECH/ICIA program shall serve, or include plans to scale up to serve, students in Grades 9 through 14, and shall target and enroll students who are at risk of dropping out of school as defined by the Public Education Information Management System (PEIMS) and who might not otherwise go to college.

Design Elements

All P-TECH/ICIAs must implement and meet the following requirements:

1. The P-TECH/ICIA shall be open enrollment for all students. Recruitment and enrollment processes shall identify, recruit, and enroll subpopulations of at-risk students (as defined by PEIMS), including, but not limited to, students who are of limited English proficiency, students with disabilities, or students who have failed a state administered assessment. Enrollment decisions shall not be based on state assessment scores, discipline history, teacher recommendation, parent or student essays, minimum grade point average (GPA), or other criteria that create barriers for student enrollment.
2. The P-TECH/ICIA shall identify, recruit, and enroll subpopulations (in addition to those who are at risk as defined by PEIMS) that are historically underrepresented in college courses (e.g., first generation college goers, students of low socioeconomic status, African American, Hispanic, Native American)
3. The P-TECH/ICIA shall clearly document recruitment and enrollment policies and practices; refining and improving them annually based on data reviews
4. Recruitment and enrollment processes (including marketing and recruitment plans, materials, and timelines) shall be transparent in program requirements, and include input from key stakeholders (e.g., parents and community members; postsecondary partners); target student populations as described in 1 and 2 above; and include regular activities to educate students, counselors, principals, parents, and school board and community members
5. If the P-TECH/ICIA has more applicants than available space for admissions, they shall use either a performance-blind, open-access lottery system that encourages and considers applications from all students (all students have an equal opportunity for acceptance, regardless of background or academic performance) or a weighted lottery that favors students who are at risk or who are part of the targeted subpopulations for the P-TECH/ICIA

Required Activities and Products

Activities

- a. All products shall be published on the P-TECH/ICIA academy website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy

Products

- a. Written admission policy and enrollment application
- b. Written recruitment plan including a timeline of recruitment and enrollment events, and recruitment materials for distribution at feeder schools and other appropriate locations in the community
- c. Brochures and marketing in Spanish, English, and/or other relevant language(s)
- d. Written communication plan for targeting identified audiences, parents, community members, school board, higher education personnel, etc.

P-TECH/ICIA Blueprint

Benchmark 3: Strategic Alliances

Strategic partnerships with business and industry partners and IHEs are formally articulated in writing and clearly define a variety of careers.



Design Elements

All P-TECH/ICIAs must implement and meet the following requirements based on the pathways to be offered to students i.e. pathways to an associate degree, postsecondary certificate provided by an IHE, or industry certification:

1. The P-TECH/ICIA shall develop, sign, and execute a memorandum of understanding (MOU) that clearly define the roles and responsibilities of a strong partnership with business and/or industry partners to provide (at a minimum):
 - a. A detailed plan for work-based learning experiences for students appropriate to each grade level, such as facility visits, guest speakers, presentations, career information, job shadowing, internships, externships, and apprenticeships
 - b. Clear roles and responsibilities for worksite supervisors, mentors, teachers, support personnel, and other partners
 - c. Career mentoring with industry/business partner
 - d. Support for students' activities, such as clubs, Career and Technical Student Organizations, competitions, and special initiatives
 - e. Each MOU must include an agreement that the regional industry or business partner will give to a student who receives work based training or education from the partner under the P-TECH/ICIA program priority in interviewing for any jobs for which the student is qualified that are available on the student's completion of the program
 - f. Course path and program monitoring
 - g. The MOU should state clearly the industry certifications that will be acquired and the standards/curriculum that will be followed to achieve stated certifications
 - h. Student access to business and industry partners and work-based learning facilities, services, and resources
 - i. Transportation costs and fees
2. The P-TECH/ICIA shall develop, sign, and execute an articulation agreement with an IHE that includes the following components (at a minimum):
 - a. Curriculum alignment
 - b. Instructional materials
 - c. Courses of study, which enables a student to combine high school courses and college-level courses to earn either an associate degree postsecondary certificate provided by an IHE, or industry certification
 - d. Student enrollment and attendance
 - e. Grading periods and policies
 - f. Administration of statewide assessments under TEC Subchapter B, Chapter 39
 - g. Policies for:
 - i. advising students on the transferability of all college credit offered and earned
 - ii. ensuring the IHE transcripts college credit earned through dual credit in the same semester that credit is earned

P-TECH/ICIA Blueprint



Benchmark 3: Strategic Alliances

Strategic partnerships with business and industry partners and IHEs are formally articulated in writing and clearly define a variety of careers.

Design Elements

- iii. advising students as to the transferability and applicability to baccalaureate degree plans for all college credit offered and earned (college credits earned during high school should allow students to progress from an associate degree to a bachelor's degree and beyond in their chosen field)
 - iv. students accessing to the IHE facilities, services and resources
 - h. Eligibility of students for waivers for tuition & fees
 - i. Data sharing agreement that includes provisions for:
 - i. Teacher data such as qualifications
 - ii. Student level data such as credit hours taken and earned; GPA, formative data to assess if student is on track for college readiness
 - j. Transportation costs and fees
 - i. Provisions for discontinuing operation while ensuring students previously enrolled will have opportunity to complete their course of study
3. Establish an Advisory Board who meets regularly and includes representatives from a variety of stakeholders such as; school board, community, economic development partners, relevant industry subject matter experts for program pathways, and IHE to provide support and guidance to the P-TECH/ICIA in resource acquisition, curriculum development, work-based learning and student/community outreach to ensure a successful academic and career pipeline

P-TECH/ICIA Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the P-TECH/ICIA website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy
- c. Annual review of industry/business MOU
- d. Annual review of IHE articulation agreement

Products

- a. Meeting agendas and minutes, with action items and decision logs
- b. Final, signed, and executed MOU with industry partner/business (Campuses must submit their final signed MOU to TEA when initially applying for designation or are provisionally designated)
- c. Final, signed, and executed articulation agreement with IHE (Campuses must submit their final signed MOU to TEA when initially applying for designation or are provisionally designated)
- d. A list of strategic partners with each member's organization, title and role in providing work-based learning for students by grade level

P-TECH/ICIA Blueprint



Benchmark 4: Curriculum, Instruction, and Assessment

The P-TECH/ICIA program shall provide a rigorous course of study that enables a participating student to receive a high school diploma, an associate degree, postsecondary certificate provided by an IHE, or industry certification during Grades 9-14.

Design Elements

All P-TECH/ICIAs must implement and meet the following requirements:

1. The P-TECH/ICIA shall work with the local workforce development board, local chamber of commerce, and local workforce industry representatives to identify, create and maintain a list of high-demand occupations and programs of study that lead to these occupations to be used as a resource in creating structured pathways for students and updated as local needs change
2. The P-TECH/ICIA shall establish one or more career pathways, that include industry relevant classes, and plans are underway for sequencing additional courses for students. These course pathways are informed by regional and state workforce and economic development needs and contribute to students earning an associate degree, postsecondary certificate provided by an IHE, or industry certification that prepares them for high-wage, high-demand, high-skill career fields
3. The P-TECH/ICIA shall provide a course of study that enables participating students the opportunity to complete high school graduation requirements, and either an associate degree, postsecondary certificate provided by an IHE, or industry certification on or before the sixth anniversary of the date of the student's first day of high school
 - a. A course of study must be in place detailing how students will progress toward the goal of aligning high school, college-level courses, and industry/business training. This course of study must provide pathways to an associate degree, postsecondary certificate provided by an IHE, or an industry certification. The campus may implement a variety of instructional delivery models
4. The P-TECH/ICIA shall provide an assessment for measuring student progress to ensure students are on track to meet the Outcomes-Based Measures
5. The P-TECH/ICIA shall biannually implement a structured data review process designed to identify student strengths and weaknesses and develop individual instructional support plans
 - a. The P-TECH/ICIA will establish annual assessment measures and provide an opportunity for the industry/business partners to provide feedback on the value of the P-TECH/ICIA program
6. The P-TECH/ICIA shall provide support for students taking courses preparing students to obtain industry certifications, licenses, etc.
6. The P-TECH/ICIA shall work with IHEs and business and industry partners to ensure curriculum alignment between high school, postsecondary and industry experience requirements

P-TECH/ICIA Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the P-TECH/ICIA website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy

Products

- a. Four-year crosswalk document
- b. Master Schedule
- c. Curriculum alignment documents
- d. Testing calendar and schedule for TSI, ACT, SAT or other assessments
- e. Documentation detailing a minimum of three course of study examples that outline student pathways from high school, to associate degrees, to work credentials and beyond

P-TECH/ICIA Blueprint

Benchmark 5: Work-Based Learning

The P-TECH/ICIA program must offer students a variety of relevant, high-skill work-based learning experiences at every grade level that respond to student interest and regional employer needs and contribute to students earning aligned industry certifications and credentials.

Design Elements

All P-TECH/ICIAs must implement and meet the following requirements:

1. The P-TECH/ICIA shall collaborate with the local workforce development board, local chamber of commerce, and local workforce industry representatives to define local workforce needs
2. The P-TECH/ICIA shall have current, signed MOU with business/industry partners that are reviewed annually and clearly articulate the requirements outlined in this benchmark. The MOU must include in the agreement that the regional industry or business partner will give a student who receives work-based learning **first priority** in interviewing for any jobs for which the student is qualified that are available upon the student's completion of the program
3. The P-TECH/ICIA shall provide:
 - a. Age level appropriate work-based learning for students in the P-TECH/ICIA at every grade level that includes career awareness, career exploration, career preparation, and career experience
 - b. Policies and protocols to make work-based learning a viable method for helping students meet academic standards
 - c. Work based learning experiences that are well-planned and properly sequenced to provide a progression of learning experiences for students—each one building upon the last
 - d. Work based learning may include, but is not limited to: facility visits, guest speakers, presentations, career information, career fairs, informational interviewing, job shadowing, internships, mentoring, and apprenticeships
4. The P-TECH/ICIA shall ensure that students:
 - a. Understand the connection between their work-based learning and academics
 - b. Are provided opportunities to reflect on their work experiences
 - c. Demonstrate their learning in writing, portfolio, presentation, digital or by other means
 - d. Are provided opportunities for career-building skills such as: interview training, skill development, and resume workshops
5. The P-TECH/ICIA shall allow for demonstration of enrichment and extracurricular opportunities, such as clubs, Career and Technical Student Organizations, competitions, and special initiatives

P-TECH/ICIA Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the P-TECH/ICIA website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy

Products

- a. Documentation of appropriate work-based learning experiences for students at all grade levels
- b. Current dated regional high demand occupation list
- c. Aggregate data describing student participation in work-based learning experiences as well as percentage of students earning industry certification and credentials by type
- d. Samples of student artifacts such as writings, portfolios, presentations, or links to digital content

P-TECH/ICIA Blueprint

Benchmark 6: Student Support

P-TECH/ICIA will provide wrap-around strategies and services involving multiple stakeholders (parents, teachers, counselors, community members, etc.) to strengthen both the academic and technical skills necessary for high school and college readiness, as well as provide academic, technical, and individual support for students to be successful in rigorous academic and work-based learning experiences.

Design Elements

All P-TECH/ICIAs must implement and meet the following requirements:

1. The P-TECH/ICIA shall provide layered academic support to the students by personalizing the learning environment in the following ways:
 - a. Developing individualized, college and career focused student plans with specific graduation plan for ongoing academic support
 - b. Providing academic support for intervention, remediation, and acceleration
 - c. Providing tutoring and/or Saturday school for identified students in need of academic supports
 - d. Providing students with application, financial aid counseling and college/career counseling
 - e. Providing advisory and/or college readiness and support time built into the program of study for all students
 - f. Providing bridge programs (an intensive academic preparation program that provides opportunities to strengthen academic skills necessary for high school, college readiness and career readiness and exploration) and to support student transition from middle school to the P-TECH/ICIA program (as well as elementary to middle school if applicable)
 - g. Establishing an industry mentorship program available to all students; and
2. The P-TECH/ICIA shall provide layered social and emotional support to the students as needed, such as:
 - a. Connections to social services
 - b. Parent outreach and involvement opportunities
 - c. A structured program of community service to promote community involvement; and
 - d. Skill building instruction for students, such as time management, study skills, collaboration and interpersonal relationship skills

P-TECH/ICIA Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the school website and be made available to TEA upon request
- b. All products shall be maintained in accordance with local retention policy

Products

- a. Bridge program calendar and curricula
- b. Tutoring and other intervention/remediation program schedules
- c. Calendar of family outreach events
- d. Schedule of regularly scheduled counseling/advisory events and records of completion for these support services

P-TECH/ICIA Blueprint

Access Outcomes-Based Measures

TEA is currently in a phase-in process for the new P-TECH/ICIA Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional	Designated	Designated with Excellence
Requirements	Must meet at-risk students for incoming 9th graders and at least three additional target population data indicators	Must meet at-risk students for incoming 9th graders and at least three additional target population data indicators	Must meet at-risk students for incoming 9th graders and at least four additional target population data indicators
P-TECH/ICIA proportionate to or over- represents at-risk students for incoming 9th graders	No more than 20% points under district	No more than 15% points under district	No more than 10% points under district
P-TECH/ICIA proportionate to or over- represents economically disadvantaged students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
P-TECH/ICIA proportionate to or over- represents non-traditional CTE participants*	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
P-TECH/ICIA proportionate to or over- represents African American students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
P-TECH/ICIA proportionate to or over- represents Hispanic students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
P-TECH/ICIA proportionate to or over- represents ELL and SWDs	Not taken into account for designation	Not taken into account for designation	No more than 5% points under

* Nontraditional Career-Technical Education (CTE) programs are identified as those connected to occupations or fields of work in which individuals from one gender comprise less than 25 percent of the individuals employed in those occupations or fields of work. The male and female lists are updated annually for Perkins IV.

P-TECH/ICIA Blueprint

Attainment Outcomes-Based Measures

TEA is currently in a phase-in process for the new P-TECH/ICIA Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional	Designated	Designated with Excellence
Requirements	Must meet college-level course and Work-Based Learning requirements	Must meet targets on at least four attainment data indicators	Must meet targets on at least five attainment data indicators
Grade-to-grade persistence by subgroup (weighted)	Not taken into account for designation	Retain 80% of students who remain in district grade-to-grade	Retain 90% of students who remain in district grade-to-grade
Completing one college-level course by end of 11th grade (any)	80% of students (by the fourth year of implementation)	90% of students	100% of students
Earning postsecondary degree provided by an IHE by graduation	Not taken into account for designation	30% of students	50% of students
Earning a postsecondary credential provided by an IHE by graduation	Not taken into account for designation	30% of students	50% of students
Earning industry certification by high school graduation	Not taken into account for designation	30% of students	50% of students
Earning postsecondary degree or postsecondary credential provided by an IHE or industry certificate by high school graduation	Not taken into account for designation	80% of graduating cohort of students	100% of graduating cohort of students
Participating in a Work-Based Learning placement/course by graduation	35% of students (by the fourth year of implementation)	50% of students	85% of students

P-TECH/ICIA Blueprint

Achievement Outcomes-Based Measures

TEA is currently in a phase-in process for the new P-TECH/ICIA Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicator	Provisional	Designated	Designated with Excellence
Requirements	Must meet at least one targets	Must meet at least three achievement data indicators	Must meet at least four achievement data indicators
Meet TSI criteria (SAT/ACT/TSIA) in reading and mathematics	35% passing rate on one or more college readiness benchmarks	50% passing rate on one or more college readiness benchmarks	60% passing rate on one or more college readiness benchmarks
Earn industry certification	Not taken into account for designation	30% of students	50% of students
Earn an associate degree	Not taken into account for designation	30% of students	50% of students
Complete a course for dual credit	35% of students	80% of students	100% of students
Algebra I EOC assessment in 9 th grade	Not taken into account for designation	85% of students meeting grade level standard	85% of students meeting grade level and 45% mastering grade level standard
English II EOC assessment (grades 9-11)	Not taken into account for designation	85% of students meeting grade level standard	85% of students passing and 25% of students mastering grade level

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T-STEM Blueprint



Benchmark 1: School Design

The T-STEM academy must provide a STEM focused program serving students in grades 6-12 or grades 9-12 with an active relationship with the feeder middle school(s).

Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM academy location shall be:
 - a. On a college or university campus, or
 - b. In a high school—as a standalone high school campus or in a smaller learning community within a larger high school, or
 - c. At a central location, such as a STEM or CTE center where students are enrolled in their home campus
2. T-STEM academy staff shall include:
 - a. A T-STEM building level leader with authority to make scheduling, hiring, and budget decisions
 - b. Qualified T-STEM academy teachers who work directly with the T-STEM students, which may include adjunct high school faculty capable of teaching college-level courses
 - c. Counseling staff who support T-STEM students, including activities such as: coordinating with Institutions of Higher Education (IHEs) for registration and monitoring of students' high school and college transcripts and monitoring high school and college courses to ensure all requirements are met
3. The T-STEM shall establish a leadership team that includes high-level personnel with decision-making authority who meet regularly and report to each organization. Regularly scheduled meetings must address the following topics:
 - a. Identification of members and the role each member will play in the design, governance, operations, accountability, curriculum development, professional development, outreach, sustainability, and continuous monitoring and improvement of T-STEM
 - b. Assumption of shared responsibility (between the school district, industry partners, and the IHE) for meeting annual outcomes-based measures and providing annual reports to their district and IHE boards, as well as to the public
 - c. Monitoring of progress on meeting the T-STEM Blueprint, including reviewing data to ensure the T-STEM is on-track to meet outcomes-based measures
 - d. Guidance for mid-course corrections as needed
 - e. Identification and implementation of sustainability structures to address and minimize the challenges of staff turnover and potential fluctuations in funding
4. The leadership team shall include and meet regularly—in person and/or virtually—with the leaders from the district, IHE, and business/industry who have decision-making authority:
District leaders (may include):
 - a. Superintendent
 - b. Assistant superintendent of curriculum and instruction, or equivalent position
 - c. T-STEM principal or director



T-STEM Blueprint



Benchmark 1: School Design

The T-STEM academy must provide a STEM focused program serving students in grades 6-12 or grades 9-12 with an active relationship with the feeder middle school(s).

Design Elements

- d. CTE Director
 - e. Department chairs
 - f. School counselors
 - g. Business and industry partners
- IHE leaders (may include):**
- a. College or university president
 - b. Provost
 - c. Department Chairs for core academic disciplines
 - d. T-STEM liaison
- Business/Industry (may include):**
- a. CEO/President
 - b. Education/community outreach specialist
5. Implementation of an annual professional development plan for teachers and staff using research-based instructional strategies that focus on rigor, build college and career readiness, are based on needs assessment of student data, and includes both high school and dual credit teachers. **Professional development may include, but is not limited to:**
- a. A mentoring and induction program for newly hired staff, providing them with the instructional and interpersonal skills and capacities needed for success in a T-STEM
 - b. An externship program to expose teachers, counselors, and/or administrators to STEM content and careers
 - c. Opportunities for teachers to collaborate, plan, and engage in relevant professional development
6. Provision of opportunities for T-STEM teachers to receive extensive training and support through regularly scheduled formative peer observations and collaboration opportunities with feeder pattern focus groups, industry, and IHE partners
7. Offering of inclusive STEM activities both inside and outside the classroom for all students
8. The T-STEM academy students shall be cohorted into core classes to the extent possible; this does not exclude non-T-STEM students from enrolling in the same class
9. The T-STEM academy shall be offered at no cost to students

T-STEM Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.

Products

- a. Annual training and professional development calendar and plan for teachers
- b. Mentor/induction program plans
- c. T-STEM leadership meetings and agenda notes



T-STEM Blueprint

Benchmark 2: Target Population

The T-STEM academy shall serve, or include plans to scale up to serve, students in grades 6-12 or 9-12, and shall target and enroll students who are at risk of dropping out of school as defined by the Public Education Information Management System (PEIMS) and who might not otherwise go to college.

Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM recruitment and enrollment processes shall identify, recruit, and enroll the subpopulations of at-risk students (as defined by PEIMS), including, but not limited to, students who are of limited English proficiency, students with disabilities, or students who have failed a state administered assessment. Enrollment decisions shall not be based on state assessment scores, discipline history, teacher recommendation, parent or student essays, minimum grade point average (GPA), or other criteria that create barriers for student enrollment
2. The T-STEM shall identify, recruit, and enroll subpopulations (in addition to those who are at risk as defined by PEIMS) that are historically underrepresented in college courses (e.g., first generation college goers, students of low socioeconomic status, African American, Hispanic, Native American)
3. The T-STEM academy shall clearly document recruitment and enrollment policies and practices; refining and improving them annually based on data reviews
4. Recruitment and enrollment processes (including marketing and recruitment plans, materials, and timelines) shall include input from key stakeholders (e.g., parents and community members; postsecondary partners); target student populations as described in 1 and 2 above; and include regular activities to educate students, counselors, principals, parents, and school board and community members
5. If the T-STEM academy has more applicants than available space, they shall use either a performance-blind, open-access lottery system for admissions that encourages and considers applications from all students (all students have an equal opportunity for acceptance, regardless of background or academic performance) or a weighted lottery that favors students who are at-risk or who are part of the targeted subpopulations for the T-STEM

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.

Products

- a. Written admission policy and enrollment application
- b. Written recruitment plan including a timeline of recruitment and enrollment events, and recruitment materials for distribution at feeder schools and other appropriate locations in the community
- c. Brochures and marketing in Spanish, English, and/or other relevant language(s)
- d. Written communication plan for targeting identified audiences, parents, community members, school board, higher education personnel, etc.

T-STEM Blueprint



Benchmark 3: Strategic Alliances

Strategic partnerships with business and industry partners and Institutions of Higher Education (IHEs) are formally articulated in writing and clearly define a variety of STEM careers.

Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM academy shall develop, sign, and execute a Memoranda of Understanding (MOU) with IHE partner(s) to include (at a minimum):
 - a. Courses of study, which enable a student to combine high school courses and college-level courses toward credentials and certifications including associate and/or bachelor's degree
 - b. Policy for advising students on the transferability of all industry certifications and college credit offered and earned
 - c. Policy to ensure the IHE transcripts college credit earned through dual credit in the same semester that credit is earned
 - d. Policy regarding advising students as to the transferability and applicability to baccalaureate degree plans for all college credit offered and earned (college credits earned during high school should allow students to progress from an associate degree to a bachelor's degree and beyond in their chosen field)
 - e. Policies regarding eligibility of T-STEM students for financial assistance from the higher education partner(s), specifically, waivers for tuition and fees
 - f. Data sharing agreement that includes provisions for:
 - Teacher data such as qualifications
 - Student level data such as credit hours and industry certifications taken and earned; GPA, formative data to assess if student is on track to be successful in college level courses
 - g. Administration of statewide instruments under TEC Subchapter B, Chapter 39
 - h. Transportation costs and fees
 - i. Grading periods and policies
 - j. Instructional materials
 - k. Instructional calendar including location of each course that will be offered
 - l. Student enrollment and attendance policies
2. The T-STEM academy shall develop, sign, and execute a MOU that clearly define the roles and responsibilities of a strong partnership with business and/or industry partners to provide:
 - a. A detailed plan for work-based learning experiences for students appropriate to each grade level, such as facility visits, guest speakers, presentations, career information, job shadowing, internships, externships, and apprenticeships
 - b. Clear roles and responsibilities for worksite supervisors, mentors, teachers, support personnel, and other partners
 - c. Career mentoring
 - d. Support for students' activities, such as clubs, Career and Technical Student Organizations, competitions, and special initiatives
 - e. Course path and program monitoring
 - f. T-STEM students access to business and industry partners and work-based learning facilities, services, and resources

T-STEM Blueprint



Benchmark 3: Strategic Alliances

Strategic partnerships with business and industry partners and Institutions of Higher Education (IHEs) are formally articulated in writing and clearly define a variety of STEM careers.

Design Elements

3. The T-STEM Academy shall establish an Advisory Board who meets regularly and includes representatives from a variety of stakeholders such as; school board, community, higher education, business and industry to provide support and guidance to the T-STEM academy in resource acquisition, curriculum development, work-based learning and student/community outreach to ensure a successful academic and career pipeline

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.
- c. Annual review of business/industry and IHE MOU.

Products

- a. Meeting agendas and minutes, with action items and decision logs
- b. Final, signed, and executed MOU with IHE (Campuses must submit their final signed MOU to TEA when initially applying for designation or are provisionally designated)
- c. Final, signed, and executed MOU with business/industry partner (Campuses must submit their final signed MOU to TEA when initially applying for designation or are provisionally designated)
- d. A list of strategic partners with each member's organization, title and role in providing work-based learning for students by grade level

T-STEM Blueprint

Benchmark 4: Curriculum, Instruction, and Assessment

The T-STEM academy shall provide a rigorous course of study that enables students to receive a high school diploma and complete industry certifications, work-based learning experiences, and/or early college credit during grades 9-12.



Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM academy shall work with the local workforce development board to identify, create and maintain a list of high-demand occupations and programs of study that lead to these occupations to be used as a resource in creating structured pathways for students and updated as local needs change
2. The T-STEM academy shall establish one or more STEM pathways, and plans are underway for sequencing additional courses for STEM students. Course pathways are informed by regional and state workforce and economic development needs and contribute to students earning credentials and certifications that prepare them for high-wage, high-demand, high-skill STEM fields
3. The T-STEM academy shall provide a course of study that enables participating students the opportunity to complete high school graduation requirements and earn an industry certification or credential in a STEM focused field
 - a. A four-year crosswalk must be in place detailing how students will progress toward this goal including alignment of high school and college level courses. This crosswalk must provide pathways to a certification, an associate degree, and/or a bachelor's degree and must follow the courses and fields of study listed in the Texas Higher Education Coordinating Board (THECB) Lower Division Academic Course Guide Manual (ACGM) and/or the Workforce Education Course Manual (WECM). The campus may implement multiple dual enrollment delivery models such as:
 - College courses taught on the college or high school campus by college faculty
 - College courses taught on the high school campus or college campus by qualified high school faculty
 - College courses taught virtually, via distance/online/blended learning
4. The T-STEM academy shall biannually implement a structured data review process designed to identify student strengths and weaknesses and develop individual instructional support plans
5. The T-STEM academy shall provide a TSI assessment to students as early as possible (but not as a prerequisite to admissions)
 - a. The T-STEM academy shall develop a plan for test preparations for TSI, SAT, and/or ACT success, including academic preparation classes for students, interventions for students who do not pass TSI, and assessment fee waivers for all administrations of the TSI
 - b. The T-STEM academy shall review TSI, SAT, and ACT testing data, particularly the number/percentage of students who have currently passed each section of the TSI assessment, to ensure the T-STEM is on track to meeting outcomes-based measures
6. The T-STEM academy shall provide support for students taking STEM courses preparing students to obtain industry certifications, licenses, etc.
7. The T-STEM academy shall work with IHEs and business and industry partners to ensure curriculum alignment between high school, postsecondary and industry experience requirements

T-STEM Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.

Products

- c. Four-year crosswalk document
- d. Master schedule
- e. Curriculum alignment documents
- f. Testing calendar and schedule for TSI, ACT, and SAT
- g. Documentation detailing a minimum of three course of study examples that outline student pathways from high school, to associate degree, to industry certifications and beyond

T-STEM Blueprint



Benchmark 5: Work-Based Learning

The T-STEM academy must offer students a variety of relevant, high-skill work-based learning experiences at every grade level that respond to student interest and regional employer needs contributing to students earning STEM-focused industry certifications and credentials.

Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM academy shall collaborate with the Local Workforce Development Board to define local workforce needs in STEM careers
2. The T-STEM academy shall have current, signed MOUs with business/industry partners that are reviewed annually and clearly articulate the requirements outlined in this benchmark
3. The T-STEM academy shall provide:
 - a. Appropriate work-based learning for students in the T-STEM academy at every grade level that includes career awareness, career exploration, career preparation, and career experience
 - b. Policies and protocols to make work-based learning a viable method for helping students meet academic standards
 - c. Work-based learning experiences that are well-planned and properly sequenced to provide a progression of learning experiences for students—each one building upon the last
 - d. Work-based learning may include, but is not limited to: facility visits, guest speakers, presentations, career information, career fairs, informational interviewing, job shadowing, internships, mentoring, and apprenticeships
4. The T-STEM academy ensures that students:
 - a. Understand the connection between their work-based learning and academics
 - b. Are provided opportunities to reflect on their work experiences
 - c. Demonstrate their learning in writing, portfolio, presentation, digital or by other mean

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.

Products

- a. Documentation of appropriate work-based learning experiences available for students at all grade levels (6-12)
- b. Current dated regional high demand STEM occupation list
- c. Aggregate data describing T-STEM student participation in work-based learning experiences as well as percentage of students earning industry certification and credentials by type
- d. Samples of student artifacts such as writings, portfolios, presentations, or links to digital content

T-STEM Blueprint

Benchmark 6: Student Support



The T-STEM academy will provide wrap-around strategies and services involving multiple stakeholders (parents, teachers, counselors, community members, etc.) to strengthen both the academic and technical skills necessary for high school and college readiness, as well as provide academic, technical, and individual support for students to be successful in rigorous academic and work-based learning experiences.

Design Elements

All T-STEM academies must implement and meet the following requirements:

1. The T-STEM academy shall provide layered academic support to the students by personalizing the learning environment in the following ways:
 - a. Developing individualized, STEM focused student plans with specific graduation plan for ongoing academic support
 - b. Providing academic support for intervention, remediation, and acceleration
 - c. Providing tutoring and/or Saturday school for identified students in need of academic support
 - d. Providing advisory and/or college readiness and support time built into the program of study for all students
 - e. Providing students with application, financial aid counseling and college/career counseling
 - f. Providing bridge programs (an intensive academic preparation program that provides opportunities to strengthen academic skills necessary for high school and college readiness) and to support student transition from middle school to the T-STEM program (as well as elementary to middle school, if applicable)
 - g. Establishing a mentorship program available to all students
 - h. Providing resources for career support including career exploration, work-based learning, and industry certifications for high-wage, high-demand, high-skill STEM fields
2. The T-STEM academy shall provide layered social and emotional support to the students as needed such as:
 - a. Connections to social services
 - b. Parent outreach and involvement opportunities
 - c. A structured program of community service to promote community involvement
 - d. Skill building instruction for students, such as time management, study skills, collaboration and interpersonal relationship skills
 - e. The T-STEM academy shall provide enrichment and extra-curricular opportunities such as clubs, Career and Technical Student Organizations, competitions, and special initiatives
3. The T-STEM academy shall provide enrichment and extra-curricular opportunities such as clubs, Career and Technical Student Organizations, competitions, and special initiatives

T-STEM Blueprint

Required Activities and Products

Activities

- a. All products shall be published on the T-STEM academy website and be made available to TEA upon request.
- b. All products shall be maintained in accordance with local retention policy.

Products

- a. Bridge program calendar and curricula
- b. Tutoring and other intervention/remediation program schedules
- c. Calendar of family outreach events
- d. Schedule of regularly scheduled counseling/advisory events and records of completion for these support services

T-STEM Blueprint

Access Outcomes-Based Measures

TEA is currently in a phase-in process for the new T-STEM Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional	Designated	Distinguished
Requirements	Must meet at-risk students for incoming 9th graders and at least four additional target population data indicators. Middle schools must meet four measures	Must meet at-risk students for incoming 9th graders and at least three additional target population data indicators. Middle schools must meet three measures	Must meet at-risk students for incoming 9th graders and at least four additional target population data indicators. Middle schools must meet four measures
T-STEM academy proportionate to or over-represents at-risk students for incoming 9th graders	No more than 20% points under district	No more than 15% points under district	No more than 10% points under district
T-STEM academy proportionate to or over-represents economically disadvantaged students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
T-STEM academy proportionate to or over-represents African American students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
T-STEM academy proportionate to or over-represents Hispanic students	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
T-STEM academy proportionate to or over-represents females	No more than 10% points under district	No more than 5% points under district	Meets or over-represents district
T-STEM academy proportionate to or over-represents ELL and SWDs	Not taken into account for designation	Not taken into account for designation	No more than 5% points under



T-STEM Blueprint

Attainment Outcomes-Based Measures

TEA is currently in a phase-in process for the new T-STEM Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional	Designated	Distinguished
Requirements	Must meet college math or science , and 15 college credit targets	Must meet targets on at least five attainment data indicators	Must meet targets on at least six attainment data indicators
Grade-to-grade persistence by subgroup (weighted)	Not taken into account for designation	TBD	TBD
Completing one college-level math or science course by end of 12th grade (any)	80% of students (by the fourth year of implementation)	90% of students	100% of students
Participating in a Work-Based Learning placement/course by graduation	35% of STEM focused students (by the fourth year of implementation)	50% of students	75% of students
Earning 15 college credits (any) by graduation	50% of students (by the fourth year of implementation)	80% of students	95% of students
Earning postsecondary degree and/or credential by high school graduation	Not taken into account for designation	30% of students	40% of students
Earning an industry certification by graduation	10% of STEM focused students (by the fourth year of implementation)	20% of students	30% of students
Graduating high school in 4 years (4-year cohort graduation rate)	Not taken into account for designation	Meets the statewide 4-year graduation rate	Exceeds the statewide 4-year graduation rate



T-STEM Blueprint

Achievement Outcomes-Based Measures

TEA is currently in a phase-in process for the new T-STEM Blueprint. These data are for information and planning purposes only. This information will not be used to determine designation status.

Data Indicators	Provisional	Designated	Distinguished
Requirements	Must meet two TSI achievement data indicators	Must meet at least four achievement data indicators	Must meet at least five achievement data indicators
TSI College Readiness Standards in reading	65% passing rate	70% passing rate	75% passing rate
TSI College Readiness Standards in writing	75% passing rate	80% passing rate	85% passing rate
TSI College Readiness Standards in math	50% passing rate	60% passing rate	75% passing rate
Algebra I EOC assessment in 9th grade	Not taken into account for designation	85% of students passing	45% percent of students passing and meeting the advanced standard
College Readiness benchmarks on SAT or ACT	35% passing rate on one or more college readiness benchmarks	40% passing rate on one or more college readiness benchmarks	50% passing rate on one or more college readiness benchmarks

**TEA APPENDIX 7:
Secondary Perkins V Local Application**

Schedule Status:

<Selection_Process>

Application ID:

eGrants Application
TEXAS EDUCATION AGENCY
SAS#: XXXXXXXX

Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Printable Version	Program Description	Save
Table of Contents	PS3012 – Local Application	Instructions

Part 1: Comprehensive Local Needs Assessment Results

A. Summarize the results of the comprehensive local needs assessment.

Empty text area for summarizing the results of the comprehensive local needs assessment.

2020-2021 Baseline metrics have been reviewed and approved.

B. How will you use funds to develop and implement evaluations of CTE programs, including evaluations necessary to complete the local needs assessment (One of the six required used of funds).

Empty text area for describing how funds will be used for evaluations of CTE programs.

Part 2: Programs of Study Funding

A. Check the box next to each of the Statewide Programs of Study you plan to offer in the 2020-2021 academic year.

<input type="checkbox"/> Accounting & Financial Services	<input type="checkbox"/> Advanced Manufacturing	<input type="checkbox"/> Agribusiness	<input type="checkbox"/> Animal Science	<input type="checkbox"/> Applied Agricultural Engineering
<input type="checkbox"/> Architectural Design	<input type="checkbox"/> Automotive	<input type="checkbox"/> Aviation Maintenance	<input type="checkbox"/> Bio-Medical Science	<input type="checkbox"/> Business Management
<input type="checkbox"/> Carpentry	<input type="checkbox"/> Construction MGT and Inspection	<input type="checkbox"/> Culinary Arts	<input type="checkbox"/> Cybersecurity	<input type="checkbox"/> Diesel and Heavy Equipment
<input type="checkbox"/> Digital Communications	<input type="checkbox"/> Distribution and Logistics	<input type="checkbox"/> Early Learning	<input type="checkbox"/> Electrical	<input type="checkbox"/> Emergency Services
<input type="checkbox"/> Engineering	<input type="checkbox"/> Entrepreneurship	<input type="checkbox"/> Environmental/Natural Resources	<input type="checkbox"/> Exercise Science and Wellness	<input type="checkbox"/> Family and Community Services
<input type="checkbox"/> Food Science and Technology	<input type="checkbox"/> Government/Public Administration	<input type="checkbox"/> Graphic Design & Multimedia Arts	<input type="checkbox"/> Health and Wellness	<input type="checkbox"/> Health Informatics
<input type="checkbox"/> Healthcare Diagnostics	<input type="checkbox"/> Healthcare Therapeutic	<input type="checkbox"/> HVAC and Sheet Metal	<input type="checkbox"/> Information Technology Support	<input type="checkbox"/> Law Enforcement
<input type="checkbox"/> Legal Studies	<input type="checkbox"/> Lodging and Resort Management	<input type="checkbox"/> Manufacturing Technology	<input type="checkbox"/> Marketing and Sales	<input type="checkbox"/> Masonry
<input type="checkbox"/> Medical Therapist	<input type="checkbox"/> Networking Systems	<input type="checkbox"/> Nursing	<input type="checkbox"/> Oil/Gas Exploration & Production	<input type="checkbox"/> Plant Science
<input type="checkbox"/> Plumbing and Pipefitting	<input type="checkbox"/> Programming & Software Dev.	<input type="checkbox"/> Refining and Chemical Processes	<input type="checkbox"/> Renewable Energy	<input type="checkbox"/> Teaching and Training
<input type="checkbox"/> Travel, Tourism, and Attractions	<input type="checkbox"/> Web Development	<input type="checkbox"/> Welding		

B. Enter any approved Regional Programs of Study the LEA plans to offer in the 2020-2021 academic year.

<input type="checkbox"/> Other (Specify):	<input type="checkbox"/> Other (Specify):
<input type="checkbox"/> Other (Specify):	<input type="checkbox"/> Other (Specify):

C. Provide information on the programs of study and activities the LEA will support with Perkins funds.

Empty text area for providing information on programs of study and activities supported with Perkins funds.

D. How did the results of the comprehensive local needs assessment inform the selection of the programs of study and activities to be funded.

Empty text area for explaining how the results of the comprehensive local needs assessment informed the selection of programs of study and activities to be funded.

E. Describe how students will learn about CTE course offerings through programs of study, including students who are members of special populations (reference answers provided in Part 5: Improving Equity and Access of the Perkins Needs Assessment).

Empty text area for describing how students will learn about CTE course offerings through programs of study, including students who are members of special populations.

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<Name of Grant Program>

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Table of Contents	PS3012 – Local Application	Instructions

F. Provide within CTE the skills necessary to pursue careers in high skill, high-wage, and in-demand industry sectors or occupations (One of the six required local uses of funds). Check all that apply to your LEA.
--

- | | |
|--------------------------|---|
| <input type="checkbox"/> | Our programs of study are selected from the Statewide or regionally approved list. |
| <input type="checkbox"/> | Our LEA offers multiple career preparation learning opportunities for our students. |
| <input type="checkbox"/> | Our LEA has instructional partnerships with business and industry to provide relevant experiences for students. |
| <input type="checkbox"/> | Our Business and industry partners regularly provide us with input to ensure that our students receive strong experience in and understanding of all aspects of their industries. |
| <input type="checkbox"/> | Other: _____ |
| <input type="checkbox"/> | Other: _____ |

Part 3: Career Exploration, Guidance, and Counseling Provided to All Students in the LEA

A. Describe how career guidance and academic counseling will be provided to students before enrolling and while participating in CTE programs of study.
--

B. Provide career exploration and career development activities to students (One of the six required local uses of funds). Check all that apply to your LEA.

- | | |
|--------------------------|--|
| <input type="checkbox"/> | Introductory courses or activities focused on career exploration and career awareness, including non-traditional fields are available to students. |
| <input type="checkbox"/> | Labor market and career information is readily available for students to access. |
| <input type="checkbox"/> | Graduation and career plans are developed for each CTE student. |
| <input type="checkbox"/> | Career guidance and academic counselors are available to provide information on postsecondary education and career options. |
| <input type="checkbox"/> | Students receive a comprehensive understanding of all aspects of an industry. |
| <input type="checkbox"/> | Other: _____ |
| <input type="checkbox"/> | Other: _____ |

Part 4: Improve Academic and Technical Skills of CTE Students
--

A. Describe how the LEA will encourage career and technical education students at the secondary level to enroll in rigorous and challenging courses in the core academic subjects (reference response provided in question 3.3 in the Local Needs Assessment).

B. Support the integration of academic skills into CTE programs of study (One of the six required local uses of funds). Check all that apply to your LEA.
--

- | | |
|--------------------------|---|
| <input type="checkbox"/> | CTE participants, concentrators, and completers have access to challenging academic standards and coursework. |
| <input type="checkbox"/> | Our teachers, faculty, administrators, and career guidance and academic counselors participate in professional learning to integrate CTE and academic curriculum. |
| <input type="checkbox"/> | Other: _____ |
| <input type="checkbox"/> | Other: _____ |

 SAS#: XXXXXXXX	Organization: Campus/Site: Vendor ID:	County District: ESC Region: School Year:
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<Name of Grant Program>

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Part 5: Special Population and Non-Traditional Fields (Consider responses in Part 5 of the Local Needs Assessment)

A. Describe activities that will prepare special populations for high-skill, high-wage, and in-demand occupations (reference answers provided in Part 5: Improving Equity and Access of the Local Needs Assessment).

B. Describe how special populations will be provided with equal access to CTE programs of study and how the LEA will ensure discrimination will not occur on the basis of their status as a member of special populations.

C. Select activities utilized to promote preparation of students for nontraditional fields. Check all that apply to your LEA.

- Provision of Recruitment Materials
- Presentations by Counselors or Teachers
- Presentations by Individuals in Nontraditional Fields
- Professional Development Activities
- Other (Specify):
- Other (Specify):
- Other (Specify):
- Other (Specify):

Part 6: Work-Based Learning Opportunities

A. Describe how the LEA will work with employers to develop or expand work-based learning opportunities for CTE students.

B. Select the type of work-based learning opportunities provided to CTE students in the LEA. Check all that apply to your LEA.

- Job shadowing
- Internships
- Apprenticeships
- Simulated Workplace
- Career Preparation Courses
- CTSO Competitions
- Other (Specify):
- Other (Specify):
- Other (Specify):

Part 7: Postsecondary Credit

A. Select the opportunities available for CTE students to earn postsecondary credit. Check all that apply to your LEA.

- Dual Credit or concurrent enrollment
- Articulation agreements

 SAS#: XXXXXXXX	Organization: Campus/Site: Vendor ID:	County District: ESC Region: School Year:
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<Name of Grant Program>

Printable Version	Program Description	Save
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<input type="checkbox"/>	Advanced Placement (AP)
<input type="checkbox"/>	Early College High School (ECHS)
<input type="checkbox"/>	Pathways to Technology (P-Tech) model
<input type="checkbox"/>	T-STEM model
<input type="checkbox"/>	International Baccalaureate (IB)

Part 8: Recruitment, Retention, and Training (Consider responses in Part 4 of the Local Needs Assessment)

A. Describe how the LEA will offer professional development to CTE faculty, staff, and administrators in order to provide high quality instruction to CTE students (reference response provided in question 4.1 of the Local Needs Assessment).

B. Describe how the LEA will support the recruitment and retention of CTE educators (reference response provided in question 4.2 of the Local Needs Assessment).

C. Provide professional development to CTE Educators (One of the six required local uses of funds). Check all that apply to your LEA.


<input type="checkbox"/>	Supporting individualize academic and CTE instructional approaches including the integration of academic and CTE standards.
<input type="checkbox"/>	Training ensuring labor market information is used to inform CTE programs of study.
<input type="checkbox"/>	Faculty is provided training on the latest workplace equipment, technologies, standards, and credentials.
<input type="checkbox"/>	School leaders and administrators receive training on effective management of CTE programs in their schools.
<input type="checkbox"/>	Other: <input style="width:80%;" type="text"/>
<input type="checkbox"/>	Other: <input style="width:80%;" type="text"/>

Part 9: Performance Gaps


A. Identify and quantify any disparities or gaps in performance on State determined level of performance between any subgroup or special population and the performance of all CTE concentrators served by the LEA (reference responses provided in Part 1: Student Performance of the Local Needs Assessment).

B. Plan and carry out elements that support the implementation of CTE programs of study and that result in increasing student achievement on performance indicators (One of the six required local uses of funds). Check all that apply to your LEA.

<input type="checkbox"/>	Curriculum aligned with the requirements for a program of study.
<input type="checkbox"/>	Our LEA has effective business and industry partnerships that support student learning.

Schedule Status:		<Selection_Process>	Application ID:
	Organization:	County District:	
	Campus/Site:	ESC Region:	
	SAS#: XXXXXXXX	Vendor ID:	School Year:
<Name of Grant Program>			
Printable Version	Program Description		Save
Table of Contents	PS3012 – Local Application		Instructions
<input type="checkbox"/>	Our LEA provides opportunities for CTE concentrators to participate in dual or concurrent enrollment programs, early college high schools, and take courses with articulation agreements with our community college as part of a program of study.		
<input type="checkbox"/>	Our programs of study use appropriate equipment, technology, and instructional materials aligned with business and industry needs.		
<input type="checkbox"/>	Industry-recognized certification examinations are provided to students within our programs of study.		
<input type="checkbox"/>	Other:		
<input type="checkbox"/>	Other:		

<table border="0" style="width:100%;"> <tr> <td align="center">Table of Contents</td> <td align="center">Printable Version</td> <td align="center">Save</td> </tr> </table>	Table of Contents	Printable Version	Save
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SAS#: XXXXXXXX


<Name of Grant Program>		
Printable Version	Program Description	Save
Table of Contents	PS3350 – Accountability	Instructions

Fiscal Agent / Member / Individual Applicant

<CDN – Org Name>

Part 1: Perkins Performance Measures (See the TEASE application CTER [Career and Technology Education Reports] for performance measure/core indicator definitions, described after each performance table.)

Actual for <YYYY-YYYY>	Actual for <YYYY-YYYY>	Actual for <YYYY-YYYY>	Statewide Target %	Local Target %	Explain why the Local Target percentage was less than the Statewide Target percentage.	Describe strategies the LEA will use to improve CTE student performance.
<Config>						
1S1: Four-Year Graduation Rate						
<Config>						
1S2: Extended Graduation rate						
<Config>						
2S1: Academic Proficiency in Reading/Language Arts						
<Config>						
2S2: Academic Proficiency in Mathematics						
<Config>						
2S3: Academic Proficiency in Science						
<Config>						
3S1: Postsecondary Placement						
<Config>						
4S1: Non-traditional Program Enrollment						
<Config>						
5S1: Attained recognized Postsecondary Credential						
<Config>						
5S4: Program Quality CTE Completer						

Schedule Status:		<Selection_Process>		Application ID:		
		Organization: Campus/Site: Vendor ID:		County District: ESC Region: School Year:		
SAS#: XXXXXXXX						
<Name of Grant Program>						
Printable Version		Program Budget		Save		
Table of Contents		BS6003 - Program Budget Summary and Support		Instructions		
Statutory Authority				Fund Code FAR/SSA		
Part 1: Available Funding						
Final Amount				View List of Members		
Reallocation						
Grand Total						
				Total Funds Available		
Part 2: Budget Summary by Class/Object Code						
Class/Object Code and Description				Program Costs	Admin Costs	Total Budget
6100	Payroll Costs					
6200	Professional and Contracted Services (itemized in Part 5)					
6300	Supplies and Materials (itemized in Part 6)					
6400	Other Operating Costs (itemized in Part 7)					
6500	Debt Service (itemized in Part 8)					
6600	Capital Outlay (itemized in Part 9)					
8911	Operating Transfers Out					
Subtotal						
Maximum Allowable Indirect Costs:				Total Direct Costs		
				% Indirect Costs		
Grand Total						
				Total Budgeted Costs:		
Shared Services Arrangements						
6493	Payments to Member Districts of Shared Services Arrangements					
Mutually Beneficial Purposes and Programs That Will Be Provided to ALL Members of the SSA						
<input type="checkbox"/>	Employ Certified Counselors to Provide Career Development, Guidance, and Academic Counseling Programs to All Students within the SSA					
<input type="checkbox"/>	Employ a Full- or Part-Time Special Populations Coordinator to Work Directly with Members of Special Populations to Ensure Services and/or Job-Specific Training for Such Students on the Campus of Each Member of the SSA					
<input type="checkbox"/>	Establish a Common Site for Offering Career and Technical Education (CTE) Courses to Members of the SSA					
<input type="checkbox"/>	Other:					
<input type="checkbox"/>	Other:					
Assurance : By checking the statements below, I certify my acceptance and compliance with Perkins regulations						
<input type="checkbox"/>	The fiscal agent assures that all Perkins funds awarded through this application will be used for purposes or programs that are mutually beneficial to all members of the SSA, and that evidence of mutual benefit can be provided if requested by the Agency or auditors.					
<input type="checkbox"/>	The fiscal agent assures that it has processes in place that prevent funds paid to SSA members from being used for any purpose or program that benefits only one member of the SSA.					

	Organization:	County District:
	Campus/Site:	ESC Region:
	Vendor ID:	School Year:

SAS#: XXXXXXXX

<Name of Grant Program>

Printable Version	Program Budget	Save
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Table of Contents	BS6003 - Program Budget Summary and Support	Instructions
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Part 3: Waiver from the Minimum \$15,000 Requirement

Rural Sparsely Populated Area:
 The number of highway miles from the high school that is the nearest neighbor is at least 30, and the school is unable to enter into a consortium for providing programs, services, and/or activities authorized under secondary school Career and Technology

Number of Highway Miles from the High School:	Name of High Schools:
---	-----------------------

Approved Charter School That Is Unable to Join an SSA

If either box above is checked, describe why the LEA is unable to join a shared services arrangement:


Part 4: 6100 - Itemized Payroll Costs

Number of Positions

#	Position Title	Number of Program Positions	Number of Admin Positions
1.	Administrators [012] (6119)		
2.	Aides [033] (6129)		
3.	Career Coordinators [058/080] (6119)		
4.	Clerical Staff (6129)		
5.	Counselors [008] (6119)		
6.	Program Coordinator (6119/6129)		
7.	Special Populations Coordinators (6119/6129)		
8.	Supervisors [080] (6119)		
9.	Support Center Staff (6119/6129)		
10.	Other:		
11.	Other:		
12.	Other:		
13.	Other:		
14.	Other:		
15.	Other:		
16.	Other:		
17.	Other:		
18.	Other:		
19.	Other:		
20.	Other:		
21.	Other:		
22.	Other:		
23.	Other:		
24.	Other:		
25.	Other:		

Substitute, Extra-Duty, Benefits

1.	For Schoolwide Personnel Not Coded 8911	<input type="checkbox"/>	<input type="checkbox"/>
2.	Extra-Duty Pay/Beyond Normal Work Hours for Positions Not Indicated Above	<input type="checkbox"/>	<input type="checkbox"/>
3.	Substitutes for Public and Charter School Personnel for Positions Not Indicated Above	<input type="checkbox"/>	<input type="checkbox"/>

Schedule Status:		<Selection_Process>		Application ID:		
		Organization:		County District:		
		Campus/Site:		ESC Region:		
		SAS#: XXXXXXXX		Vendor ID:		School Year:
<Name of Grant Program>						
Printable Version		Program Budget			Save	
Table of Contents		BS6003 - Program Budget Summary and Support			Instructions	
Part 5: 6200 – Itemized Professional and Contracted Services Costs						
#	Class/Object Code and Description	Program Costs	Admin Costs			
1.	6219/ 6239/ 6291 Professional and Consulting Services					
2.	6269 Rental or Lease of Buildings, Space in Buildings, or Land					
3.	6220 Postsecondary CTE tuition for students, for tuition in excess of the amount of ADA funds generated by those students. Allowable only when tuition payments are for groups of students and not in the name of individuals.					
Subtotal						
Remaining 6200 - Professional and Contracted Services That Do Not Require Specific Approval						
Total Professional and Contracted Services Costs						
Part 6: 6300 – Itemized Supplies and Materials Costs						
Total Supplies and Materials Costs						
Part 7: 6400 – Itemized Other Operating Costs						
#	Class/Object Code and Description	Program Costs	Admin Costs			
1.	6411 Out-of-State Travel for Employees. Must be allowable per Program Guidelines. LEA must keep documentation locally.					
2.	6412/ 6494 Educational Field Trip(s). Must be allowable per Program Guidelines. LEA must keep documentation locally.					
3.	6413 Stipends for Non-Employees other than those included in 6419.					
4.	6419 Non-Employee Costs for Conferences. Requires authorization in writing.					
Subtotal						
Remaining 6400 - Other Operating Costs That Do Not Require Specific Approval						
Total Other Operating Costs						

eGrants Application Organization: County District:
 TEXAS EDUCATION AGENCY Campus/Site: ESC Region:
 SAS#: XXXXXXXX Vendor ID: School Year:

<Name of Grant Program>

Printable Version Save

Table of Contents Instructions

BS6003 - Program Budget Summary and Support

Part 8: 6500 - Itemized Debt Service

#	Property Description				Class/Object Code and		Program Costs	Admin Costs		
1.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							
2.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							
3.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							
4.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							
5.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							
6.					6512	Capital Lease-Principal				
							6522	Capital Lease-Interest		
							6523	Interest on Debt		
	9-Digit Campus #	Property Value	Contract Dates		Subtotal					
		Begin Date	End Date							

Total Costs Total Debt Service Costs

eGrants Application Organization: County District:
 TEXAS EDUCATION AGENCY Campus/Site: ESC Region:
 SAS#: XXXXXXXX Vendor ID: School Year:

<Name of Grant Program>

Printable Version	Program Budget	Save
Table of Contents	BS6003 - Program Budget Summary and Support	Instructions

Part 9: 6600 – Itemized Capital Outlay

Description of Capital Expenditures for Additions, Improvements, or Modifications to Capital Assets Which Materially Increase Their Value or Useful Life (not ordinary repairs and maintenance)

	Program Costs	Admin Costs

Equipment and Other Capital Outlay - Regardless of Unit Cost

#	Generic Item	PEIMS Code	Quantity	Program Costs	Admin Costs
1					
2					
3					
4					
5					

Total Costs

	Total Capital Outlay Costs	
--	----------------------------	--

Describe how the capital outlay requested will be used to accomplish the objectives of the project if different from the general uses described in the instructions.

eGrants Application Organization: County District:
 TEXAS EDUCATION AGENCY Campus/Site: ESC Region:
 SAS#: XXXXXXXX Vendor ID: School Year:

<Name of Grant Program>

Printable Version Program Budget Save

Table of Contents BS6003 - Program Budget Summary and Support Instructions

Part 10: Local Uses of Funds

Use of Perkins Funds (Program Costs Plus Administration Costs)

#	Local Uses of Perkins Funds	Payroll (6100)	Prof. & Contr. Services (6200)	Supplies and Materials (6300)	Other Operating Costs (6400)	Debt Services (6500)	Capital Outlay (6600)	Subtotals	%
1.	Career exploration and career development activities								
2.	Provide professional development								
3.	Provide skills necessary to pursue careers in high-skill, high-wage, in-demand occupations								
4.	Integration of academic skills into CTE programs of study								
5.	Support implementation of programs of study								
6.	Evaluate Perkins-funded programs including CLNA								

Subtotals (Total percentage may not equal 100% due to rounding.)

							Indirect Costs		
							Total Budgeted Costs		

Use of State & Local Funds

#	Required Use of State & Local Funds	Payroll (6100)	Prof. & Contr. Services (6200)	Supplies and Materials (6300)	Other Operating Costs (6400)	Debt Services (6500)	Capital Outlay (6600)	Subtotals	%
1.	Career exploration and career development activities								
2.	Provide professional development								
3.	Provide skills necessary to pursue careers in high-skill, high-wage, in-demand occupations								
4.	Integration of academic skills into CTE programs of study								
5.	Support implementation of								
6.	Evaluate Perkins-funded Programs including CLNA								

Subtotals (Total percentage may not equal 100% due to rounding.)

Grand Total (Excluding Indirect Costs)

--	--	--	--	--	--	--	--	--	--

 <p>SAS#: XXXXXXXX</p>	Organization:	County District:
	Campus/Site:	ESC Region:
	Vendor ID:	School Year:

<Name of Grant Program>

Printable Version	Program Budget	Save
Table of Contents	BS6003 - Program Budget Summary and Support	Instructions

Part 12: Pooling of Perkins Funds (SSAs Not Eligible)

<input type="radio"/> Funds will not be pooled	<input type="radio"/> Funds will be pooled
What amount of funds will be pooled?	
List County/District Numbers for LEAs That Will Pool Funds:	

If Two or More Districts Will Pool Perkins Funds, Indicate Allowable Activities to Be Funded:

- Improving the Initial Preparation and Professional Development of CTE Teachers, Faculty, Administrators, and Counselors
- Establishing, Enhancing, or Supporting Systems for Perkins Accountability Data, or Report Perkins Data
- Implementing CTE Programs of Study
- Implementing Industry-based certifications on state accountability list.

TEA APPENDIX 8:
Secondary Perkins V Comprehensive Local Needs Assessment



Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Instructions

<Program Description>

<Schedule Name>

Purpose

One of the most significant changes introduced in the Strengthening Career and Technical Education for the 21st Century Act (Perkins V) is the new comprehensive local needs assessment (CLNA).

The law states, "To be eligible to receive financial assistance under this part, an eligible recipient shall— (A) conduct a comprehensive local needs assessment related to career and technical education and include the results of the needs assessment in the local application submitted under subsection (a); and (B) not less than once every 2 years, update such comprehensive local needs assessment."

ESC and TEA Review

ESC Review Complete

TEA Review Status: <Pending>

Part 1: Application Designation

Intention to Apply for Funds

Funding Source	Apply on Own	Apply as Fiscal Agent of SSA	Not Apply at All	Apply as Member of SSA
1. <grant description from TEA Calendar>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

Part 2: Student Performance

Evaluate student performance on federal accountability indicators.

1. Identify the Perkins performance accountability indicator targets not being met at the LEA level.

- | | |
|---|---|
| <input type="checkbox"/> 1S1: Four-Year Graduation Rate | <input type="checkbox"/> 3S1: Postsecondary Placement |
| <input type="checkbox"/> 1S2: Extended Graduation Rate | <input type="checkbox"/> 4S1: Non-traditional Program Enrollment |
| <input type="checkbox"/> 2S1: Academic Proficiency in Reading/Language Arts | <input type="checkbox"/> 5S1: Attained Recognized Postsecondary Credential |
| <input type="checkbox"/> 2S2: Academic Proficiency in Mathematics | <input type="checkbox"/> 5S4: CTE Completer |
| <input type="checkbox"/> 2S3: Academic Proficiency in Science | <input type="checkbox"/> All Perkins performance accountability indicator targets have been met at the LEA level. |

2. 2020-2021 LEA baseline data and state baseline data have been reviewed in TEAL and LEA will include strategies for improvement in the local application that address areas of low performance.

3. Compare the performance of CTE Learners with non-CTE Learners on accountability indicators. Include possible explanations for any differences.

TEA Use Only

CTE Review: Accept Reject

4. Compare the performance of each special population in the CTE program with the performance of all CTE Learners at the LEA level.

TEA Use Only

CTE Review: Accept Reject

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Printable Version

Save



Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program> Instructions

<Program Description>
<Schedule Name>

Part 2: Student Performance (continued)

Evaluate student performance on federal accountability indicators.

5. Describe how CTE Learners from different genders, races, and ethnicities are performing in the CTE programs at the LEA level.

TEA Use Only CTE Review: Accept Reject

Part 3: Labor Market Alignment

Evaluate the alignment between CTE programs offered and the labor market needs.

1. List the top career clusters with occupations that meet the state and/or regional definition of "in-demand" and "high-wage".

TEA Use Only CTE Review: Accept Reject

2. Describe the alignment between the CTE Learners and the occupations identified in part 3 line 1. Second, identify any gaps between high-wage/in-demand occupations and CTE program offerings.

TEA Use Only CTE Review: Accept Reject

Part 4: Programs of Study/Size, Scope, and Quality

Evaluate the core elements required for a state-approved program of study as well as meet the state's definition of size, scope and quality.

1. Based on the LEA's high school enrollment, describe how the number of programs of study offered align with the number of students who could potentially be served.

TEA Use Only CTE Review: Accept Reject

Schedule Status:

<Selection_Process>

Application ID:XXXXXXXXXXXXXXXXXXXX



Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Instructions

<Program Description>
<Schedule Name>

Part 4: Programs of Study/Size, Scope, and Quality (continued)

Evaluate the core elements required for a state-approved program of study as well as meet the state’s definition of size, scope and quality.

2. Describe the involvement of secondary partners, postsecondary partners and employer/industry partners in the development, implementation, and phasing out/closure of CTE programs of study.

TEA Use Only CTE Review: Accept Reject

3. Identify any gap areas between opportunities for students to participate in work-based learning and complete advanced academic courses compared to your enrollment.

TEA Use Only CTE Review: Accept Reject

Part 5: Recruitment, Retention, and Training of CTE Educators

Assess and develop plans to improve the quality of CTE faculty.

1. Describe professional development opportunities for faculty, staff, counselors, and administrators. Include examples of the effectiveness of these experiences at improving student outcomes.

TEA Use Only CTE Review: Accept Reject

2. Identify the processes that are in place to induct and retain faculty and staff. Evaluate these processes for effectiveness with an emphasis on individuals coming from industry.

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Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Instructions

<Program Description>
<Schedule Name>

Part 5: Recruitment, Retention, and Training of CTE Educators (continued)

Assess and develop plans to improve the quality of CTE faculty.

TEA Use Only	CTE Review: <input type="radio"/> Accept <input type="radio"/> Reject
3. Evaluate faculty in CTE programs for appropriate credentials with related workplace experience in the program area.	
TEA Use Only	CTE Review: <input type="radio"/> Accept <input type="radio"/> Reject

Part 6: Improving Equity and Access

Evaluate progress in providing equal access to CTE programs.

1. Evaluate student groups taking part in CTE at disproportionate levels, in comparison to the overall student population. Identify which groups are over and underrepresented.	
TEA Use Only	CTE Review: <input type="radio"/> Accept <input type="radio"/> Reject
2. Identify any barriers that prevent certain populations of CTE learners from accessing your programs, such as prerequisites/admission requirements, transportation, and scheduling. Identify the student groups most affected by these barriers.	
TEA Use Only	CTE Review: <input type="radio"/> Accept <input type="radio"/> Reject
3. Describe how and when you recruit students into your CTE programs. List the methods of reaching all students, including students from groups identified as special populations.	
TEA Use Only	CTE Review: <input type="radio"/> Accept <input type="radio"/> Reject

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Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Instructions

<Program Description>
<Schedule Name>

Part 7: Summary

LEAs will merge the analyses outlined above into one set of findings.

1. Describe the LEA's overall mission and vision for CTE programming.

Empty text area for response to question 1.

TEA Use Only

CTE Review: Accept Reject

2. List the top (three-five) CTE priorities over the next four-years.

Empty text area for response to question 2.

TEA Use Only

CTE Review: Accept Reject

3. List the top three most aligned CTE programs of study based on regional labor market information and the plan for continuing support or expansion of these programs. List the three least aligned CTE programs of study and the plan for transforming or retiring these programs of study.

Empty text area for response to question 3.

TEA Use Only

CTE Review: Accept Reject

4. List the LEA's lowest performance indicators and describe strategies to improve student performance.

Empty text area for response to question 4.

TEA Use Only

CTE Review: Accept Reject

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Schedule Status:

<Selection_Process>

Application ID: XXXXXXXXXXXXXXXXXXXX



Organization:
Campus/Site:
Vendor ID:

County District:
ESC Region:
School Year:

<Name of Grant Program>

Instructions

<Program Description>
<Schedule Name>

Part 8: Certification and Incorporation

Certification and Incorporation Statement

I hereby certify that the information contained in this Special Collections Report is, to the best of my knowledge, correct and that the organization named above has authorized me as its representative to submit this data. I further certify that any ensuing program and activity will be conducted in accordance with all applicable Federal and State laws and regulations; application guidelines and instructions; provisions, assurances, and certification requirements; and the schedule submitted. It is understood by the applicant that this application constitutes an offer and, if accepted by the Texas Education Agency or renegotiated to acceptance, will form a binding agreement.

Authorized Official

Select Contact:



or

Add New Contact

First Name:

Middle Initial:

Last Name:

Title:

Phone:

Ext:

E-Mail:

Submitter Information

First Name:

Last Name:

Approval ID:

Submit Date and Time:

Only the legally responsible party may submit this report.

Certify and Submit

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**TEA APPENDIX 9:
Results Driven Accountability Information and
Federal Partners in Transition Document**

Results Driven Accountability Information

The Texas Education Results Driven Accountability (RDA) is a comprehensive evaluation system designed to improve student performance and program effectiveness to support Local Education Agencies (LEAs). The RDA framework is a data-driven system that utilizes performance indicators, data validation indicators, and other indicators of program compliance required by federal law. Specific program areas include: Bilingual Education (BE) and English as a Second Language (ESL), Career and Technical Education (CTE), Every Student Succeeds Act (ESSA), and Special Education (SPED).

LEAs are evaluated in each program area and assigned an overall performance level (PL). The LEA will be assigned a PL0, PL1, PL2, PL3, or PL4 for each indicator and program. The PL is aligned to a specific level of support. Review and Support will provide general supervision and progress monitoring of the Strategic Support Plan (SSP) and link LEAs to technical assistance for program-specific needs. The SSP incorporates data findings, problem statements, and root causes that address areas of low performance and program ineffectiveness for ESSA indicators.

Bilingual Education (BE)/English as a Second Language (ESL) Indicators:

1. BE STAAR 3-8 Passing Rate
2. ESL STAAR 3-8 Passing Rate
3. English Learners (ELs) (Not Served in BE/ESL) STAAR 3-8 passing rate
4. ELs Years After Exit STAAR 3-8 Rate
5. ELs STAAR End of Course (EOC) Passing Rate
6. ELs Annual Dropout Rate (Grades 7-12)
7. ELs Graduation Rate
8. TELPAS Reading Beginning Proficiency Level Rate
9. TELPAS Composite Rating Levels for Students in U.S. Schools Multiple Years

Career and Technical Education (CTE) Indicators:

1. CTE STAAR EOC Passing Rate
2. CTE ELs STAAR EOC Passing Rate
3. CTE Economically Disadvantaged STAAR EOC Passing Rate
4. CTE SPED STAAR EOC Passing Rate
5. CTE Annual Dropout Rate (Grades 9-12)
6. CTE Graduation Rate

Every Student Succeeds Act (ESSA) Indicators:

1. Title I, Part A STAAR 3-8 Passing Rate
2. Title I, Part A STAAR EOC Passing Rate
3. Title I, Part A Annual Dropout Rate (Grades 7-12)
4. Title I, Part A Graduation Rate
5. Migrant STAAR 3-8 Passing Rate
6. Migrant STAAR EOC Passing Rate
7. Migrant Annual Dropout Rate (Grades 7-12)
8. Migrant Graduation Rate
9. Foster Care STAAR 3-8 Passing Rate
10. Foster Care STAAR EOC Passing Rate

Results Driven Accountability Information

11. Foster Care Annual Dropout Rate (Grades 7-12)
12. Foster Care Graduation Rate
13. Homeless STAAR 3-8 Passing Rate
14. Homeless STAAR EOC Passing Rate
15. Homeless Annual Dropout Rate (Grades 7-12)
16. Homeless Graduation Rate
17. Military STAAR 3-8 Passing Rate
18. Military STAAR EOC Passing Rate
19. Military Annual Dropout Rate (Grades 7-12)
20. Military Graduation Rate

Special Education Monitoring

R&S will provide general monitoring and supervision for special education monitoring. Special Education Determinations are based on two components:

- Federally Required Elements (FRE)
- State Defined Elements (RDA Indicators)

Federally Required Elements (FRE)

States must consider the following four federally required elements in assigning a Determination level for LEAs:

- Performance on State Performance Plan (SPP) compliance indicators 9, 10, 11, 12, and 13.
- Whether data submitted by LEAs is valid, reliable, and timely;
- Uncorrected noncompliance from other sources (complaints resolution, due process, residential facility monitoring, and monitoring activities); and
- Any audit findings.

Special Education (SPED) Indicators:

1. SPED STAAR 3-8 Passing Rate
2. SPED Year After Exit STAAR 3-8 Passing Rate
3. SPED STAAR EOC Passing Rate
4. SPED Alternate 2 Overall Participation (No Action Required)
5. SPED Annual Dropout Rate (Grades 7-12)
6. SPED Graduation Rate
7. SPED Regular Early Childhood Program Rate (ages 3-5)
8. SPED Regular Class $\geq 80\%$ Rate (Ages 6-21)
9. SPED Regular Class $< 40\%$ Rate (Ages 6-21)
10. SPED Separate Settings Rate (Ages 6-21)
11. SPED Representation (Ages 3-21)
12. SPED OSS and Expulsion ≤ 10 Days Rate (Ages 3-21)
13. SPED OSS and Expulsion > 10 Days Rate
14. SPED ISS ≤ 10 Days Rate (Ages 3-21)
15. SPED ISS > 10 Days Rate (Ages 3-21)
16. SPED Total Disciplinary Removals Rate (Ages 3-21)

November 2015



FEDERAL PARTNERS IN TRANSITION

WHAT TO KNOW ABOUT WORK-BASED LEARNING EXPERIENCES FOR STUDENTS AND YOUTH WITH DISABILITIES¹

The Federal Partners in Transition (FPT) workgroup presents *What to Know About Work-Based Learning Experiences*. This fact sheet was created to address the compatible outcome goals and policy priorities identified in *The 2020 Youth Transition Plan: A Federal Interagency Strategy* and provides a quick glance of available resources. Please click on the links to learn more about each fact.

GENERAL AND LEGISLATIVE INFORMATION

1. Work-based learning and why it is important

The [National Collaborative on Workforce and Disability for Youth](#) defines [work-based learning](#) as a “supervised program sponsored by an education or training organization that links knowledge gained at the work site with a planned program of study. [Experiences range in intensity, structure, and scope](#) and include activities as diverse as site visits, job shadowing, paid and unpaid internships, structured on-the-job training, and the more formal work status as apprentice or employee.” [Work-based learning experiences](#) have been shown to be one of the strongest predictors of adult employment success for students and youth with disabilities.

2. What to look for in a work-based learning experience and program

A high quality work-based learning program includes the following characteristics:

- a. Clear roles and responsibilities for worksite supervisors, mentors, teachers, support personnel, and other partners;
- b. Training plans that specify learning goals tailored to individual youth with specific outcomes connected to their learning;

¹ Youth with disabilities is defined differently by various programs and systems, including the contributing agencies. Consequently, a standard definition is not used in this document.

- c. Opportunities for a range of work-based learning experiences, especially those outside traditional youth employing industries such as hospitality and retail;
- d. Assessments to identify skills, interests, and support needs at the worksite;
- e. Reinforcement of work-based learning outside of work; and
- f. Appropriate academic, social, and administrative support for youth, employers, and all involved.

3. Service learning is a form of work-based learning

[Service learning](#) improves employment outcomes for populations that experience significant barriers in the job market, such as individuals who do not have a high school diploma. The [income exclusions](#) available to Supplemental Security Income (SSI) beneficiaries who participate in [AmeriCorps programs](#) and Social Security Disability Insurance (SSDI) beneficiaries in [AmeriCorps VISTA](#) add further appeal. With these employment supports, beneficiaries can gain work-based experiences and skills through participation in service learning programs [without risk of penalty or loss of disability benefits](#).

4. WIOA and work-based learning experiences under Vocational Rehabilitation

The *Workforce Innovation and Opportunity Act (WIOA)* made significant changes to programs authorized under the *Rehabilitation Act of 1973* (Title IV of *WIOA*), particularly to the Vocational Rehabilitation (VR) Services program which provides VR services to individuals with disabilities. Section 113 of the Rehabilitation Act, as amended by *WIOA*, requires that pre-employment transition services, including work-based learning experiences, be made available to students with disabilities in need of such services who are eligible or potentially eligible for VR services. Work-based learning experiences may include in-school or after school opportunities, or experiences outside the traditional school setting (including [internships](#)), that are provided in an integrated environment to the maximum extent possible.

5. WIOA youth formula funding and work-based-learning experiences

[At least 20 percent of local WIOA Title I youth formula funds](#) must be used for work-based learning. Such work-experiences may include summer and year-round employment, pre-apprenticeship, on-the-job training, or internships and job shadowing. Eligible training providers deliver these services in local communities, which can be accessed through local [American Job Centers](#).

[WIOA requires coordination of services](#) to promote career readiness, secondary school completion, entry into postsecondary education, and [postsecondary credentials aligned with in-demand industry sectors](#). Additional allowable activities include entrepreneurial skills training and financial literacy education.

BENEFITS FOR THE INDIVIDUAL

6. Benefits of work-based learning experiences include:

a. Fostering self and career exploration.

In addition to establishing a clear connection between education and work, work-based learning facilitates an [assessment of interests, strengths, and abilities](#) while exploring possible career paths.

b. Developing positive work habits and attitudes.

Work-based learning experiences provide the opportunity to strengthen six key [soft skill areas](#) - communication, enthusiasm and attitude, teamwork, networking, problem solving and critical thinking, and professionalism. These types of skills provide a competitive advantage for achieving career goals.

c. Assessing abilities and strengths.

Work-based learning experiences provide opportunities for assessing abilities and strengths outside the classroom. Participation in job related tasks provides a chance to explore how to communicate disability-related work support and accommodation needs, if necessary. [Knowing if, how and when to disclose a disability](#) is a necessary part of self-assessment.

d. Expanding professional networks.

[Networking](#) can provide access to professionals who have similar interests and possibly provide access to an individual's next employer.

e. Becoming better informed to make decisions before accepting a job offer.

Many work-based learning experiences offer rewards and/or compensation. For example, some work-based learning experiences offer a salary. If it is unpaid, the program may offer a stipend and/or housing. Some employers may offer [health insurance](#) when an employee works 40 hours or more a week. Others might offer training and/or certification in an industry of their choice. Weighing the pros and cons can be overwhelming, but it is important to make sure a person's [next move](#) is aligned with their career and [financial goals](#), and ultimately supports their well-being and independence.

BENEFITS FOR THE COMMUNITY

7. Benefits of work-based learning experiences for State agencies, local service providers, employers, and the local economy may include:

a. Making education more relevant.

Work-based learning experiences can be a valuable component of specially designed instruction for students. [Research](#) has found that students in work-based learning programs complete related coursework at high rates and have higher attendance and graduation rates than those not enrolled in such programs.

b. Allowing [employers](#) to tap into a pool of skilled workers.

Work-based learning experiences motivate potential employees and future employers to hire job ready individuals, which reduces training costs and improves employee retention. Establishing collaboration among schools and employers leads to a more productive local economy and, ultimately, builds thriving communities.

c. Recognizing the shared responsibilities for a successful work experience.

Quality work experiences are especially dependent on all participants' knowledge and fulfillment of their roles in the arrangement for a [work-based learning experience](#). Students must perform job responsibilities, transition specialists must orient students to the workplace, their roles and responsibilities; and employers must provide clear, detailed, and repeated directions to teach skills needed for successful job performance.

d. Assisting State agencies to meet requirements of Federal and State laws.

Transition services are provided to students with disabilities under the *Individuals with Disabilities Education Act* (IDEA) and to students and youth with disabilities under the Rehabilitation of 1973, as amended by *WIOA*. These laws are authorized to help meet the needs of students with disabilities and prepare them to obtain direct employment or a career path leading to employment. [Work-based learning experiences](#) may be used by schools and vocational rehabilitation (VR) agencies to help meet requirements for providing pre-employment transition services² and transition services under *WIOA*, and transition services under *IDEA*.

e. Strengthening community partnerships.

Through partnerships with State agencies, including State educational agencies and State VR agencies, schools, worksites, businesses, families and community organizations, communities can create opportunities to develop transferrable skills to prepare for postsecondary education and employment.

² Under section 113 of the *Rehabilitation Act*, work-based learning experiences are 1 of the 5 required pre-employment transition activities and are only available to students with disabilities.

8. Work-based learning experiences impact leadership development and genuinely engage people in their communities.

Beyond the specific benefits to individuals and to the agencies and employers mentioned, [leadership development](#) can foster the voices of youth with disabilities in the decision-making processes that affect them. It improves [soft skills](#), which many employers view as [important to work readiness](#). It also encourages employers and agencies to better coordinate and better engage with all members of their community, helping them to provide better services.

This document was created by the *Federal Partners in Transition* (FPT). FPT is a workgroup with representatives of several federal agencies, including the Department of Education, the Department of Health and Human Services, the Department of Labor, and the Social Security Administration, which are involved in promoting inclusive service delivery for transitioning youth with disabilities from school into postsecondary education, the workforce, and independent living. Additional information about FPT's shared vision, compatible outcomes goals, and policy priorities can be found in [The 2020 Federal Youth Transition Plan: A Federal Interagency Strategy](#). The report is available at: <http://youth.gov/feature-article/federal-partners-transition>.

**THECB APPENDIX 1:
Statewide Stakeholder Consultation Meetings**

STAKEHOLDERS ATTENDING REGIONAL PERKINS V STAKEHOLDER MEETINGS (AUG-OCT 2019)

(Number of individuals)

DATES	HOST COLLEGE	REGION	ADMINISTRATOR S	SUPPORTS SPECIALISTS	EMPLOYERS	STUDENTS/PARENTS	REGIONAL INSTITUTIONS	TOTALS
22-23 Aug	Angelina College	SOUTHEAST	29	6	5	5	11	56
9-Sep	Austin Community College	CENTRAL	37	0	8	1	27	73
11-Sep	Clarendon College	HIGH PLAINS	24	0	20	43	9	96
19-Sep	Tarrant County Community College	METROPLEX	68	54	50	40	32	244
26-Sep	Del Mar College	SOUTH	36	11	17	36	20	120
2-Oct	Midland College	WEST	29	12	20	27	15	103
14-Oct	San Jacinto College District	GULF COAST	60	28	67	123	16	294
17-Oct	Tyler Junior College	UPPER EAST	15	0	7	6	19	47
		TOTALS	298	111	194	281	149	1033

52 of 54 Texas community and technical colleges and districts participated in Perkins V Stakeholder meetings.
37 stakeholder sessions

STAKEHOLDERS ATTENDING ONSITE THECB CONSULTATIONS

(Number of individuals)

Date/Location	Community, State, and Technical College Representatives	Postsecondary State Policy &	Special Populations Organizations & Groups
7-Jun Austin	49		
2-Aug Austin		8	18

**THECB APPENDIX 2:
Postsecondary Statewide Stakeholder Consultation Outcomes**

Takeaways from Stakeholder Consolidated Notes: Potential Actions for THECB, Other CTE-Engaged State Agencies, Colleges, and Collaborations among Them

Advance CTE Statewide

- Launch a statewide campaign that utilizes traditional and social media to spotlight CTE's diverse programs and lucrative career alternatives. This includes early and intentional communications and information to promote CTE options with diverse audiences, but particularly parents, students and high school personnel.
- Establish a state-level, multi-agency CTE advancement agenda based on cross-agency collaboration and information sharing. Agencies would coordinate field communications, align state offerings, and facilitate program efficiencies for all workforce sectors and the CTE pipeline from secondary to postsecondary to employment.
- Build relationships between workforce and postsecondary education that are multi-layered and carefully tended, with faculty to employer relationships at the base, as well as more formal structures such as Industry Advisory Boards and central points of contact at campuses.

Improve Students' CTE Program Experience

- Assure that every CTE program supports students in attaining job-ready academic and technical skills, opportunities for work-based learning, and relevant employability skills.
- Smooth student pathways from secondary to postsecondary CTE through comprehensive counseling and instructor training, flexible scheduling, and program mapping to support better course access for students and better tracking of students as they navigate their CTE options.
- Build awareness and training for all institutional personnel about student support resources on campus and in the community, including referrals for counseling; emergency funding; health services; and food, housing, childcare and transportation supports.

Support Rapid Response to Local Employer Needs

- Streamline THECB approval of CTE programs and updates to the statewide CTE course database to support more rapid institutional response time to changing employer needs, technology updates, and market shifts.
- Support business and industry consultation at the state level.

Cross Sector Collaboration

Views from the Field on Cross Sector Collaboration

- Goals and strategies for creating streamlined CTE pathways are not aligned between sectors. In particular, the velocity of needs and actions are different across sectors.
 1. Employers need colleges to react or respond more quickly. Colleges need employers to tell them what their longer-term training needs are.
 2. Internal and external program approval processes are too lengthy for colleges to respond to workforce sectors' needs in a timely manner.
 3. There is a role for the state in streamlining curriculum and approving changes to make adoption processes move more quickly. Colleges need THECB to approve programs more quickly.
- There are programmatic disconnects on pathways from secondary to postsecondary and postsecondary to workforce.
 1. Secondary certifications and programs of study do not easily map onto postsecondary curricula (tenuous course content connection to college-level courses; credits/credentials may not transfer; technology may not be appropriate and instructors may not be adequately credentialed, which makes dual credit is challenging; financial aid implications).
 2. CTE programs often may not mirror current industry standards for employment (technology, training, soft skills, real-world exposure).
- There is a need to intentionally build multi-layered, informal and formal collaborative mechanisms to support cross sector relationships.
 1. Multiple engagements are needed: advisory boards, job fairs, site visits, work-based learning, etc.
 2. Relationships should cross various sectors and should include leadership from those various sectors.
 3. Regional collaboration addressing workforce needs should be considered, particularly in larger geographical service areas.
- Communication at all levels needs improvement. Collaboration is hindered by sectoral differences in language and terminology.
 1. Lack of shared language and understanding complicates coming up with responses to the different needs of students, workforce and institutions.
- Scaling work-based learning is necessary to build richer instructional experiences and mirror workforce realities for students.
 1. Collaboration between sectors can be leveraged through internships and apprenticeships
 2. Regional collaboration for work-based learning opportunities has some potential.
- Marketing and messaging – awareness raising and information sharing -- about CTE will be required to remove misperceptions and stigma.
 1. Need more exposure of the value of CTE programs in high schools and the community through intentional and multi-platform outreach.
 2. Messaging should address the value of CTE programs and correct misconceptions about CTE.

3. Efforts are need to be strategic and intentional both at an institutional level and state level.

Issues Raised by Stakeholders about Cross Sector Collaboration

Employers

- Communication.
- Pathways from high schools through entering employment.
- Marketing.
- Centralized point of contact for employers.
- Alignment of timelines between businesses and institutions.

Regional Institutions

- Communication.
- Pathway of secondary to postsecondary.
- Marketing.
- Internal institutional partnerships to enhance collaboration and student success i.e. adult ed., CTE. Assist with transferability within educational programs.

Student Support Employees

- More engagement with employers.
- Communication- no silos.
- Pathways with high schools.
- Marketing and CTE outreach/inclusion.

Students/Parents

- N/A

CTE Faculty/Administration

- Quality of instruction in high school CTE.
- Marketing.
- Communication at all levels i.e. state-level, local level, workforce boards, ISD's.
- Hiring instructors with industry expertise.

Program Improvement

Views from the Field on Program Improvement

- There are a number of improvement drivers pertinent to curricular and administrative CTE programs.
 - Curriculum & Training Quality
 1. Technical and employability skills are good measures of program quality.
 2. There is a need for greater incorporation of employability skills in CTE programs.
 - Students need to be presented with employment opportunities, recruitment and face time with employers.
 3. Equipment and curriculum need to be aligned with employers' needs and up-to-date.
 - Need more active advisory committee engagement.
 - Difficult to keep equipment up to date.
 - Students cannot afford required equipment/technology.
 - Need to speed up program development and increase program capacity to meet employers' needs.
 4. Opportunities for work-based learning are a good measure of program quality.
 - Programs need internships and other work-based learning as a component of curriculum.
 - Faculty Quality
 1. Credentialed and experienced faculty determine program quality to a great extent.
 - Recruitment and retention of qualified faculty can be difficult for institutions.
 2. Faculty training both professional development and externships improve faculty preparedness.
 - Funding to support ample professional development is needed.
 - Industry partnerships need to be leveraged for externship opportunities for faculty.
 - CTE Marketing & Outreach
 1. CTE-awareness in high school increases student awareness of CTE opportunities.
 - High school attention to counseling, advising and placement in career pathways rather than just on 4-year tracks.
 - CTE advocates from colleges spend time in high schools.
 - Training on the value of CTE for high school counselors.
 - Ample CTE representation at career events like college fairs increases student awareness.
 - High schools help facilitate on-campus college fairs.
 - Institutional attention to contemporary social media and newer modes of communication.
 - CTE Student Success

1. Supportive services reduce and/or eliminate barriers.
 - Funding for services is sometimes limited.
 - Outreach to students does not always fully penetrate the CTE student body.
2. Institutional tracking of success measures beyond completion i.e. industry-based certifications, course and credentialing exam pass rates, job placement and retention, salary level, etc. can enhance student success.
 - Institutions need to track outcomes and promote successful programs beyond program completion to assist with student success.
 - These measures need to be used to assess and calibrate program quality to improve student outcomes.
3. Institutions need to provide clear and flexible program pathways.
 - Block scheduling or other program maps assist students with clearer programmatic pathways.
 - Students need flexible scheduling for increased course access.

Issues Raised by Stakeholders about Program Improvement

Employers

- Faster adoption of curriculum changes and new programs.
- Contextualized learning to incorporate math and reading skills.
- Employability skills.
- Training and work-based learning.
- Updated training and equipment.
- Outcome tracking.
- Updated faculty.

Regional Institutions

- Quality of instruction.
- Engaged employers.
- Credential obtainment.
- Inclusion of employability skills.
- Upgrade/tightening/smooth CTE pathways.
- Intensive business and industry reviews more than once yearly.
- Coordination of data from various state agencies.
- Self-reporting creates issues.
- Objective metrics; market-based validation of CTE programs.

Student Support Employees

- Advisement and support.
- Curriculum- alignment with employers' training needs.
- Closer industry partnerships. Updated technology to meet industry standards.
- Pathways between secondary and postsecondary.

- Need broader partnerships in institutions and community.
- Students need to know expectations sooner i.e. time to degree, cost, etc.
- Disseminate CTE information to larger groups including the public.

Students/Parents

- Need for marketing and outreach i.e. programs available, cost, time to completion, etc.
- Consistent communication i.e. mixed messages from college staff to students.
- More instructors needed.
- More opportunities to take courses i.e. more faculty, more course offerings, more availability.
- More exposure to work-based experiences in program and job placement at completion.

CTE Faculty/Administration

- Marketing and outreach of CTE programs.
- More funding for current technology and faculty training.
- Objective market validation including certification, employment job retention, and salary.
- Communication between college and workforce partners.
- Preparedness of and assistance for students to succeed in class.

Access & Equity

Views from the Field on Access & Equity

- A significant number of community college students face a multitude of barriers to succeeding in college.
 1. Students may be unaware of CTE programs.
 2. Students may not know how to navigate college entry/onboarding.
 3. Students may not know how to access or ask for support services.
 4. Students may lack academic preparedness and college success skills.
 5. Students may have life situations, including financial challenges, that impair their ability to succeed.
- Students may be reluctant to self-identify as a special population student.
 1. The ability to support students may be hindered by the lack of self-identification.
 2. Performance indicators will not be accurate without more accurate counts of special populations.
 3. Providing opportunity to self-identify through admissions processes or campus campaigns may be effective.
- Institutions need to intentionally walk towards the student and not expect students to come to them.
 1. Colleges need to interrogate their assumptions about what students need most and prioritize those needs for action.
 2. Awareness needs to grow at all levels within an institution about available student resources within the institution and in the community.
 3. Professional development/training for faculty and staff is needed to enhance college-wide awareness about student's challenges/available solutions. Awareness and cross-training need to be embedded and "normalized" as a function of institutional life.
 4. Active assessment of the effectiveness of existing programs and supports can increase effectiveness.
 5. Be upfront with students about standards and expectations in programs as well as disqualifiers.
- Employers have a role to play.
 1. Employers are not always aware of the benefit of work-based learning to students which can provide real-world experience and build confidence.
 2. Employers may be reluctant to hire the non-traditional student and need to be encouraged to consider that option.
- High school counselors often do not advise knowledgeably or fairly about postsecondary CTE options.
 1. This requires professional development for high school personnel, which institutions might take responsibility for.
- THECB and TEA need to work more closely together to smooth pathways.
 1. There is a lack of consultation between TEA and THECB concerning the development of CTE curricula, certification, and grant programs.

Issues Raised by Stakeholders about Access & Equity

Employers

- Aggressive marketing.
- Leverage community resources.
- Address students' basic needs first.
- Financial issues that can be addressed by institutions i.e. out-of-district fees.
- More online opportunities.

Regional Institutions

- Non-traditional application processes: example of strict allied health admissions processes.
- Re-working counseling and advising.
- Leveraging community resources.
- Student self-identification issues.
- CTE stigma deters access.

Student Support Employees

- Students' basic needs met first. Customize support.
- Time is an issue. Creative scheduling.
- Need to identify special populations CTE students sooner.

Students/Parents

- Unaware of resources, or do not access them.
- Multitude of barriers: childcare, transportation, cost of attendance, cost of supplies (uniforms, tools, technology), textbooks, housing, food.
- Flexibility with class offerings.
- Difficult to navigate college processes.
- Outreach and marketing.
- Support is not always available i.e. tutoring, faculty availability.
- Students do not feel understood.
- Need upfront knowledge of program requirements i.e. time commitment, fees, required materials/supplies.

CTE Faculty/Administration

- High school outreach and marketing.
- Needs for hands-on experience.
- Visibility and access of resources.
- Better use of time and space. Flexible scheduling.

Continuing Engagement with Stakeholders

Views from the Field on Continuing Engagement

- Because communication at all levels needs to be improved, state agencies need to take a role in harnessing, clarifying and disseminating information to the field.
 1. THECB and state agencies should coordinate communication about career pathways and articulate a state-level CTE agenda for example, TEKS and WECM.
 2. State agencies should facilitate the creation of secondary to postsecondary CTE curriculum continuities, such as CTE curricular and content maps.
 3. Agencies should align service areas.
- A CTE promotion and awareness initiative is needed at the state level.
 1. State-level promotion/emphasis on partnerships and collaborations is needed.
 2. THECB should spearhead cross sector collaborations and create the means for various stakeholders to communicate and collaborate at a higher level.
 3. There should be more efforts made to spread information about Perkins' priorities and goals to various stakeholders.
 4. Agencies should promote best practices in CTE.
- *Clear up the confusion at the state-level regarding endorsements/tracking/pathways with TEA and secondary education.**
- There is a need to educate state-level minds on local policies. Policy is built at the state-level but may not match local needs.

Issues Raised by Stakeholders about Continuing Engagement

Employers

- Connect and promote CTE to the high school and community.
- High school and college CTE need to be one pathway.
- Local/regional CTE council for promotion and coordination.
- THECB needs to be more involved with the workforce.

Regional Institutions

- More webinars and Q&A's from THECB.
- Publish best practices.
- THECB provides leadership/guidance/best practices for addressing equity and access.
- More Perkins trainings and continued/enhanced communications such as "Perkins Update."
- Selling the value and removing the stigma of CTE needs to start at the top with leadership and a CTE platform from the state.

Student Support Employees

- Continued conversation with various stakeholders to ensure student's needs are met.
- Institutional information sharing is vital. Everyone needs to work together. Remove silos.
- More funding for CTE.
- Some resources are underutilized.

**THECB APPENDIX 3:
Postsecondary Perkins V Local Application**

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Local Application**

Application: Basic Grant
Institution:

Local Application Requirements

Each applicant shall submit a Local Application, comprising 10 sections, that address the nine statutory requirements of the Perkins Act and Goal Two: Completion of "60x30TX: Texas Higher Education Strategic Plan" (see [Appendix E](#)). The Local Application shall be consistent with the Requirements for Uses of Funds ([Appendix I](#)).

In the Local Application and in any other applicable sections of the application, "Special Populations" means: 1. individuals with disabilities; 2. individuals from economically disadvantaged families, including low-income youth and adults; 3. individuals preparing for non-traditional fields; 4. single parents, including single pregnant women; 5. out-of-workforce individuals; 6. English learners; 7. Homeless individuals described in section 725 of the McKinney-Vento Homeless Assistance Act (42 U.S.C 11434a); 8. Youth who are in, or have aged out of, the foster care system; and 9. Youth with a parent who a. Is a member of the armed forces (as such term is defined in section 101(a)(4) of title 10, United States Code); and b. Is on active duty (as such term is defined in section 101(d)(1) of such title).

Local Plan (10 items)

- (1) Describe the results of the comprehensive needs assessment conducted under [Appendix D](#).
- (2) Provide information on the institution's career and technical education course offerings and activities to be supported with Perkins funds, including programs of study approved by the State, including
 - A. how the results of the comprehensive needs assessment described in [Appendix D](#) informed the selection of the specific career and technical education programs and activities selected to be funded;
 - B. a description of any new programs of study the eligible recipient will develop and submit to the State for approval; and
 - C. how students, including students who are members of special populations, will learn about their school's career and technical education course offerings and whether each course is part of a career and technical education program of study.
- (3) Describe how the institution will collaborate with local workforce development boards and other local workforce agencies, one-stop delivery systems, and other partners to provide
 - A. career exploration and career development coursework, activities, or services;

- B. career information on employment opportunities that incorporate the most up-to-date information on high-skill, high-wage, or in-demand industry sectors or occupations, as determined by the comprehensive needs assessment described in [Appendix D](#); and
- C. an organized system of career guidance and academic counseling to students before enrolling and while participating in a career and technical education program.

(4) Describe how the institution will improve the academic and technical skills of students participating in career and technical education programs by strengthening the academic and career and technical education components of such programs through the integration of coherent and rigorous content aligned with challenging academic standards and relevant career and technical education programs to ensure learning in the subjects that constitute a well-rounded education (as defined in section 8101 of the Elementary and Secondary Education Act of 1965).

(5) Describe how the institution will

- A. provide activities to prepare special populations for high-skill, high-wage, or in-demand industry sectors or occupations that will lead to self-sufficiency;
- B. prepare CTE participants for non-traditional fields;
- C. provide equal access for special populations to career and technical education courses, programs, and programs of study; and
- D. ensure that members of special populations will not be discriminated against on the basis of their status as members of special populations.

(6) Describe the work-based learning opportunities that the institution will provide to students participating in career and technical education programs and how the recipient will work with representatives from employers to develop or expand work-based learning opportunities for career and technical education students.

(7) Describe how the institution will provide students participating in career and technical education programs with the opportunity to gain postsecondary credit while still attending high school, such as through dual or concurrent enrollment programs or early college high school.

(8) Describe how the institution will coordinate with the THECB and other institutions of higher education to support the recruitment, preparation, retention, and training, including professional development, of teachers, faculty, administrators, and specialized instructional support personnel who meet applicable State certification and licensure requirements, including individuals from groups underrepresented in the teaching profession.

(9) Describe how the institution will address disparities or gaps in performance in each of the State plan years, and if no meaningful progress has been achieved prior to the third program year, describe the additional actions the institution will take to eliminate those disparities or gaps.

(10) In addition to the nine items above, describe how the activities discussed above will contribute to Goal Two: Completion of "60x30TX: Texas Higher Education Strategic Plan."

Original Application

Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Performance Improvement Plan / Evaluation Plan**

Application: - Basic Grant

Institution:

Perkins Core Indicator 1P1: Postsecondary Retention and Placement

The percentage of CTE concentrators who, during the second quarter after program completion, remain enrolled in postsecondary education, are in advanced training, military service, or a service program that receives assistance under title I of the National and Community Service Act of 1990 (42 U.S.C. 12511 et seq.), are volunteers as described in section 5(a) of the Peace Corps Act (22 U.S.C. 2504(a)), or are placed or retained in employment.

Numerator: TBD

Denominator: TBD

Actual Institutional Performance Compared to State Targets by Program Year

Institution	2019-2020			2020-2021			2021-2022			2022-2023	
	Actual [1]	Target	90%	Actual [2]	Target	90%	Actual [3]	Target	90%	Target	90%
State Performance/Target	N/A	N/A	N/A	TBD	TBD	TBD	TBD	TBD	TBD	TBD	TBD
College Performance	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A		

Source: TBD Reporting Year: [1] TBD [2] TBD [3] TBD

2019-2020 State Target met?: N/A 90% met?: N/A 90% met at least once in last 3 years?: N/A

Performance Improvement Plan

Summary of Plan:

Key CTE Programs and Activities Identified:

Specific Budget Items Requested:

Evaluation Plan

Activities/Strategies	Timeline Planned	Target Measures

Perkins Core Indicator 2P1: Earned Recognized Postsecondary Credential

The percentage of CTE concentrators who receive a recognized postsecondary credential during participation in or within 1 year of program completion.

Numerator: TBD

Denominator: TBD

Actual Institutional Performance Compared to State Targets by Program Year											
Institution	2019-2020			2020-2021			2021-2022			2022-2023	
	Actual [1]	Target	90%	Actual [2]	Target	90%	Actual [3]	Target	90%	Target	90%
State Performance/Target	N/A	N/A	N/A	TBD	TBD	TBD	TBD	TBD	TBD	TBD	TBD
College Performance	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A		
Source: TBD Reporting Year: [1] TBD [2] TBD [3] TBD											
2019-2020 State Target met?: N/A 90% met?: N/A 90% met at least once in last 3 years?: N/A											

Performance Improvement Plan

Summary of Plan:

Key CTE Programs and Activities Identified:

Specific Budget Items Requested:

Evaluation Plan

Activities/Strategies	Timeline Planned	Target Measures

Perkins Core Indicator 3P1: Non-Traditional Program Enrollment

The percentage of CTE concentrators in career and technical education programs and programs of study that lead to non-traditional fields.

Numerator: TBD

Denominator: TBD

Actual Institutional Performance Compared to State Targets by Program Year											
Institution	2019-2020			2020-2021			2021-2022			2022-2023	
	Actual [1]	Target	90%	Actual [2]	Target	90%	Actual [3]	Target	90%	Target	90%
State Performance/Target	N/A	N/A	N/A	TBD	TBD	TBD	TBD	TBD	TBD	TBD	TBD
College Performance	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A		
Source: TBD Reporting Year: [1] TBD [2] TBD [3] TBD											
2019-2020 State Target met?: N/A 90% met?: N/A 90% met at least once in last 3 years?: N/A											

Performance Improvement Plan

Summary of Plan:

Key CTE Programs and Activities Identified:

Specific Budget Items Requested:

Evaluation Plan

Activities/Strategies	Timeline Planned	Target Measures

Original Application Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Cost Category Schedule A: Salaries and Fringe Benefits**

Application: - Basic Grant
Institution:

I. Activity	Line	II. Title/Position	III. % of Time on Project	IV. Amount
Total				

Original Application Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Cost Category Schedule B: Travel**

Application: - Basic Grant
Institution:

I. Activity	Line	II. Title/Position	III. Purpose	IV. Amount
Total				

Original Application Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program Year
Cost Category Schedule C: Capital Outlay/Equipment**

Application: - Basic Grant
Institution:

I. Activity	Line	II. Description	III. Amount
Total			

Original Application Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Cost Category Schedule D: Consultant and Service Contracts**

Application: - Basic Grant
Institution:

I. Activity	Line	II. Individual or Firm	III. Purpose	IV. Amount
Total				

Original Application Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
Cost Category Schedule E: Subgrants Not Allowable for Basic**

Application: - Basic Grant
Institution:

I. Activity	Line	II. Recipient	III. Purpose	IV. Amount
NA		N/A	N/A	
Total				

Original Application

Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program**

Cost Category Schedule F: Operating Expenses, Services, Books, and Supplies

Application: - Basic Grant

Institution:

I. Activity	Line	II. Description	III. Amount
Total			

Original Application

Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program**

Cost Category Schedule G: Administration

Application: - Basic Grant

Institution:

Line	I. Description	II. Amount
Total		

Original Application

Approved -

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
CB-100: Budget Summary Page**

Application: - Basic Grant

Institution:

COST CATEGORY	(A) Original Budget	(B) Cumulative Budget Revisions Requested	(C) Revised Total Budget	(D) Actual Cumulative Expenditures Through:
1. Salaries and Fringe Benefits (Schedule A)				
2. Travel (Schedule B)				
3. Capital Outlay/Equipment (Schedule C)				
4. Consultant and Service Contracts (Schedule D)				
5. Subgrants (Schedule E)				
6. Operating Expenses, Services, Books, and Supplies (Schedule F)				
7. SUBTOTAL - DIRECT (Lines 1-6)				
8. Administration (Schedule G)				
9. TOTAL (Line 7 plus Line 8)				
10. LAST EXPENDITURE REIMBURSEMENT REQUEST TOTAL (Line 9 Column D on prior request)				
11. TOTAL REIMBURSEMENT FOR THIS REQUEST (Line 9 minus Line 10)				
Name/Title of Chief Financial Officer	Signature <i>Electronic Submission Authorized by Financial Identification Number (FIN)</i>		Phone/FAX/E-mail	

FOR COORDINATING BOARD USE ONLY

Project Advisor:

BMS #:

COBJ:

Administrative Cost Method:

Original Application

Approved

**Texas Higher Education Coordinating Board
Carl D. Perkins Grants for Program
CB-320: Budget Summary by Activity**

Application: - Basic Grant

Institution:

ACTIVITY	COST BY CATEGORY						
	Salaries and Fringe Benefits (Schedule A)	Travel (Schedule B)	Capital Outlay/ Equipment (Schedule C)	Consultant and Service Contracts (Schedule D)	Subgrants (Schedule E)	Operating Expenses, Services, Books, and Supplies (Schedule F)	Total Activity Budget - Sum of Schedules A through F
1. Upgrade Curriculum							
2. Professional Development							
3. Guidance and Counseling							
4. Instructional Equipment							
5. Special Populations							
6. N/A							
7. Other							
8. One-Stop Shops							
9. SUBTOTAL - DIRECT (Lines 1-8)							
10. Administration (Schedule G)**							
11. TOTAL							

** Expenditures reported on Line 10. Administration/Total Activity column, cannot exceed 5% of the actual direct expenditures on Line 9. SUBTOTAL - DIRECT/Total Activity column.

**THECB APPENDIX 4:
Postsecondary Perkins V
Comprehensive Local Needs Assessment**

Comprehensive Local Need Assessment Instructions

I. Composing the CLNA Task Force

The CLNA Task Force should be composed of individuals who have the ability and opportunity to work together closely on CLNA planning and execution over a concentrated period of time. Members should primarily be institutionally affiliated. A chair or co-chairs should be appointed to organize and facilitate Task Force meetings, oversee Task Force activities and make sure the CLNA process proceeds smoothly. The Task Force's suggested size is 8 to 12 members. The following list is a suggested guideline for putting together a CLNA Task Force.

- Vice Chancellor or Vice President for Workforce
- CTE Deans
- CTE Department or Division Heads
- CTE Faculty
- Member(s) of the institution's Industry Advisory Boards
- Representative(s) of local Workforce Development Board
- CTE student representative(s)

II. Planning

- A.** *Determine specific geographic area subject to CLNA*
- B.** *Determine local goals, core messages and timeline*
- C.** *Identify Stakeholders and CLNA Task Force members*
- D.** *Identify local or regional collaborators in data development, stakeholder outreach, or other CLNA components*
- E.** *Determine means for seeking feedback*

III. Gathering Data, Evidence and Field Input

A. *Student Performance Data*

1. Intentionally source data from multiple locations. Ensure that information is collected from a variety of sources using both quantitative and qualitative methods in order to cross-validate what is learned from one methodology or information source with is found from another source or method of data collection.
 - Data of use to the needs assessment process can come from internal sources, such as student performance data, student and parent survey findings, and feedback from industry advisory boards.
 - Data collected externally, such as third-party evaluations of programs, may also be used.
2. THECB Provided Data: The Coordinating Board will provide data for the institution's CTE student performance, disaggregated by special populations categories (Perkins IV historical), for two- and four-digit CIP codes.

B. Labor Market Data

1. Data collected externally for local or regional strategic plans and federal programs, such as the local WIOA plan filed annually by local Workforce Boards, may be of use.
2. TWC's State labor market information (LMI) tool (<https://texaslmi.com>) and results of state or third-party evaluations of programs may also be used.
3. Advisory committee evaluations or input may be used.
4. NB: TEA has developed data on median wage, growth, and annual openings in occupations for 13 career clusters. These data will be made available when TEA posts them following public comment.

C. Stakeholder Engagement

1. Compose a Stakeholder Engagement Strategy and Action Plan
 - Establish goals and objectives for communications and engagement efforts.
 - Create a topic list for stakeholder conversations. For example:
 - Discuss potential root causes of inequitable outcomes in your CTE programs (All stakeholders)
 - Discuss the relevant academic, technical and employability skills needed in CTE programs (All)
 - Discuss if all learners access high-quality CTE programs and what barriers currently exist that prevent special population groups from accessing your programs. (All)
 - Discuss what additional accommodations, modifications and supportive services would help ensure access and equity for all students within your programs. (All)
 - Discuss how better to inform and engage stakeholders in the effort to advance CTE. (All)
 - Discuss perceptions of what skill needs may be lacking in your programs (Industry, Employers)
 - Discuss what opportunities exist in your local labor market for students with disabilities, English learners or other special populations (Industry, Employers)
 - Determine how you will measure the success of your communications and engagement efforts.
2. Undertake Stakeholder Outreach
 - Identify priority stakeholders. Statute says at a minimum this includes:
 - Representatives of CTE programs in a local educational agency or educational service agency, including teachers, career guidance and academic counselors, principals and other school leaders, administrators, and specialized instructional support personnel and paraprofessionals;
 - Representatives of CTE programs at postsecondary educational institutions, including faculty and administrators;
 - Representatives of the State board or local workforce development boards and local or regional industries;
 - Parents and students;
 - Representatives of special populations;

- Representatives of regional or local agencies serving out-of-school youth, homeless children and youth, and at-risk youth;
- Representatives of Indian Tribes and Tribal organizations in the State, where applicable.
- Communicate strategically
 - Use core messages and create stakeholder-specific messages
 - Use multiple vehicles of communications
- Structure engagements such as focus groups and surveys
- 3. Build Stakeholder Engagement
 - Use champions to move communications efforts forward
 - Provide a feedback loop to stakeholders to secure future participation
- 4. Document Stakeholder Engagements
 - Although not required for CLNA submission, retain records of stakeholder engagements such as meeting notes, participant lists, presentations for audit purposes

IV. Undertaking the CLNA Analysis

The CLNA Analysis Matrix is a tool that can be used to streamline the tasks of gathering evidence, developing findings and determining goals. The Matrix is divided into the six main areas of inquiry mandated by Perkins V: Student Performance, Program Implementation, Labor Market Alignment, CTE Program Implementation, Faculty and Staff Recruitment and Training and Access/Equity. Each of the six areas has key questions that should be answered through your data review, stakeholder consultations and discussions among your institution’s CLNA work group.

The CLNA Analysis Matrix is **not** a required part of the submission of the CLNA.

V. Composing the CLNA Narrative

The CLNA Narrative is actually the CLNA you will be submitting to the THECB.

The body of your narrative should be the write up of the information and observations you collected on the CLNA Analysis Matrix. The Narrative should follow the CLNA Narrative Template, which indicates the sections and sub-sections required of the document, including a cover page, summary, narrative with the same six components found in the CLNA Matrix, and suggested Appendices.

Use the CLNA Checklist below for guidance on how to put together the different sections of the CLNA Narrative.

CLNA CHECKLIST

Sections	Page Limitation	Notes on Content
Cover Page	1	
Narrative		
Part 1. Student Performance	Up to 4	Evidence base; Analysis; Goals
Part 2. Size, Scope & Quality	Up to 4	Evidence base; Analysis; Goals
Part 3. Labor Market Alignment	Up to 3	Evidence base; Analysis; Goals
Part 4. Implementing CTE	Up to 3	Evidence base; Analysis; Goals
Part 5. Recruitment, Retention & Training Staff & Faculty	Up to 3	Evidence base; Analysis; Goals
Part 6. Access & Equity	Up to 3	Evidence base; Analysis; Goals
Appendices		
Data Tables	No limit	Include original data Analyses; do not include THECB provided data tables
Stakeholder Results	No limit	Do not include rosters of participants but do save them for audit purposes; Include notes on stakeholder consultations

REFERENCE FROM PERKINS V:

ALIGNMENT WITH STATE PLAN REQUIREMENTS

Describe how your institutions will—

- i. make information on approved programs of study and career pathways (including career exploration, work-based learning opportunities, early college high schools, and dual or concurrent enrollment program opportunities) and guidance and advisement resources, available to students (and parents, as appropriate), representatives of secondary and postsecondary education, and special populations, and to the extent practicable, provide that information and those resources in a language students, parents, and educators can understand;
- ii. develop and coordinate career and technical education programs and programs of study and career pathways that include multiple entry and exit points;
- iii. use State, regional, or local labor market data to determine alignment of eligible recipients' programs of study to the needs of the regional, or local economy, including in-demand industry sectors and occupations identified by local workforce boards and employers, and align career and technical education with such needs;
- iv. ensure equal access to approved career and technical education programs of study and activities assisted by Perkins for special populations;
- v. support the local development of career pathways and articulate processes by which career pathways will be developed by local workforce development boards;
- vi. support effective and meaningful collaboration between secondary schools, postsecondary institutions, and employers to provide students with experience in, and understanding of, all aspects of an industry, which may include work-based learning such as internships, mentorships, simulated work environments, and other hands-on or inquiry-based learning activities; and
- vii. improve outcomes and reduce performance gaps for CTE concentrators, including those who are members of special populations. (Section 122(d)(4)(C) of Perkins V)

Comprehensive Local Need Assessment
 Analysis Matrix - Editable Excel File at
 TACTE Website

	EVIDENCE			FINDINGS		GOALS	
	Data to Review	Data Location	Stakeholders to Consult	Gaps	Potential Root Causes	Program Goals 2020-21	Program Goals 2021-2024
STUDENT PERFORMANCE QUESTIONS <ul style="list-style-type: none"> How are students in your CTE programs performing (academic success, degree completion) in comparison to non-CTE students? How are students from special populations performing in your CTE programs in comparison to CTE students who are not in those categories? Which groups of students are struggling the most in CTE programs? Which CTE programs overall have the highest student success rates and which have the lowest? Are there certain CTE programs in which one or more special populations categories are performing above the general CTE student population? Do the data suggest potential root causes for inequitable outcomes in your CTE programs? 							
PROGRAM IMPLEMENTATION – SIZE, SCOPE & QUALITY ALIGNMENT QUESTIONS <ul style="list-style-type: none"> Are you offering a sufficient number of courses, and course sections, within programs? 							

Comprehensive Local Need Assessment
Analysis Matrix

<ul style="list-style-type: none"> Are there students who want to enroll in your programs who are unable to do so? Should the need to transfer arise, do students have the ability to complete a program of study at your institution and/or other institutions in your service area? 									
<ul style="list-style-type: none"> How do your programs compare to a set of quality standards developed by your state or by a relevant third party? How do specific program areas compare in quality? How do specific components of your programs, such as work-based learning or instruction, compare in quality? 									
<ul style="list-style-type: none"> What industries are projected to grow the most in your local area? What occupations? Are your CTE program offerings broad enough to expose students to all the in-demand industry sectors or occupations in your region? How do your CTE program enrollments match projected job openings? Where are the biggest gaps? What are the emerging occupations in your area to which students should be exposed? 									

Comprehensive Local Need Assessment
Analysis Matrix

<ul style="list-style-type: none"> What skill needs have industry partners identified as lacking in your programs? Which graduates of your programs are thriving in the labor market, and why? What opportunities exist in your local labor market for students with disabilities, English learners or other special populations? 									
<ul style="list-style-type: none"> How fully are your programs aligned and articulated across secondary and postsecondary education? 									

Comprehensive Local Need Assessment
Analysis Matrix

	EVIDENCE		FINDINGS		GOALS		
	Data to Review	Data Location	Stakeholders to Consult	Gaps	Potential Root Causes	Program Goals 2020-21	Program Goals 2021-2024
<ul style="list-style-type: none"> Do your programs incorporate relevant academic, technical and employability skills at every learner level? Do you have credit transfer agreements in place to help students earn and articulate credit? Are your students being retained in the same program of study? Do students in the programs of study have multiple entry and exit points? Are students in your programs earning recognized postsecondary credentials? Which ones? Are secondary students in your programs earning dual/concurrent enrollment credit? 							
<ul style="list-style-type: none"> How diverse is your staff? Does it reflect the demographic makeup of the student body? What processes are in place to recruit and induct new faculty and staff? Are these processes efficient and effective, especially for faculty coming from industry? Are all of the faculty teaching your programs adequately credentialed? Do you offer regular, substantive professional development opportunities to faculty and staff? 							

Comprehensive Local Need Assessment
Analysis Matrix

<ul style="list-style-type: none"> What professional development offerings are most highly rated by participating staff? What do faculty report as needs and preferences for professional development, benefits and supports? In what subject areas do you need to develop or recruit more educators? 									
<ul style="list-style-type: none"> Which special populations groups are underrepresented in your CTE programs overall and in particular program areas? Overrepresented? Are there additional enrollment discrepancies related to high-wage, high-skill occupations? Can all learners access high-quality CTE programs of study? What barriers currently exist that prevent special population groups from accessing your programs? How are special population groups performing in your programs? What accommodations, modifications and supportive services do you currently provide to ensure the success of special population groups? Which ones are most effective? Which ones are underutilized? 									

**Comprehensive Local Need Assessment
Analysis Matrix**

<ul style="list-style-type: none"> What additional accommodations, modifications and supportive services would help ensure access and equity for all students within your programs? 									
<ul style="list-style-type: none"> How are you engaging the learners and communities you serve to better understand the problem and identify solutions? 									

Comprehensive Local Need Assessment Narrative Template

Summary Analysis:

1. Findings:
2. Vision:
3. Priorities:
4. Participants from your institution (Name, title, affiliation):
5. Local or regional collaborators in CLNA development:
6. Geographic area: How do you define "Local" for the purposes of this plan?

Part 1. Student Performance

1. Evidence Base:
2. Analysis:
 - a. High Points
 - b. Gaps
 - i. Root Causes
3. Goals:
 - a. Program Goals 2020-21
 - b. Program Goals 2021-24

Part 2. Size, Scope & Quality of Programs

1. Evidence Base:
2. Analysis:
 - a. High Points
 - b. Gaps
 - i. Root Causes
3. Goals:
 - a. Program Goals 2020-21
 - b. Program Goals 2021-24

Part 3. Labor Market Alignment

1. Evidence Base:
2. Analysis:
 - a. High Points
 - b. Gaps
 - i. Root Causes
3. Goals:
 - a. Program Goals 2020-21
 - b. Program Goals 2021-24

Part 4. CTE Program/Programs of Study Implementation

1. Evidence Base:
2. Analysis:

- a. High Points
- b. Gaps
 - i. Root Causes
- 3. Goals:
 - a. Program Goals 2020-21
 - a. Program Goals 2021-24

Part 5. Faculty/Staff Recruitment, Retention and Training

- 1. Evidence Base:
- 2. Analysis:
 - a. High Points
 - b. Gaps
 - i. Root Causes
- 3. Goals:
 - a. Program Goals 2020-21
 - a. Program Goals 2021-24

Part 6. Improving Access & Equity

- 1. Evidence Base:
- 2. Analysis:
 - a. High Points
 - b. Gaps
 - i. Root Causes
- 3. Goals:
 - a. Program Goals 2020-21
 - b. Program Goals 2021-24

Update on Texas Essential Knowledge and Skills (TEKS) Review

April 17, 2020

COMMITTEE OF THE FULL BOARD: ACTION

STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item provides the opportunity for staff to present an update on the review of the Texas Essential Knowledge and Skills (TEKS) and the English Language Proficiency Standards (ELPS). The item also provides the opportunity for the board to provide additional guidance to TEKS and ELPS review work groups.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(4); 28.002(a) and (c); and 28.025(a).

TEC, §7.102(c)(4), requires the State Board of Education (SBOE) to establish curriculum and graduation requirements.

TEC, §28.002(a), identifies the subjects of the required curriculum.

TEC, §28.002(c), requires the SBOE to by rule identify the essential knowledge and skills of each subject in the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials and addressed on the state assessment instruments.

TEC, §28.025(a), requires the SBOE to by rule determine the curriculum requirements for the foundation high school graduation program that are consistent with the required curriculum under the TEC, §28.002.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: The SBOE adopted the TEKS for all subjects effective September 1, 1998. The English language arts and reading TEKS were amended effective September 4, 2008. The Spanish language arts and reading TEKS were amended effective November 26, 2008. The TEKS for high school English elective courses were amended effective August 23, 2010. In May 2017, the SBOE gave final approval to revisions to the English and Spanish language arts and reading TEKS for Kindergarten-Grade 8 with a scheduled implementation date of the 2019-2020 school year. The SBOE gave final approval to revisions to the English language arts and reading and English as a second language (ESL) TEKS for high school with a scheduled implementation date of the 2020-2021 school year. The mathematics TEKS were amended effective August 1, 2006. The secondary mathematics TEKS were amended effective February 22, 2009. The mathematics TEKS were again amended effective September 12, 2012. The science TEKS were amended effective August 4, 2009 and were amended again to streamline the science TEKS effective August 27, 2018. The social studies TEKS were amended effective August 23, 2010 and were amended again to streamline the social studies TEKS in 2018. The streamlined social studies TEKS for middle and high school social studies were effective August 1, 2019 for implementation beginning with the 2019-2020 school year. The streamlined Kindergarten-Grade 5 social studies TEKS are scheduled for implementation in the 2020-2021 school year. The career and technical education (CTE) TEKS were amended effective August 23, 2010. The CTE TEKS were again amended effective August 28, 2017 and implemented in the 2017-2018 school year. The fine arts TEKS were amended effective August 24, 2015. The TEKS for languages other than English (LOTE) were amended effective July 15, 2014, and December 31, 2014, and were implemented in the 2017-2018 school year. The technology applications TEKS were amended effective September 26, 2011.

At the June 2019 SBOE meeting, the board held a work session to discuss updating the TEKS and instructional materials review and adoption schedule. At the September 2019 meeting, the board approved the schedule through the 2028-2029 school year.

BACKGROUND INFORMATION AND JUSTIFICATION: The board received training from a standards writing advisor at the July 2014 meeting. The standards writing advisor provided additional training to Texas Education Agency (TEA) staff in October 2014 to support future facilitation of the TEKS review committees.

The 2017 TEKS review and revision process was used for the streamlining of the social studies TEKS. At the November 2018 meeting, the SBOE approved updates to the 2017 TEKS review and revision process to better clarify the process. The complete updated process will be used for the review of the physical education, health education, and science TEKS.

The SBOE began the review of the English Language Proficiency Standards (ELPS) in early 2019, in accordance with the SBOE's approved TEKS and instructional materials review schedule. Applications to serve on ELPS review work groups were posted on the TEA website in December 2018. Also in December 2018, TEA distributed a survey to collect information from educators regarding the review and revision of the ELPS.

In preparation for the review and revision of the health education TEKS, the board in September 2017 requested that the commissioner convene a group of experts to develop a study to provide guidance for the development of revised health education TEKS. At that time, the SBOE also approved parameters for the recommendations of the commissioner's committee to include a framework for what the strands should be for Kindergarten-Grade 12, distinctions regarding grade levels and/or grade bands at which health concepts are most appropriately taught, and a summary of all statutory requirements related to health education and suggestions regarding the most appropriate way to integrate those requirements into the framework. In 2018, TEA convened a group of experts to develop recommendations to address the SBOE's charge related to the health education TEKS. This health education advisory committee drafted a response to the SBOE's charge, and the response was submitted to the commissioner of education. Based on the response, the commissioner of education provided recommendations to the SBOE at the June 2019 meeting.

The review of the health education TEKS is taking place concurrently with the review of the physical education TEKS. In March 2019, applications to serve on the health education and physical education TEKS review work groups were posted on the TEA website. At the April meeting, SBOE members were asked to designate content advisors for the health education and physical education TEKS reviews. Names of content advisors were due May 1, 2019. In May 2019, TEA distributed surveys to collect information from educators regarding the review and revision of the health education and physical education TEKS. TEA staff provided applications for the health education and physical education review work groups to SBOE members on a monthly basis from June to December 2019.

In preparation for the review of the science TEKS, SBOE members were asked at the September 2019 meeting to designate science content advisors. Applications to serve on the science TEKS review work groups were posted on the TEA website in November 2019, and in December 2019, TEA distributed a survey to collect information from educators regarding the review and revision of the TEKS for science. TEA staff provided the first set of applications for the science TEKS review work groups to SBOE members on January 13, 2020, and members were asked to submit approvals to the agency at the January 2020 meeting. Additional applications for science TEKS review work groups were sent to SBOE members in February and March 2020.

PUBLIC BENEFIT AND COST TO PERSONS: Benefits include better alignment of the ELPS and TEKS and coordination of the standards with the adoption of instructional materials.

Staff Member Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services

Shelly Ramos, Senior Director, Curriculum Standards and Student Support

COMMITTEE ON INSTRUCTION

Proposed Repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32
(Second Reading and Final Adoption)

April 17, 2020

COMMITTEE ON INSTRUCTION: ACTION

STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32. The proposed repeals would remove the Texas Essential Knowledge and Skills (TEKS) adopted to be effective in 2009 for high school English and Spanish language arts and reading and English as a second language and related implementation language that will be superseded by new 19 TAC §§110.35-110.39 and §§128.33-128.35 beginning with the 2020-2021 school year. No changes are recommended since approved for first reading.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(4); 28.002(a) and (c); and 28.025(a).

TEC, §7.102(c)(4), requires the State Board of Education (SBOE) to establish curriculum and graduation requirements.

TEC, §28.002(a), identifies the subjects of the required curriculum.

TEC, §28.002(c), requires the SBOE to by rule identify the essential knowledge and skills of each subject in the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials and addressed on the state assessment instruments.

TEC, §28.025(a), requires the SBOE to by rule determine the curriculum requirements for the foundation high school graduation program that are consistent with the required curriculum under the TEC, §28.002.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed repeals is August 1, 2020. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2020-2021 school year. The earlier effective date will allow districts of innovation that begin school prior to the statutorily required start date to implement the proposed rulemaking when they begin their school year.

PREVIOUS BOARD ACTION: The SBOE adopted the TEKS for English language arts and reading and Spanish language arts and reading and English as a second language effective September 1, 1998.

Amendments to the TEKS for English language arts and reading were adopted effective September 4, 2008, and August 22, 2011. Amendments to the TEKS for Spanish language arts and reading and English as a second language were adopted effective November 26, 2008. In April 2014, the board began the review and revision of the English and Spanish language arts and reading TEKS. At the April 2017 meeting, the SBOE approved for second reading and final adoption proposed revisions to 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter A, Elementary, and Subchapter B, Middle School, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter A, Elementary, and Subchapter B, Middle School, with an implementation date of the 2019-2020 school year. At the June 2017 SBOE meeting, the board approved for second reading and final adoption proposed revisions to 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, with an implementation date of the 2020-2021 school year.

At the January 2020 SBOE meeting, the board approved for first reading and filing authorization the proposed repeal of 19 TAC §§110.30-110.34, 110.85, and 128.30-128.32.

BACKGROUND INFORMATION AND JUSTIFICATION: In 2017, the SBOE adopted revisions to the English and Spanish language arts and reading and English as a second language TEKS. The revised TEKS for high school are scheduled to be implemented beginning with the 2020-2021 school year.

With the implementation of the revised English and Spanish language arts and reading TEKS for high school scheduled for the 2020-2021 school year, the current TEKS in 19 TAC §§110.30-110.34, 110.85, and 128.30-128.32 are no longer needed and may now be repealed.

The proposed repeals would remove the TEKS adopted to be effective in 2009 for high school English and Spanish language arts and reading and English as a second language and related implementation language that will be superseded by new 19 TAC §§110.35-110.39 and 128.33-128.35 beginning with the 2020-2021 school year.

The text of 19 TAC §§110.30-110.34 and 110.85 proposed for repeal can be found on the TEA website at <http://ritter.tea.state.tx.us/rules/tac/chapter110/index.html>. The text of 19 TAC §§128.30-128.32 proposed for repeal can be found on the TEA website at <http://ritter.tea.state.tx.us/rules/tac/chapter128/index.html>.

No changes are recommended since approved for first reading.

FISCAL IMPACT: No changes have been made to this section since published as proposed.

The TEA has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed.

The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed.

The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed.

The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed.

The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed.

TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed rulemaking would repeal existing regulations by removing rules that will be superseded beginning with the 2020-2021 school year.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not create a new regulation; would not expand or limit an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: No changes have been made to this section since published as proposed.

The proposal would remove language that will be superseded by new rules beginning with the 2020-2021 school year to avoid confusion. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed.

The proposal would have no data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed.

The TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: Following the January 2020 SBOE meeting, notice of the proposed repeals of 19 TAC §§110.30-110.34, 110.85, and §§128.30-128.32 was filed with the Texas Register, initiating the

public comment period. The public comment period on the proposal began March 6, 2020, and ended April 10, 2020. No comments had been received at the time this item was prepared. A summary of any public comments received regarding the proposal will be provided to the SBOE prior to and during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposal at the appropriate committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for second reading and final adoption the proposed repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32; and

Make an affirmative finding that immediate adoption of the proposed repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32, is necessary and shall have an effective date of August 1, 2020. *(Per TEC, §7.102(f), a vote of two-thirds of the members of the board is necessary for an earlier effective date.)*

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services
Shelly Ramos, Senior Director, Curriculum Standards and Student Support

Action Regarding Origo Education

April 17, 2020

COMMITTEE ON INSTRUCTION: ACTION STATE BOARD OF EDUCATION: ACTION

SUMMARY: This item provides the opportunity for the committee and board to consider action regarding Origo Education related to substitution of new editions of a student journal for its adopted products for English and Spanish math, grades K–5. Origo Education has substituted new editions for the products adopted by the State Board of Education (SBOE) in 2013.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§31.003, 31.022, and 31.151

TEC, §31.003, permits the State Board of Education (SBOE) to adopt rules for the adoption, requisition, distribution, care, use, and disposal of instructional materials.

TEC, §31.022(b), requires the SBOE to adopt rules to provide for a full and complete investigation of instructional materials for each subject in the foundation curriculum and for each subject in the enrichment curriculum.

TEC, §31.151(a), defines the duties of publishers and manufacturers of instructional materials, including the duty to deliver materials to school districts or charter schools and to provide an accurate shipping date for materials that are back-ordered.

TEC, §31.151(b), authorizes the SBOE to impose a reasonable administrative penalty against a publisher who knowingly violates subsection (a).

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: Math instructional materials from Origo Education were adopted in November 2013 under *Proclamation 2014*.

BACKGROUND INFORMATION AND JUSTIFICATION: The SBOE issued *Proclamation 2014* in April 2012.

TAC §66.75 permits a publisher to submit a request for approval to substitute an updated edition of state-adopted instructional materials. This section also requires that all requests for updates involving content in state-adopted instructional materials be approved by the SBOE prior to their introduction into state-adopted instructional materials.

PUBLIC BENEFIT AND COST TO PERSONS: Product updates provide more accurate student and teacher instructional materials. There is no anticipated economic cost to persons who are required to comply with the proposal.

Staff Members Responsible:

Monica Martinez, Associate Commissioner, Standards and Support Services
Kelly Callaway, Senior Director, Instructional Materials

Separate Exhibit: Origo Education Substitution Request
(to be provided at the April 2020 SBOE meeting)

**COMMITTEE ON SCHOOL FINANCE/
PERMANENT SCHOOL FUND**

**Proposed Repeal of 19 TAC Chapter 105, Foundation School Program,
Subchapter B, Use of State Funds
(Second Reading and Final Adoption)**

April 17, 2020

**COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND: ACTION
STATE BOARD OF EDUCATION: ACTION**

SUMMARY: This item presents for second reading and final adoption the proposed repeal of 19 Texas Administrative Code (TAC) Chapter 105, Foundation School Program, Subchapter B, Use of State Funds, §105.11, Maximum Allowable Indirect Cost, and §105.12, Basic Allotment. The proposed repeals would implement House Bill (HB) 3, 86th Texas Legislature, 2019, which removed the State Board of Education's (SBOE's) rulemaking authority related to maximum allowable indirect costs and the basic allotment for the Foundation School Program (FSP). No changes are recommended since approved for first reading.

STATUTORY AUTHORITY: Texas Education Code (TEC), §48.004, as transferred, redesignated, and amended by HB 3, 86th Texas Legislature, 2019.

TEC, §48.004, as transferred, redesignated, and amended by HB 3, 86th Texas Legislature, 2019, requires the commissioner to adopt rules, take actions, and require reports necessary to implement and administer the FSP.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed repeal is 20 days after filing as adopted with the Texas Register. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2020-2021 school year. The earlier effective date will implement legislation in a timely manner by removing provisions for which statutory authority no longer exists.

PREVIOUS BOARD ACTION: The SBOE adopted §105.11 effective September 1, 1996, and last amended the section effective December 26, 2011. The SBOE adopted §105.12 effective October 10, 1999.

At the January 2020 SBOE meeting, the board approved for first reading and filing authorization the proposed repeal of 19 TAC Chapter 105, Subchapter B.

BACKGROUND INFORMATION AND JUSTIFICATION: Section 105.11 establishes the limits that may be expended from special allotments on indirect costs related to compensatory education, bilingual education, special language programs, and special education.

Section 105.12 explains the authorized use of state aid for acquisitions, renovation, repairs, and maintenance of facilities.

HB 3, 86th Texas Legislature, 2019, renumbered TEC, §42.004, to §48.004. The renumbered statute was amended to remove the SBOE's rulemaking authority related to maximum allowable indirect costs and

the basic allotment for the FSP. The repeal of the rules is necessary since statutory authority no longer exists.

No changes are recommended since approved for first reading.

FISCAL IMPACT: No changes have been made to this section since published as proposed.

The Texas Education Agency (TEA) has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed.

The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed.

The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed.

The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed.

The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed.

TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed rulemaking would repeal an existing regulation. Section 105.11 and §105.12 would be repealed to implement HB 3, 86th Texas Legislature, 2019, which removed the SBOE's rulemaking authority related to maximum allowable indirect costs and the basic allotment for the FSP.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not create a new regulation; would not expand or limit an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: No changes have been made to this section since published as proposed.

The proposal would implement legislation by removing rules for which statutory authority no longer exists. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed.

The proposal would have no data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed.

TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: Following the January 2020 SBOE meeting, notice of the proposed repeal of 19 TAC Chapter 105, Subchapter B, was filed with the Texas Register, initiating the public comment period. The public comment period on the proposal began March 6, 2020, and ended April 10, 2020. No comments had been received at the time this item was prepared. A summary of any public comments received regarding the proposal will be provided to the SBOE during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposal at the appropriate committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for second reading and final adoption the proposed repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds; and

Make an affirmative finding that immediate adoption of the proposed repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register. *(Per TEC, §7.102(f), a vote of two-thirds of the members of the board is necessary for an earlier effective date.)*

Staff Members Responsible:

David Marx, Director, Financial Compliance

Thomas Heil, Financial Analyst, Forecasting and Fiscal Analysis

Attachment: Text of Proposed Repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds

ATTACHMENT
Text of Proposed Repeal of 19 TAC

Chapter 105. Foundation School Program

Subchapter B. Use of State Funds

§105.11. Maximum Allowable Indirect Cost.

- ~~(a) No more than 48% of each school district's Foundation School Program (FSP) special allotments under the Texas Education Code, Chapter 42, Subchapter C, may be expended for indirect costs related to the following programs: compensatory education, bilingual education and special language programs, and special education. No more than 45% of each school district's FSP special allotments under the Texas Education Code, Chapter 42, Subchapter C, may be expended for indirect costs related to gifted and talented education programs. No more than 42% of each school district's FSP special allotments under the Texas Education Code, Chapter 42, Subchapter C, may be expended for indirect costs related to career and technical education programs. Indirect costs may be attributed to the following expenditure function codes: 34—Student Transportation; 41—General Administration; 81—Facilities Acquisition and Construction; and the Function 90 series of the general fund, as defined in the Texas Education Agency publication, Financial Accountability System Resource Guide.~~
- ~~(b) For the 2012-2013 school year and each year thereafter, a school district may choose to use a greater indirect cost allotment under the Texas Education Code, §§42.151, 42.153, 42.154, and 42.156, to the extent the school district receives less funding per weighted student in state and local maintenance and operations revenue than in the 2011-2012 school year. The commissioner of education shall develop a methodology for a school district to make a determination under this section and may require any information necessary to implement this subsection. The commissioner's methodology must limit the percentage increase in allowable indirect cost to no more than the percentage decrease in state and local maintenance and operations revenue from the 2011-2012 school year.~~

§105.12. Basic Allotment.

~~[A school district may use state aid received pursuant to the Texas Education Code (TEC), Chapter 42, Subchapter B, and indirect costs as defined in §105.11 of this title (relating to Maximum Allowable Indirect Cost) for any lawful purpose, including operations and using, purchasing, or acquiring real property or land; improving real property; constructing or equipping buildings; renovating real property; repairing real property; or maintaining real property. A school district may fund obligations from state aid received pursuant to the TEC, Chapter 42, Subchapter B, including reduction of bond tax by deposit into the district debt service fund, lease purchase agreements, and public property finance contracts authorized under the Local Government Code, §271.004 and §271.005; time warrants issued pursuant to the TEC, §45.103; maintenance notes issued pursuant to the TEC, §45.108; and contracts issued pursuant to the TEC, §44.901.]~~

**Proposed Amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures
(First Reading and Filing Authorization)**

April 17, 2020

**COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND: ACTION
STATE BOARD OF EDUCATION: ACTION**

SUMMARY: This item presents for first reading and filing authorization proposed amendment to 19 Texas Administrative Code (TAC) Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures. The proposed amendment would reflect changes made by House Bill (HB) 1520, 86th Texas Legislature, 2019, that eliminated the requirement for out-of-state certified public accountancy (CPA) firms to be licensed in Texas.

STATUTORY AUTHORITY: Texas Education Code (TEC), §§7.102(c)(32), 44.001, 44.007, 44.008, and 44.010.

TEC, §7.102(c)(32), authorizes the State Board of Education (SBOE) to adopt rules concerning school district fiscal account audits and budgets.

TEC, §44.001, requires each school district to begin its fiscal year on July 1 or September 1 of each year, as determined by the board of trustees of the district.

TEC, §44.007, requires each school district to annually submit to Texas Education Agency (TEA) a report of its revenues and expenditures for the preceding fiscal year and authorizes the SBOE to prescribe the management, cost accounting, and financial information format to enable the board to monitor the funding process and determine educational system costs.

TEC, §44.008, authorizes the SBOE to establish the format and minimum requirements of the independent audit of school district fiscal accounts.

TEC, §44.010, requires the school district budgets, fiscal reports, and audit reports filed with TEA to be reviewed and analyzed by TEA to determine whether all legal requirements have been met and to collect fiscal data needed in preparing school fiscal reports for the governor and the legislature.

The full text of statutory citations can be found in the statutory authority section of this agenda.

EFFECTIVE DATE: The proposed effective date of the proposed amendment is August 31, 2020. Under TEC, §7.102(f), the SBOE must approve the rule action at second reading and final adoption by a vote of two-thirds of its members to specify an effective date earlier than the beginning of the 2021-2022 school year. The earlier effective date will align the rule with statutory changes in a timely manner.

PREVIOUS BOARD ACTION: The SBOE adopted §109.23 effective September 1, 1996. The SBOE adopted amendments to 19 TAC §109.23 effective October 13, 2002, and March 10, 2015. A discussion item regarding §109.23 was presented to the committee at its January 2020 meeting.

BACKGROUND INFORMATION AND JUSTIFICATION: HB 1520, 86th Texas Legislature, 2019, updated Texas Occupations Code, §901.461, to eliminate the requirement for out-of-state CPA firms to be licensed in Texas. The amended statute took effect September 1, 2019. The text of Texas Occupations Code, §901.461, is provided for reference as Attachment I.

The proposed amendment to §109.23 would reflect the changes to Texas Occupations Code, §901.461. Subsection (d)(1)(A) would be modified to allow an independent auditor hired by a school district to be associated with a CPA firm that has a current valid license issued by a state licensing agency from another state.

FISCAL IMPACT: TEA has determined that there are no additional costs to state or local government required to comply with the proposal.

LOCAL EMPLOYMENT IMPACT: The proposal has no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code, §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis specified in Texas Government Code, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: The proposal does not impose a cost on regulated persons, another state agency, a special district, or a local government and, therefore, is not subject to Texas Government Code, §2001.0045.

TAKINGS IMPACT ASSESSMENT: The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under Texas Government Code, §2007.043.

GOVERNMENT GROWTH IMPACT: TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. The proposed rulemaking would limit the effect of the rule by eliminating the requirement that out-of-state CPA firms must be licensed in Texas.

The proposed rulemaking would not create or eliminate a government program; would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require an increase or decrease in fees paid to the agency; would not create a new regulation; ; would not expand or repeal an existing regulation; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: The proposal would allow an independent auditor hired by a school district to be associated with a CPA firm that has a current valid license issued by a state licensing agency from another state. There is no anticipated economic cost to persons who are required to comply with the proposal.

DATA AND REPORTING IMPACT: The proposal would have no new data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: TEA has determined that the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: The public comment period on the proposal begins May 22, 2020, and ends June 26, 2020. The SBOE will take registered oral and written comments on the proposal at the

appropriate committee meeting in June-July 2020 in accordance with the SBOE board operating policies and procedures. A request for a public hearing on the proposal submitted under the Administrative Procedure Act must be received by the commissioner of education not more than 14 calendar days after notice of the proposal has been published in the *Texas Register* on May 22, 2020.

MOTION TO BE CONSIDERED: The State Board of Education:

Approve for first reading and filing authorization the proposed amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures.

Staff Members Responsible:

David Marx, Director, Financial Compliance

Attachment I: Texas Occupations Code, §901.461

Attachment II: Text of Proposed Amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures

ATTACHMENT I

Texas Occupations Code, Title 5, Regulation of Financial and Legal Services, Subtitle A, Financial Services, Chapter 901, Accountants, Subchapter J, Practice of Public Accountancy

§901.461. Practice by Certain Out-Of-State Firms.

- (a) A certified public accountancy firm that is not licensed in this state but is licensed in another state may practice in this state without a firm license or notice to the board if the firm's practice in this state is performed by an individual who holds a license under this chapter or who practices under a privilege under Section 901.462.
- (b) A firm described by Subsection (a) may exercise all the practice privileges of a firm license holder, except that the firm may perform the services described by Section 901.002(a)(1) for an entity with its home office in this state only if:
 - (1) the firm meets the ownership requirements of Sections 901.354(a) and (b);
 - (2) the firm complies with the board's peer review program under Section 901.159; and
 - (3) the services are performed by an individual who holds a license under this chapter or practices under a privilege under Section 901.462.
- (c) A firm practicing under a privilege under this section, as a condition of the privilege of practicing without a firm license:
 - (1) is subject to the personal and subject matter jurisdiction and disciplinary authority of the board;
 - (2) must comply with this chapter and board rules; and
 - (3) is considered to have appointed the regulatory agency of the state that issued the firm's license as the firm's agent on whom process may be served in any action or proceeding by the board against the firm.
- (d) A firm practicing under a privilege under this section shall promptly cease offering or rendering professional services in this state if the firm's license to practice as a certified public accountancy firm in the state in which the firm's primary place of business is no longer valid.

ATTACHMENT II
Text of Proposed Amendment to 19 TAC

Chapter 109. Budgeting, Accounting, and Auditing

Subchapter B. Texas Education Agency Audit Functions

§109.23. School District Independent Audits and Agreed-Upon Procedures.

- (a) A school district, governmental charter school, open-enrollment charter school, nonprofit service provider, county education district, or regional education service center must file with the Texas Education Agency (TEA) an annual financial and compliance report and, if applicable, a state compensatory agreed-upon procedures report. These reports must be audited by an independent auditor, and the audit must be reviewed by the TEA, including review of auditors' working papers, in accordance with the Financial Accountability System Resource Guide, as adopted by reference in §109.41 of this title (relating to Financial Accountability System Resource Guide).
- (b) The annual financial audit report and state compensatory agreed-upon procedures report are due 150 days after the end of the fiscal year.
- (c) Auditors from the TEA must review independent audit reports. The commissioner's designee must resolve audit findings.
- (d) The district or other educational entity must hire at its own expense an independent auditor to conduct an independent audit of its financial statements and provide an opinion on its annual financial and compliance report.
 - (1) The independent auditor must:
 - (A) be associated with a certified public accountancy (CPA) firm that has a current valid license issued by the Texas State Board of Public Accountancy or a state licensing agency from another state ;
 - (B) be a certified public accountant with a current valid license issued by the Texas State Board of Public Accountancy, as required under the Texas Education Code, §44.008; and
 - (C) adhere to the generally accepted auditing standards (GAAS), adopted by the American Institute of CPAs (AICPA), as amended, and the generally accepted government auditing standards (GAGAS), adopted by the US Government Accountability Office, as amended.
 - (2) The CPA firm must:
 - (A) be a member of the AICPA Governmental Audit Quality Center (GAQC);
 - (B) adhere to GAQC's membership requirements; and
 - (C) collectively have the knowledge, skills, and experience to be competent for the audit being conducted, including thorough knowledge of the government auditing requirements and:
 - (i) Texas public school district environment; ~~or~~
 - (ii) public sector; or
 - (iii) nonprofit sector.
- (e) If at any time the TEA division responsible for financial compliance reviews an audit firm's working papers and finds that the firm or the quality of the work does not meet the standards required as stated in subsection (d) of this section, the division may require the district or other educational entity to change its audit firm.
- (f) To the extent that this section conflicts with any other rule regarding audits of school districts and other educational entities by independent auditors and the TEA, this section controls.

Review of Permanent School Fund Securities Transactions and the Investment Portfolio

April 16, 2020

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND: DISCUSSION STATE BOARD OF EDUCATION: NO ACTION

SUMMARY: Investment staff will report on the transactions executed during the months of December 2019 and January and February 2020 in the investment portfolio of the Texas Permanent School Fund.

STATUTORY AUTHORITY: Texas Constitution, [Article VII, §2](#) and [§5](#), and 19 Texas Administrative Code (TAC) Chapter 33.

The Texas Constitution, Article VII, §2 and §5 establish the permanent school fund, the assets that comprise the permanent school fund, the bond guarantee program, the available school fund, and authorize the State Board of Education (SBOE) to manage and invest the permanent school fund in accordance with the prudent person standard.

Administrative rules found in 19 TAC Chapter 33 provide a statement of investment objectives, policies, and guidelines of the Texas Permanent School Fund and Bond Guarantee Program as adopted by the SBOE.

The full text of statutory citations can be found in the statutory authority section of this agenda.

FUTURE ACTION EXPECTED: This is a recurring report at every committee meeting.

BACKGROUND INFORMATION AND JUSTIFICATION: Specific actions that the committee must accomplish are found in 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund.

Staff Members Responsible:

Holland Timmins, Executive Administrator and Chief Investment Officer, Texas Permanent School Fund

**Ratification of the Purchases and Sales of the Investment Portfolio of the Permanent School Fund
for the Months of December 2019, January and February 2020**

April 17, 2020

**COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND: ACTION
STATE BOARD OF EDUCATION: CONSENT**

SUMMARY: This item provides an opportunity for the committee and board to consider approval of the purchases and sales of investments executed in the portfolio of the Permanent School Fund for the months of December 2019, January and February 2020.

STATUTORY AUTHORITY: Texas Constitution, [Article VII, §2](#) and [§5](#), and 19 Texas Administrative Code (TAC) Chapter 33.

The Texas Constitution, Article VII, §2 and §5 establish the permanent school fund, the assets that comprise the permanent school fund, the bond guarantee program, the available school fund, and authorize the State Board of Education (SBOE) to manage and invest the permanent school fund in accordance with the prudent person standard.

Administrative rules found in 19 TAC Chapter 33 provide a statement of investment objectives, policies, and guidelines of the Texas Permanent School Fund and Bond Guarantee Program as adopted by the SBOE.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: At the January 2020 meeting, the board approved purchases in the amount of \$756,881,353 and sales in the amount of \$783,201,264 conducted in the investment portfolio of the Permanent School Fund for the months of October through November 2019.

BACKGROUND INFORMATION AND JUSTIFICATION: The purchases and sales of the investment portfolio are reviewed by the staff to ensure compliance with the Investment Guidelines, Policies, and Objectives of the Permanent School Fund. The specific amounts of the purchases and sales for the reporting period will be recommended to the board for ratification upon approval by the Committee on School Finance/Permanent School Fund.

PUBLIC BENEFIT: The distribution of the Permanent School Fund will flow to the school districts and reduce the tax burden to the public and the state of Texas.

Staff Members Responsible:

Holland Timmins, Executive Administrator and Chief Investment Officer, Texas Permanent School Fund

**Report of the Permanent School Fund Executive Administrator and
Chief Investment Officer**

April 16, 2020

**COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND: DISCUSSION
STATE BOARD OF EDUCATION: NO ACTION**

SUMMARY: The Permanent School Fund (PSF) executive administrator will report to the committee on matters relating to the management of the Permanent School Fund and the Charter District Reserve Fund. The report may present information on historical and current status of Fund holdings, current and proposed investment policies and procedures, and historical and current Fund performance and compliance. The administrator may update the board on the bond guarantee program, the status of requests for proposal or for qualifications and current contracts for services and other administrative activities undertaken on behalf of the board. The administrator may provide an update on the PSF distribution or on the effect of legislation impacting the PSF. The administrator may provide an analysis of current and future investment market conditions, focusing upon the impact on the holdings of the PSF.

STATUTORY AUTHORITY: Texas Constitution, [Article VII, §2](#) and [§5](#), and 19 Texas Administrative Code (TAC) Chapter 33.

The Texas Constitution, Article VII, §2 and §5 establish the permanent school fund, the assets that comprise the permanent school fund, the bond guarantee program, the available school fund, and authorize the State Board of Education (SBOE) to manage and invest the permanent school fund in accordance with the prudent person standard.

Administrative rules found in 19 TAC Chapter 33 provide a statement of investment objectives, policies, and guidelines of the Texas Permanent School Fund and Bond Guarantee Program as adopted by the SBOE.

The full text of statutory citations can be found in the statutory authority section of this agenda.

FUTURE ACTION EXPECTED: None

BACKGROUND INFORMATION AND JUSTIFICATION: None

Staff Members Responsible:

Holland Timmins, Executive Administrator and Chief Investment Officer, Texas Permanent School Fund

COMMITTEE ON SCHOOL INITIATIVES

**Recommendation for Appointment to the
Fort Sam Houston Independent School District Board of Trustees**

April 17, 2020

**COMMITTEE ON SCHOOL INITIATIVES: ACTION
STATE BOARD OF EDUCATION: CONSENT**

SUMMARY: This item provides an opportunity for the board to consider an appointment to the board of trustees of the Fort Sam Houston Independent School District. The appointment is necessary due to the expiration of the term of office for a board member.

STATUTORY AUTHORITY: Texas Education Code (TEC), §11.352.

TEC, §11.352 authorizes the State Board of Education (SBOE) to appoint school board members in special purpose school districts.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: No previous board action has occurred on this item.

BACKGROUND INFORMATION AND JUSTIFICATION: The SBOE is statutorily authorized to appoint board members for military reservation independent school districts. Trustees so appointed shall hold office for two years and until their successors are appointed and qualified. Enlisted military personnel may be appointed to the board; however, a majority must be civilians, and all may be civilians. When a vacancy occurs on one of these boards, the base commander notifies the commissioner of education in compliance with TEC, §11.352. Vacancies are widely advertised through base newspapers, email and other electronic means. Interested individuals then submit resumes and other documents verifying that they are qualified to hold the position and would accept it if appointed.

The commanding officer appoints a nomination panel of at least three members who review the application packages, interview the candidates, and evaluate the candidates. The panel's recommendations are then forwarded to the commanding officer for consideration. The commanding officer is required by 19 TAC §61.2 to provide at least three nominations to the SBOE. The nominations may or may not be ranked in order of preference. All nominees must be qualified under the general school laws of Texas and live or be employed on the military reservation.

Colonel, United States Air Force, Samuel E. Fiol, Commander of the 502d Security Forces Group, has notified the commissioner of a vacancy that exists on the board of trustees of the Fort Sam Houston Independent School District due to the expiration of the term of office. Colonel Fiol has provided three nominees for the vacancy and has recommended the appointment of Mr. Richard King III to fill the position.

PUBLIC BENEFIT AND COST TO PERSONS: Both the public and the students will benefit by having qualified individuals appointed to the board of trustees.

MOTION TO BE CONSIDERED: The State Board of Education:

Based on Colonel Samuel E. Fiol's recommendation, approve the appointment of Mr. Richard King III to serve a term of office, from April 17, 2020, through April 17, 2022, on the Fort Sam Houston Independent School District Board of Trustees.

Staff Member Responsible:

Jeff Cottrill, Deputy Commissioner of Governance and Accountability
Jason Hewitt, Associate Commissioner, Governance

Attachment: Correspondence including biographical information and supporting materials for each nominee



**DEPARTMENT OF THE AIR FORCE
502D AIR BASE WING
JOINT BASE SAN ANTONIO**



MEMORANDUM FOR MR. MIKE MORATH, COMMISSIONER, TEXAS EDUCATION AGENCY
1701 North Congress Avenue
Austin TX 78701

FROM: 502 FSG/CC
2330 Stanley Road, Suite A
JBSA Ft Sam Houston TX 78234-2362

SUBJECT: The Appointment of Mr. Richard King III to the Fort Sam Houston Independent School District (FSHISD) Board of Trustees

1. I respectfully request appointment for Mr. Richard King III to the FSHISD Board of Trustees. Enclosed are the resumes for the position one nominee and the alternatives as required by Texas Administrative Code Section 61.2a (1). Additionally, signed statements expressing their willingness to accept the appointment and serve in full adherence to the established state standards for school board members.

2. The names of the nominees are listed below and are ranked in order of preference.

1. Mr. Richard Kling III
2. Ms. Angela Johnson
3. Ms. Nikeisha Johnson

3. All nominees are qualified under the general school laws of Texas and they either live or work on Joint Base San Antonio-Fort Sam Houston. Each nominee is well qualified and the appointments of any one of them would be in full compliance with the provisions of the Texas Education code 11.352. Every avenue was used to reach the widest possible applicant pool. The membership composition of the board of trustees is in compliance with the provisions of Texas Code 11.28.

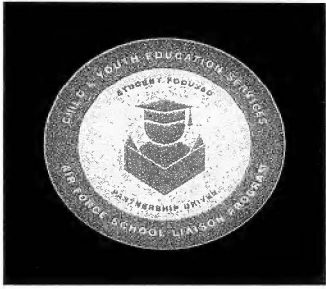
4. I recognize the power of the Board of Trustees to govern and manage the operations of the FSHISD and recognize that my role as the commanding officer of 502d Force Support Group is limited only to the duty defined by the statute in the process for appointing the Board of Trustees.

5. Thank you for your support of our school district. If you have any questions please contact, Ms. Nita Ford-Hightower at (210) 221-2214/2256 or nita.fordhightower.1@us.af.mil.

SAMUEL E. FIOL, Colonel, USA
Commander, 502d Force Support Group

3 Attachments:

1. Richard Kling III
2. Angela Johnson
3. Nikeisha Johnson



Joint Base San Antonio Statement of Eligibility

Applicant Full Name: Richard G. Kling III

Residential Address: 2748 Worth Rd.

Fort Sam Houston TX 78234

Physical Address of Employer:

2748 Worth Rd.

Fort Sam Houston TX 78234

Board of Trustees Location Applying For: FSHISD

I hereby make a formal application for the above indicated Board of Trustees. In doing so, I confirm that:

- I am qualified under the general school laws of Texas and live or am employed on JBSA.
- I attest the contents of my resume.
- I am a qualified voter.
- I willingly accept the appointment to the Board of Trustees and will serve in this capacity with full adherence to the state established standards on the duties and responsibilities of school board members.

KLING.RICHARD.GOR
DON.III.1018607197

Digitally signed by
KLING.RICHARD.GORDON.III.1018607197
Date: 2019.12.11 09:04:46 -06'00'

Signature of Applicant

Richard G. Kling III

Printed Name of Applicant

12/11/2019

Date

Digital Signatures are authorized. If using a wet signature, please sign, date and print legibly. Form must be completed prior to setting up your interview with the selection board.

10909 Forest Breeze
Live Oak, TX 78233

December 4, 2019

Fort Sam Houston Independent School District (FSHISD) School Board Members

Dear Board of Trustees,

Each child, no matter their age, culture, religion, background or gender, have their own unique function and ability in society. Their distinct characteristics that when identified and managed correctly offer societal contributions that will help shape the future of the fast paced world we live and function in. It's because of this that I believe our children are our most precious resource. It's our responsibility as parents, teachers and mentors to extract these great qualities our children possess to help mold and shape them to become thriving and successful young citizens. Quality education is one of the most influential avenues to drive their success however, that takes hard work, dedication, volunteer time and financial resources. It takes a trusted, dedicated team to advocate for these resources to ensure our children receive high quality education to maximize their potential as well as to navigate life's challenges and successes. I would like the opportunity to be a FSHISD Board of Trustees member to add value, professionalism and growth to an already prosperous team that has made FSHISD a desirable district for our military dependents and staff.

Having been shaped and groomed for an accomplished military career lasting just over 25 years, and now a federal government employee, I have an expanded and culturally diverse wealth of knowledge and experience within the U.S. and abroad in countries including Germany, Poland, Italy, Norway and Slovenia. Now that I have served our country's mission for freedom, I would love the chance to serve our school districts goals to provide and cultivate a higher education culture while promoting healthy living and thriving communities.

I have been formally trained and have managed and experienced a myriad of successful assignments and programs that include an Army Instructor Certification encompassing Emergency Medical Technician training, driver's education, digital training management and initial entry soldier skills in both small and large group settings encompassing over 100 personnel at any given time. I have served in leadership positions early on in my career since 1999 and have spearheaded executive level training and programs within the U.S. Army comprised of Safety and Occupational Health, Emergency Medical Treatment, Joint Healthcare Management and Equal Opportunity.

My experience has allowed me continuance to work well in a fast paced environment and enjoy creative problem solving and resolve varying issues with a high degree of professionalism. Solid communication skills and strong leadership support my work both individually and in a team setting. I am confident that my skills and previous experience will be an asset to the Fort Sam Houston Independent School District and I look forward to hearing from you to further discuss my qualifications. I can be reached by phone (703) 399-5916 or email (richard.kling6@gmail.com) at your earliest convenience. Thank you for your time and consideration.

Sincerely,

Richard Kling

RICHARD G. KLING III

10909 Forest Breeze, San Antonio, TX 78233

(703) 399-5916

Richard.kling6@gmail.com

www.linkedin.com/in/richard-klings

PROFESSIONAL SUMMARY

Multi-disciplined Military Veteran with **Active Secret Security Clearance**, over 25 years of proven experience in the **United States Army**. Accomplished measurable results while leading teams ranging from 12 to over 100 personnel in dynamic, fast-paced environments at any given time throughout an accomplished military career. Currently a **DA Civilian** in support of the **Army Surgeon General** as a resourceful Protocol Specialist adept at fostering productive national and international relationships between U.S. Army Executive Officers, civilians and foreign military delegates. Meticulous experience with planning, coordinating, directing, training and executing high level events for up to 400 personnel. Specialized in managing and processing official representation funding (ORF) approvals in excess of \$280k per year in support of all Army medical regions worldwide to support special functions and gift purchases at the executive level. Recipient of multiple awards for outstanding performance and professionalism. Career supported by a **Bachelor of Science in Health Science**, specialized training as **Billing Official, Government Purchase Card Holder, Certifying Official, Acquisition Ethics and Management of Internal Controls Program Manager**. Areas of expertise include:

- Healthcare Administration
- Policy Implementation
- Public Speaking
- Training & Development
- Communication/Organization
- Inventory Control
- ORF Budget Execution
- Data Analysis
- Microsoft Office Suite

PROFESSIONAL EXPERIENCE

Protocol Specialist **2018-Present**
Office of the Surgeon General and U.S. Army Medical Command, Fort Sam Houston, Texas

Advises the Executive Services Director and Protocol Chief regarding protocol matters in support of the Surgeon General and Commanding General of the U.S. Army Medical Command (MEDCOM), Deputy Commanding General (Operations) and Deputy Chief of Staff on matters pertaining to Protocol to assure proper operation for functions involving military and civilian visitors from the White House, Congress, Department of Defense (DoD), Department of the Army (DA), government, foreign dignitaries, contractors and private industry.

- Planned and executed flag setup, seating, meal arrangements and entertainment for over 12 high level events including visits by Civilian Aides to the Secretary of the Army (CASA's) and General Officers consisting of more than 1,100 DoD, DA, Congressional members and foreign personnel in direct support of the Surgeon General.
- Developed and created multiple itineraries, agenda's, event programs and biographies for 16 MEDCOM leader development programs, Congressional Visits, Changes of Command, foreign dignitary visits and promotion/retirement ceremonies.
- Provided protocol knowledge, etiquette rules and support in executing flag setup, seating arrangements and event registration at the 2018 Fort Sam Houston 243rd Army Birthday Ball with over 700 guests.

Assistant Deputy Director **2014 – 2017**
Office of the Surgeon General and U.S. Army Medical Command, Fort Sam Houston, Texas

Supervisor and Senior Advisor to the Army Surgeon General and General Officers/Senior Executive Service personnel on protocol, Executive Medicine, Official Representation Funds (ORF) and executive level daily operations.

10909 Forest Breeze
Live Oak, TX 78233

December 4, 2019

Fort Sam Houston Independent School District (FSHISD) School Board Members

Dear Board of Trustees,

Each child, no matter their age, culture, religion, background or gender, have their own unique function and ability in society. Their distinct characteristics that when identified and managed correctly offer societal contributions that will help shape the future of the fast paced world we live and function in. It's because of this that I believe our children are our most precious resource. It's our responsibility as parents, teachers and mentors to extract these great qualities our children possess to help mold and shape them to become thriving and successful young citizens. Quality education is one of the most influential avenues to drive their success however, that takes hard work, dedication, volunteer time and financial resources. It takes a trusted, dedicated team to advocate for these resources to ensure our children receive high quality education to maximize their potential as well as to navigate life's challenges and successes. I would like the opportunity to be a FSHISD Board of Trustees member to add value, professionalism and growth to an already prosperous team that has made FSHISD a desirable district for our military dependents and staff.

Having been shaped and groomed for an accomplished military career lasting just over 25 years, and now a federal government employee, I have an expanded and culturally diverse wealth of knowledge and experience within the U.S. and abroad in countries including Germany, Poland, Italy, Norway and Slovenia. Now that I have served our country's mission for freedom, I would love the chance to serve our school districts goals to provide and cultivate a higher education culture while promoting healthy living and thriving communities.

I have been formally trained and have managed and experienced a myriad of successful assignments and programs that include an Army Instructor Certification encompassing Emergency Medical Technician training, driver's education, digital training management and initial entry soldier skills in both small and large group settings encompassing over 100 personnel at any given time. I have served in leadership positions early on in my career since 1999 and have spearheaded executive level training and programs within the U.S. Army comprised of Safety and Occupational Health, Emergency Medical Treatment, Joint Healthcare Management and Equal Opportunity.

My experience has allowed me continuance to work well in a fast paced environment and enjoy creative problem solving and resolve varying issues with a high degree of professionalism. Solid communication skills and strong leadership support my work both individually and in a team setting. I am confident that my skills and previous experience will be an asset to the Fort Sam Houston Independent School District and I look forward to hearing from you to further discuss my qualifications. I can be reached by phone (703) 399-5916 or email (richard.kling6@gmail.com) at your earliest convenience. Thank you for your time and consideration.

Sincerely,

Richard Kling

- Supervised and responsible for the welfare and training of twelve Department of the Army civilians and one field grade officer
- Executed accountability, obligation and disbursement of the Medical Commands \$280K official representation funds encompassing all regions worldwide.
- Improved ORF and gift inventory processes for efficiency; maintained 100% accountability of \$8K worth of gift items for distinguished visitor presentations.

Deputy Director

2013-2014

Fort Belvoir Community Hospital, Fort Belvoir, Virginia

Provided senior administrative expertise to the Director of Education, Research and Training and Department Directors on command doctrine, leader development, organization and material issues and operational readiness.

- Cultivated a Hospital Education Directorate consisting of four departments with 50 Army, Navy, DA Civilians and Contractors providing health education and services to over 3,600 employees.
- Spearheaded enforcement of Joint Training Record compliance coordinating use of comprehensive tracking tools and training over 98 department training officers.
- Implemented a "Leadership Academy" reinforcing a "Culture of Excellence" & developing conflict resolution/counseling skills to over 400 military and civilian staff.
- Improved the healthcare training program increasing efficiency and sustainability of 191 personnel within 10 months leveraging healthcare resources in the National Capital Region and Department of Defense.

Senior Personnel and Operations Manager

2012-2013

421st Multifunctional Medical Battalion, Baumholder, Germany

Senior level staff manager for a Medical Battalion in Europe. Served as senior enlisted advisor to the commander on all organization matters; responsible for unit leader development programs, standards and policies.

- Fostered command climate, morale, good order, and discipline; responsible for the health, welfare, training, and safety of 87 Soldiers and their Families.
- Supervised the maintenance and accountability of property valued in excess of \$2.5M; supported an active Family Readiness Group.
- Planned, coordinated and supervised movement of unit personnel, equipment and vehicles during unit relocation 150 miles away; incorporated safety loss reports and safety briefs during daily operations & training.
- Oversaw design, construction and implementation of the first medical simulation training platform within the unit. U.S. units across Germany including multinational forces sought out use of this training to develop and hone their medical skills.

Personnel and Operations Manager

2010-2012

557th Area Support Medical Company, Wiesbaden, Germany

Personnel manager for an Area Medical Company in United States Army Europe with the mission of providing Level IV Army Health System support in support of Full Spectrum Operations in a Joint and Combined Environment

- Encouraged command climate, morale, good order, and discipline; responsible for the health, welfare, training, and safety of 82 Soldiers and their Families.
- Managed the operational readiness of more than 60 LINs and CTA items of government property valued in excess of \$7M. Oversaw the company supply team's effort to turn in more than 190 excess property items
- Conducted movement and field operations of the company responsible for subordinates treating 73 patients and conducting 30 real world labs, x-rays, and dental exams.

Senior Instructor and Training Development Supervisor
Echo Company, 232nd Medical Battalion, Fort Sam Houston, Texas

2008-2010

Oversaw the training, discipline, health, and welfare of approximately 1.5K personnel for three 16 week training cycles annually; supervised and responsible for leader development and training;

- Supervised counseling, logistics, administrative support, building maintenance, and upkeep of facilities and equipment valued at \$1.5 million.
- Received a superior rating for the company's Equal Opportunity program during a formal inspection.
- Maintained 100% accountability of all assigned equipment valued at over \$1.5 million; set the standard among peers.
- Invested numerous personal hours to ensure personnel were focused on academics; department won the weekly high GPA recognition nine times.

Healthcare Manager

2006-2007

Task Force Odin, Containment Operations Base Speicher, Tikrit, Iraq

Established, managed, and maintained an Echelon I aid station and aviation medicine clinic that provided comprehensive primary, emergency, and aviation medicine support for its military and civilian members. Supervised a medical team consisting of one medical team leader and two combat medics.

- Maintained 100% accountability of all assigned personnel and equipment valued in excess of \$468K while in support of hostile overseas operations.
- Created and implemented a new medical operations policy for a counter IED Task Force which is the first of its kind in the Department of Defense and in the Army
- Identified a shortage of assigned medical personnel and conducted six Combat Lifesaver Courses resulting in qualification of over 50 Combat Lifesavers as health force multipliers.
- Established innovative tracking systems which enabled his medical team to meet its challenging and overwhelming task load with mastery and unrivaled success.

EDUCATION

Bachelor of Science in Health Science (Honors: Magna Cum Laude, GPA 3.66), Trident University, Cypress, CA;

Graduation Date, Jan-2019

Joint Medical Executive Skills (Military Health System Leader)

Army Command Level Course

Army Senior Leader Course

CERTIFICATIONS

National Registry of Emergency Medical Technicians

Government Purchase Card

Billing Official

Lean Six Sigma Orientation

DISTINGUISHED AWARDS

Dean's List- Nov 2018-Jan 2019

Defense Meritorious Service Award

Meritorious Service Award (2)

Humanitarian Service Award (2)

Honorary Member of the AMEDD Regiment

REFERENCE LIST

1. Nancy Popejoy
U.S. Army Office of the Surgeon General
Executive Services Director
Nancy.j.popejoy.civ@mail.mil
(703) 839-2756
2. Dr. Gloria Hajat
Department of Defense Education Activity (Europe)
RAF Lakenheath Middle School Principal
Gloria.m.hajat.civ@mail.mil
(+44) 7884-581467
3. Greg Canty
Defense Health Agency
Executive Services Director
gregory.l.canty.civ@mail.mil
(703) 681-6478
4. Lieutenant General (Ret) Patricia Horoho
Former Army Surgeon General
armysg43@gmail.com
(703) 231-8418
5. Command Sergeant Major (Ret) Donna Brock
Executive Coach at LWM III Consulting
Former U.S. Army Medical Command, Command Sergeant Major
donna.brock51@gmail.com
(254) 289-9650



Joint Base San Antonio Statement of Eligibility

Applicant Full Name: ANGELA Marie Johnson

Residential Address: 25675 Overlook Parkway
#1306
San Antonio, TX 78260

Physical Address of Employer:
2405 Gun Shed Road
Bldg 2261
JBSA, TX 78234

Board of Trustees Location Applying For: Member

I hereby make a formal application for the above indicated Board of Trustees. In doing so, I confirm that:

- I am qualified under the general school laws of Texas and live or am employed on JBSA.
- I attest the contents of my resume.
- I am a qualified voter.
- I willingly accept the appointment to the Board of Trustees and will serve in this capacity with full adherence to the state established standards on the duties and responsibilities of school board members.

Angela M. Johnson
Signature of Applicant

1/6/2020
Date

ANGELA M Johnson
Printed Name of Applicant

Digital Signatures are authorized. If using a wet signature, please sign, date and print legibly. Form must be completed prior to setting up your interview with the selection board.

Angela Marie Johnson
25675 Overlook Parkway. #1306. San Antonio, TX 78260
Evening Phone: 830-714-9193 Day Phone: 210-466-0801 Cell: 520-249-0517
Email: angela.marie.johnson@us.army.mil

Outstanding leadership, organizational, and interpersonal skills with over 29 years of Federal Service. Extensive experience as a supervisor (United States civilians and foreign nationals), in Army budget/manpower principles and methodologies, human resources, logistics, conflict resolution, program analysis and evaluation, mobilization/demobilization, and installation management. Superior work experience across all echelons of the Installation Management Command (garrison, region/ directorate, and headquarters). Effective oral/written communicator, lateral and vertical, internal/external to organization. Expert/super user of all Microsoft Office products. Ultimate team member, promotes esprit de corps. Have a thorough understanding of the various organizational structures and hierarchy of the Department of Defense (all services), NATO, and USDA. Hold a Secret Security Clearance: NACLIC, 26 Feb 2014. Support and practice of the Army values and uncompromised work ethic, along with my energetic enthusiasm for any assignment makes me a valuable asset to any organization or position for which I am selected.

WORK EXPERIENCE:

Management Analyst, GS-034-13, IMCOM

Aug 17 – present
210-466-0225

Supervisor: Duane Tucker, duane.p.tucker.civ@mail.mil

- **Lead branch in absence of supervisor.**
- **Action Officer/Integrator for the All Things Enterprise Framework:** All Things Force Projection, Europe, Pacific, Middle East/Africa, and Global Posture; Army Campaign Plan 19+; the IMCOM Campaign Plan, the Command Team Executive Board, the Strategic Support Area Forum, and the MSC Quarterly Update.
- Coordinate all IMCOM G-Staffs to support the HQDA All Things efforts, resulting in command visibility of activities, requirements, and resources required to support enduring and emerging missions.
- **Building Coalitions:** Build and maintain collaborative relationships across all echelons, from the Garrisons to the HQDA Staff and other Army Commands, Direct Reporting Units (DRU), and Army Service Component Commands (ASCC). Establish relationships of trust across the Department of Defense enterprise.
- **Results Driven:** Branch Manpower Subject Matter Expert and technical authority for requirements determination, G-3/5/7 Services (900/901) metrics validation, and documentation of MOB TDAs. Assist with manpower/resourcing justifications resulting in critical requirements resourced and documented.
- **Business Acumen:** Develop proactive solutions to emerging requirements, identify capability and capacity gaps for decisions of resourcing strategies and facility investment strategies.
- Back up analyst for Mobilization and Readiness and All Things Cyber. Alternate Mobilization Liaison to Camp Atterbury, IN.
- **Member of the IMCOM Planning Support Team, Where to Grow In Europe.** Assess and validate ID-Europe's funding and manpower requirements based on the troop growth in the Europe footprint. Expert analysis resulted in 118 additional authorizations documented on the Europe garrisons' TDAs. Proficient in RPLANS, completed facility capacity and space utilization analysis.
- **Member of the IMCOM Army Soldier and Family Housing crisis action team (CAT).** Coordinate information in a fast moving, highly charged environment. Responsible for data analysis and generating the daily Common Operating Picture (COP) for submission to the Army Material Command. Track the progress of work orders submitted/completed for Residential Community Initiative Housing, Army Owned/Leased Housing, and Barracks. Capture and report trends of the top issues of work orders. Maintain a professional, energetic, and engaged attitude while handling a highly emotional and visible problem.
- Consistently maintain 360° operational and strategic awareness to facilitate IMCOM's support of operational and tactical planning globally.
- Operate in both classified and unclassified environments.
- Create an atmosphere of esprit de corps, driving force of all teambuilding activities.

Management Analyst, GS-0343-13, Installation Management Command

Sep 14 – Aug 17
210-466-0835

Supervisor: Keith Dyer, keith.n.dye.civ@mail.mil

Scope: Responsible for manpower requirements determination; allocations, and documentation; civilian strength reporting; work-year management; and civilian pay execution/affordability.

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- Reviewed and analyzed division submissions to the Command Plan ensuring compliance with established manpower and budgetary guidelines. Expert on WEBTAADS, IMCOM On-Line review, and Command Plan TDA Documentation, ensured balance and affordability between program requirements and resource allocations, as a result critical shortfalls identified. Performed review and analysis of data contained in the Program Optimization and Budget Evaluation (PROBE) database for senior leader decisions.
- Expert for concept plan submissions, manpower staffing models and templates, and workforce mix reporting.
- Proficient in oral and written communication, horizontal and vertical.
- Interpreted HQDA and IMCOM guidance on both manpower and budget regulations, priorities, and initiatives.
- **Results Driven:** Facilitated a team of IMCOM garrison Resource Managers and Manpower Chiefs to redesign Service 118, Manpower and Force Management, resulted in an enterprise model for application and implementation. Set the bar with the development of model. The model was approved by IMCOM Senior Leaders.
- **Detail assignment to IMCOM G-3/5/7, (Force Integration, Force Management, and Business Integration Division) (February 2016 to August 2017); Supervisor: Lisa Cramer, 210-466-0233. Knowledge of and assigned projects:** Joint Basing initiatives, stationing packages and actions, Cyber Installation Support Summit, Army Communities of Excellence, Rehearsal of Concept (ROC) Drills, Integrated Senior Leader Forums, CLS/ISR Communities of Practice. Member of the ACOE site visit team to an award winning garrison. **Lead Action Officer/Integrator for the All Things Enterprise Framework:** All Things Europe, Pacific, and Middle East/Africa. Coordinated all IMCOM G-Staffs to support the All Things efforts. Resulted in HQ IMCOM principles informed of activities, requirements, and resources required to support enduring and emerging missions. Represented command in all classified and unclassified VTC OPT/CoC/GOSCs. Established relationships across the Department of Army. Conducted briefings to HQDA Senior Leaders. Fully supported the Army Strategic Readiness Plan, the Army Campaign Plan, and the Army Total Force Policy.

Supervisory Management Analyst, GS-0343-14, IMCOM – Europe Region
Supervisor: Cynthia Arnold, cynthia.r.arnold.civ@mail.mil

Oct 09 – Sep 14
706-787-7888

Scope: Chief, Manpower and Force Analysis Branch, responsible for the manpower management (personnel/equipment Tables of Distribution and Allowances (TDA)) for nine Region TDAs including six small sites and submission of the annual Command Plan. Expert on requirements determination and manpower models for IMCOM services. Exercised full supervisory functions over Department of the Army civilian and foreign national employees. Directed all work assignments, developed employee standards and evaluated all employees. Adhered to and supported all Equal Opportunity Employment (EEO) practices and initiatives; facilitated the Managers Internal Control Program (MICP); Interpreted HQDA policy guidance; developed region guidance, performed program evaluations; provided technical assistance of annual manpower budget estimate submission; and documented efficiency improvements. Supported the IMCOM Strategic Plan, integrated organizational mission, vision, and values into the team's work plans. Fully knowledgeable of the Department of Defense, Department of the Army, IMCOM, and garrison organizational structures.

- Technical expert, advisor and liaison to the functional program managers, garrisons, and higher headquarters on all matters relating to manpower management. Recommended to senior leaders the proper distribution/allocation of manpower authorizations across the garrisons based on mission requirements, planning costs analysis, and manpower modeling/studies/surveys. Resulting in the operational success of installation programs and activities.
- Experienced advisor, provided support to ensure manpower requirements supported various garrison programs/functions: law enforcement, fire and emergency services, environmental, family and community activities, housing management, financial management, and contracting.
- Issued annual manpower guidance in accordance with HQDA guidance and HQ IMCOM guidance.
- Conducted quarterly trend analysis and evaluations of manpower actions. Improved management and administrative issues, including monitoring, documenting, and resolving issues pertaining to civilian end-strength. Monitored the manpower reduction glide path, ensured garrison percentage of reductions were in concert with troop reductions across the European theater.
- Reconciled IOL data and reported to higher headquarters the monthly on board strength. Ensured leadership had the most accurate data on military and civilian on board strength numbers.

Angela Marie Johnson

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- Expert on POM years and year of execution for manpower and budget. Submitted Schedules 8 to properly document MDEP reductions/rebalance and reprogramming actions to accurately reflect Garrison execution of manpower resources resulting in ~ 95% of Schedules 8 being approved providing manpower to support critical efforts.
- Proficient in the requirements determination process; validated staffing model data.
- Maintained continuous liaison with IMCOM, HQDA, Army Commands, and other staff elements on all manpower management issues including application of manpower staffing standards/models and functional assessments.
- Managed and directed the synchronization of Contractor Manyear Equivalents (CME) resources within established budget obligations and program execution against authorized manpower resources. Resulting accurate workforce shaping, cost and capability analysis, and the correct manpower mix.
- Visionary and innovative, competently communicated, implemented, and executed transformation initiatives; agent of change. Effective strategic thinker.
- **Results Driven:** Advisor to the Region Director on sound stewardship of limited resources, garnered operational and cost efficiencies, and implemented HQIMCOM and HQUSAREUR transformation initiatives. Advised and defended manpower budget estimate submissions IAW Europe Region transformation resulting 235 sites reduced to 123 sites; workforce of 10,517 down to 5,830; annual operating budget of \$2.37B down to \$1.3B.
- Expert for Garrison management and base operations manpower for: G1 (human resources), G2 (security), G3 (operations), G4 (public works), G5 (plans), G6 (information technology), G7 (training), and G9 (family, morale, welfare, and recreation).
- **Building Coalitions:** Sought best practices internal and external to the organization and applied throughout IMCOM. Built relationships of trust and confidence through open communication with all customers and stakeholders, internal and external. Provided expert manpower and budget input to Memorandums of Agreement/Understanding resulting in major mission transfers to other commands. Established and maintained relationships with USAREUR, NATO, EUCOM, and AFRICOM.
- **Business Acumen:** Developed proactive solutions to emerging requirements, identified capability gaps by CLS resulting in effective short term solutions until resources were properly realigned, mitigating risks. Identified, determined, and implemented plans required to accomplish both short and long range manpower and resource management goals. Focused on both current year and future years.
- Representative on various working groups/action teams (cross-functional/cross-command), lead change, ensured the end state vision/mission was accurately captured in the program budget guidance. Executive Agent to the Regional Director for the Cost Savings Task Force and business process improvements; coordinated innovative ways to implement savings/efficiencies across the region resulting in a Region wide policy being developed and implemented for shutting down non-essential peripherals (monitors, printers, and scanners); saving ~\$60K/year.
- Representative on Europe transformation. Performed a wide range of TDA manpower management analysis related to development and implementation of TDA force structure changes in Europe. Lead studies, reviews, evaluations, and assessments of issues and proposals ISO force structure decisions; determined the functionality of unique organizational structures and provided necessary and appropriate coordination among key stakeholders for the long range planning and development of organizational strategies to meet objectives and align with the IMCOM mission.
- Provided advice and made recommendations ISO DA Implementation of OMA-Funded Civilian Reductions initiatives, worked closely with the Stationing Team ensuring manpower rules are adhered to, resolved conflicts and negotiated for desired results, which resulted in critical manpower shortfalls and capability gaps identified.
- Managed the development and utilization of policies/orders that provided leadership with relevant, precise information to make decisions affecting the civilian end-strength utilization strategic plan. Framed written guidance and formal responses relative to new mission requirements and program redirections.
- Primary briefer to incoming Garrison Commanders and Command Sergeants Major on garrison manpower resources. Responsible for briefing all levels of leadership, ensuring the Europe Region initiatives are in compliance with higher headquarters, HQDA, and DoD initiatives, strategies, business and financial practices.
- **Leading People:** Supervised both United States and Host Nation employees. Developed performance standards and managed (plans, directs, coordinates) work assignments. Developed specific programs and established methods and procedures which will best accomplish planned objectives. Developed

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and implemented strategies to accomplish long-range goals. Apply the coach, teach, and mentor methodology for employee development. Recommended disciplinary actions. Team supports the IMCOM mission, vision, and goals.

- **Leading Change:** Influenced Region wide thinking and created a paradigm shift with regards to manpower/force structure, requirements determination, and the modeling process. Colleagues accept and appreciate the Force Structure POM process, adhering to timelines at the Region, HQS and DA levels.
- Career Program Manager for CP 26.
- Maintained 360° operational and strategic awareness to facilitate IMCOM's support of operational and tactical planning globally.

Management Analyst, GS-0343-13, IMCOM – Europe Region
Supervisor: Tekeyiah Richardson, tekeyiah.m.richardson.civ@mail.mil

Oct 07 – Oct 09
256-450-7385

Scope: Lead management analyst for manpower requirements determination; allocations; civilian strength reporting; work-year management; and civilian pay execution/affordability.

- Acting Manpower Chief in the absence of the Manpower Chief, establishing, planning, scheduling, directing, and coordinating the work and priorities of the staff.
- Reviewed and analyzed garrison submissions to the Command Plan ensuring compliance with established manpower and budgetary guidelines resulting in 90% of submitted Schedules 8 approved by HQDA, G3.
- Expert on WEBTAADS, IMA On-Line review, and Command Plan TDA Documentation, ensuring balance and affordability between program requirements and resource allocations, resulting in manpower critical shortfalls being identified.
- Reviewed Garrison Spend plans and defend to higher headquarters.
- Performed reporting and analysis of data contained in the Program Optimization and Budget Evaluation (PROBE) database to senior management and garrisons, resulting in the most accurate Garrison approved TDAs.
- Expert for Concept plan submissions, Year of Manpower (YOM) staffing models and templates, and Contractor Man-year Reporting. Representative for Army Transformation, Common Levels of Support (CLS) Implementation, Standard Garrison Organization (SGO) Implementation and Documentation, and Army Stationing and Installation Plan (ASIP) data validation.
- Lead for identifying requirements, performed statistical analysis (population/SIK), troop to task analysis (time and frequency of tasks).
- Proficient in both horizontal and vertical communication. Presented manpower briefings to branch chiefs, division chiefs, Chief of Staff, and IMCOM-Europe Region Director as well as other Army Commands and the HQDA Staff. Frequently communicated with higher headquarters advocating for and defending IMCOM-Europe manpower requirements.

Management Analyst, GS-0343-13, IMCOM – Northeast Region
Supervisor: Dr. Nieta Scott-Dunmore, nscottdunmore@yahoo.com

Oct 07 – Oct 09
804-721-3626

Scope: Lead analyst for annual command plan, manpower requirements determination; documentation; allocations; civilian strength reporting; work-year management; and civilian pay execution/affordability.

- Acting Manpower Chief in the absence of the Manpower Chief.
- Lead for the Defense Regional Inter/Intra-service Support (DRIS) Program. Support Agreements Manager (SAM). Reviewed MOU/A/ISSAs, ensured manpower and resourcing strategies were identified, recommended corrective actions as needed.
- Lead for civilian strength reporting, work-year management, and civilian pay execution, resulting in Garrisons adhering to established guidance and policy from HQ IMCOM.
- Lead analyst and team leader responsible for all equipment reviews a joint effort with the Logistics Directorate resulting in the proper alignment of equipment on the property book and the TDA; identified excess equipment for turn-in, and identified new equipment requirements.
- Lead analyst/action officer for concept plans, WEBTADS, IMA On-Line review, POM analysis, Total Army Analysis implementation, and MIL2CIV conversion analysis.

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- Expert on staffing models and templates. Representative on the Organization Inspection Program, CLS Implementation, Business Process Re-engineering of Manpower Management and Internal Review functions. Reviewed, analyzed, and validated Installation Status Reports (ISR), Service Based Costing (SBC), and performance metrics, made recommendations.
- Primary proponent responsible for coordinating all aspects of a post A-76, commercial activity reviews, and competitive sourcing activities. Responsible for the management of the Contractor Manpower Reporting Application (CMRA) and the Panel for Documenting Contractors (PDC) database. Ensured both the CMRA and PDC databases were synchronized.
- Representative on various teams: Continuation of Operations (COOP) Development Team, Emergency Operation Center Standard Operating Procedures Development Team, Emergency Operations Evacuation Team, and the Army Range Synchronization Integration Council (ARSIC). Member of the Workforce Development Council.

EDUCATION:

MBA, Public Administration, University of Phoenix, 2009
B.S., Business Management, University of Phoenix, 2004

TRAINING:

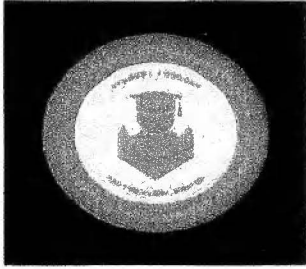
Alamo Federal Executive Board, Leadership FEB, 2019
Project Management Principles, Management Concepts, 2016
Army Communities of Excellence Examiner's Training, Baldrige, 2016
Continuing Education for Senior Leaders (CESL) Course, 40 hours, 2014
Civilian Education System, Advanced Course, 160 hours, 2011
IMCOM Europe Region Installation Support Team Training, 80 hours, 2009
IMCOM Europe Region SharePoint Training, 2007
Action Officer Development Course, 16 hours, 2006
Organizational Leadership for Executives, 80 hours, 2005
Resource Management and Budget Course, 80 hours, 2004
Combat Developments Course, 80 hours, 2004
PPBES, 80 hours, 2002
USA Finance School Manpower and Force Management Course, 80 hours, 2002
Management Analysis: Overview, 32 hours, 2001
Budget Formulation, 32 hours, 2001
Leadership, Education, and Development Course, 40 hours
EEO for Supervisors, 40 hours

AWARDS:

Civilian Service Commendation Medal, 2019
Civilian Service Achievement Medal, 2011
Performance award: 2011-2019

Volunteer Work:

2018 – 2019 – Alpha Tau Omega Chapter, Alpha Kappa Alpha Sorority, Inc., Treasurer
2016 – 2017 – Alpha Tau Omega Chapter, Alpha Kappa Sorority, Inc., Chairman, Connection Committee and Social Media Committee
2015 – Alpha Tau Omega Chapter, Alpha Kappa Sorority, Inc., Chairman, Connection Committee and Membership Committee
2013 - Mu Psi Omega Chapter, Alpha Kappa Alpha Sorority, Inc. Treasurer
2011 - Mu Psi Omega Chapter, Alpha Kappa Alpha Sorority, Inc. President
2009 -2013 - President of the Competitive Athletic Sports Europe Program
2009-2011 - Head Coach of the Heidelberg Generals Men's Basketball Team



Joint Base San Antonio Statement of Eligibility

Applicant Full Name: Nikeisha S. Johnson

Residential Address:
4 Southeast Rd
Universal City, Tx 78148

Physical Address of Employer:
470th MI BSE
4270 Gorgas Circle
San Antonio, Tx 78234
Board of Trustees Location Applying For:

I hereby make a formal application for the above indicated Board of Trustees. In doing so, I confirm that:

- I am qualified under the general school laws of Texas and live or am employed on JBSA.
- I attest the contents of my resume.
- I am a qualified voter.
- I willingly accept the appointment to the Board of Trustees and will serve in this capacity with full adherence to the state established standards on the duties and responsibilities of school board members.

Nikeisha S. Johnson
Signature of Applicant

11 Dec 2019
Date

Nikeisha Johnson
Printed Name of Applicant

Digital Signatures are authorized. If using a wet signature, please sign, date and print legibly. Form must be completed prior to setting up your interview with the selection board.

DR. NIKKI S. JOHNSON

Nsj1@yahoo.com | 915.504.3248

www.linkedin.com/in/nikki-s-johnson

*"Education is not preparation for life;
education is life itself."*

John Dewey

CLINICAL PSYCHOLOGIST

Educational Advocate | Mentor/Counselor | Social Change Agent

- Proven track record of exceptional results and solid performance in social service work settings, coupled with tremendous community service initiatives.
- Sought-after public speaker for numerous community events.
- Committed to fostering climates creating education opportunities, coordination of resources, and advocating mental/emotional healing.

Areas of expertise:

- | | | |
|--------------------------|------------------------|--------------------------|
| ▪ Counseling/Mentoring | ▪ Case Management | ▪ Humanitarian Support |
| ▪ Curriculum Development | ▪ Personnel Management | ▪ Community Service |
| ▪ Training Facilitation | ▪ Research/Analysis | ▪ Performance Management |

EDUCATION

Candidate, Post Doctorate Master's Psychopharmacology; Farleigh Dickerson University; Teaneck, NJ; projected graduation—2022

Doctorate of Clinical Psychology; Walden University; Baltimore, MD; 2019; 3.8 GPA

MA, General Psychology; Walden University; Baltimore, MD; 2016; 3.75 GPA

MS, Psychology; California Coast University; Santa Ana, California; 2014; 3.6 GPA

BS, Social Psychology; Park University; Parkville, MO; 2010; 3.5 GPA

BA, Business Administration; Bedford University; Denver, CO; 2006; 3.82 GPA

AA, Social Psychology; Park University; Parkville, MO; 2010; 3.73 GPA (WITH HONORS)

CAREER HIGHLIGHTS

Psychotherapy/Counseling

- Works with individuals and groups to promote optimum mental and emotional health.
- Makes psychotropic medication consultation to primary care physicians.
- Treatment Planning Team Member; participates in weekly conferences for the discussion of behavior, diagnosis and client progression.
- Conducts psychological testing, interpretation, and feedback for diagnosis.
- Maintains current list of resources, ensuring comprehensive services to clients and their families.

Mentoring

- Provides outreach workshops and lectures. Developed and implemented a 5-week curriculum designed to promote mental health education and bring awareness to parishioners of local churches.
- Donates up to 40 hours weekly towards supervising and mentoring career development of more than 10 teachers and staff members over a 5-year period.
- Youth Group Minister; coordinated weekly activities designed to provide spiritual guidance and explore future educational/employment goals for 15 "at-risk" teens.
- Mentored and assisted 30 soldiers in their weight loss efforts. Resulted in 93% compliance to military standards.

Training Facilitation. *Demonstrated ability to successfully facilitate diverse personalities, sizes and scopes.*

- Facilitated classroom/online instruction to an annual student load of 300 students. Created course curriculum and materials, maximizing student participation. Resulted in a 0% year-to-date failure rate.
- Conducted quarterly training sessions facilitating the career development and performance improvement of regional recruiters. Increased the number of processed recruits by 16%.
- Delivered spiritual support and coordinated professional counseling sessions for 5 soldiers who experienced miscarriages.
- **President, Officer Candidate School and WOFT Boards;** Presided over selection board and offers career development and life skill sessions with an average of 75 candidates annually.

Community Relations. *Champions causes to educate and support societal issues.*

- Initiated school partnership with external agencies to promote physical fitness activities in a newly chartered school.
- **Upward Bound Program Coach;** oversaw weekly activities and events that involve the contribution of over 7 individuals engaged in coaching and mentoring over 380 children aged 5 – 13 years.
- **Received Volunteer Award** for donating over 20 hours monthly towards mentoring GED candidates and providing humanitarian support to 18 prior military indigents.
- **Beneficiary Counseling and Assistance Coordinator;**
 - ✓ Provided counseling sessions that aided in the resolution of 96% of assigned “at-risk” marital/individual cases within 2 years.
 - ✓ Coordinated critical administrative assistance for a terminally ill soldier; reduced stress associated with dying spouse through various forms of casualty assistance.

CAREER PATH

Post Doctoral Fellow; Christopher and Associates Evaluation and Treatment Center; Seymour, IN 2019 – present
Provides mental health treatment services including assessment, program design, monitoring and supervision to adults, children and adolescents experiencing social, emotional, behavioral and psychiatric problems. Conducts counseling, therapeutic intervention, and case management to client population in accordance with all established guidelines as set by the State Board of Examiners.

- Performed clinical and consultative services for people of all ages and include: Intake Assessments, Individual Psychotherapy, Child and Adolescent, Family Therapy, Group Psychotherapy. Also performed a broad range of assessment services which included but not limited to tests of cognitive capacity/processing, academic achievement, and personality for use with clients from pre-school age through adulthood.
- Provided therapy and testing services in the school setting. Collaborated with parents, teachers, and administrators to provide effective, high quality services for students. Addressed psychological difficulties such as developmental disorders, anxiety, depression, behavioral disorders, attention deficit hyperactivity disorder, and trauma related issues through a wide range of psychological tests which included: Wechsler Intelligence Test for Children-5 (WISC), Wechsler Adult Intelligence Scale (WAIS), Projective Drawings, Mental Status Exam, Continuous Performance Test III (CPT), Conner’s Continuous Auditory Test Attention (CATA) Thematic Apperception Test (TAT), Rorschach Inkblot Test, Berry VMI, Comprehensive Test of Phonological Processing (C-TOPP), Minnesota Multiphasic Personality Inventory (MMPI), Adaptive Behavior Assessment System Third Edition (ABAS-3), Conners 3rd Edition, Millon Clinical Multiaxial Inventory (MCMI-IV).

Intern; Great Lakes Institute for Neuro-Psychology; Greenwood, IN 2018 – 2019

- Contributes 50-60 hours weekly towards providing psychological and neuropsychological assessment/diagnostic services to hospitals, nursing homes and assisted living facilities. Conducts psychological testing /assessments, psycho-diagnostic/personality testing, intelligence/achievement testing, and testing for learning difficulties.

- Conduct psychological testing and assessment, psycho-diagnostic and personality testing, intelligence and achievement testing, and testing for learning difficulties. Provide individual psychotherapy for all ages with various problems in a variety of areas, including children and adolescents, couples and family therapy, trauma disorders, and women’s issues.

Practicum; Fort Benn Harrison; Indianapolis, IN 2017 – 2018

Donated between 50-60 hours weekly towards providing therapy and testing services. Addressed psychological difficulties including anxiety, depression, behavioral disorders, attention deficit hyperactivity disorder and trauma related issues. Managed a weekly caseload of up to 40 clients ranging from pre-school age through adulthood.

Adjunct Faculty; Brown Mackie College; Indianapolis, IN 2016

Facilitated classroom/online instruction concerning Introduction to Psychology to an annual student load of 300 students.

Department of the Army 2002 – present

Provided distinguished military service, holding progressively challenging positions in capacities that support international humanitarian, civilian, and military missions.

- G4 Transportation OIC for the 310th Sustainment Command (Expeditionary). Responsible for division level management of all transportation requests consisting of 89 units, 154 UICs, and over 8,500 Soldiers with a 12 state logistical footprint. C2CRE and AERF logistics action officer for the command Mobilization section. Creates, revises and disseminates command policies and guidance to brigade and below to mitigate fraud, waste and abuse. Chief advisor to the command for deployment and redeployment operations to include; annual training events, individual training and OCONUS missions.
- Determine equipment funding requirements and coordinated for funds availability with supported units and resource management activities. Coordinate acquisition and priority distribution of new equipment fielding with the Force Modernization Activity.
- Redistribute excess equipment throughout the command. Process excess equipment for disposal after all redistribution efforts are met. Administer the Command Supply Discipline Program. Train, develop, and mentor all Army/Reserve personnel on supply policies, processes, and procedures. The primary advisor to the command and support units on all property accountability and organizational level supply.

Career Intermission Pilot Program; Indianapolis, IN 2018 – present

ESC Emergency Operations Center Officer/G4 Mobility OIC; Ft. Benn Harrison, IN; 2015 – 2018

Beneficiary Counselor/Reserve and Active Component S3; Ft. Bragg/ Raleigh, NC; 2012 – 2015

Basic Officer Leadership Course/Battalion S4; Ft. Lee, VA; 2010-2012

Senior Logistics Manager/ Support Operations Officer; Ft. Bliss, TX; 2005 – 2010

Support Operations NCOIC/Supervisor; Osan/Suwon, Korea; 2003 - 2005

Demonstrated Logistician; Fort Lee, VA/Ft. Jackson; 2002-2003

PROFESSIONAL PORTFOLIO

Specialized Training

Certified Training Coordinator ~ Equal Opportunity Training
 Certified Sexual Harassment & Sexual Assault Prevention
 Advanced Leadership/Management Development Course
 Recruiting Operations Course ~ Six Sigma Course ~ Instructor Course
 Suicide Prevention Course ~ Senior Demonstrated Logistician ~ Supervisor
 Leadership Course ~ Support Operations Course ~ Beneficiary Counselor
 Course

Affiliations	President, Psi Chi Society; 2016 – present Member; International Society of Logistics; 2016 – present Member; National Board of the ROCKS Inc.; 2016-present Member, National Society of Leadership & Success – Sigma Alpha Pi; 2018
Publications	The Phenomenological Analysis: <i>Army Soldiers and Their Toxic Leadership Experiences</i> . (2018) Co-Author; Holley, L, et al (2017), <i>Behind The Ranks</i> . Co-Author; Coleman, T, et al (2018), <i>Delayed, But Not Denied – 2</i>
Speaking Engagements	Performed speaking engagements on various topics including; Identity Conflict, Life Skills & Strategies, Motherhood, Marriage, Christianity & Homosexuality, Mental Health Wellness, Conflict Resolution, and Sexual/Mental/Physical Abuse, Winning in Your Mentality

**Recommendation for Appointments to the
Lackland Independent School District Board of Trustees**

April 17, 2020

**COMMITTEE ON SCHOOL INITIATIVES: ACTION
STATE BOARD OF EDUCATION: CONSENT**

SUMMARY: This item provides an opportunity for the board to consider two appointments to the board of trustees of the Lackland Independent School District. The appointments are necessary due to the expiration of the term of office for two board members.

STATUTORY AUTHORITY: Texas Education Code (TEC), §11.352.

TEC, §11.352 authorizes the State Board of Education (SBOE) to appoint school board members in special purpose school districts.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: No previous board action has occurred on this item.

BACKGROUND INFORMATION AND JUSTIFICATION: The SBOE is statutorily authorized to appoint board members for military reservation independent school districts. Trustees so appointed shall hold office for two years and until their successors are appointed and qualified. Enlisted military personnel may be appointed to the board; however, a majority must be civilians, and all may be civilians. When a vacancy occurs on one of these boards, the base commander notifies the commissioner of education in compliance with TEC, §11.352. Vacancies are widely advertised through base newspapers, email and other electronic means. Interested individuals then submit resumes and other documents verifying that they qualify to hold the position and would accept it if appointed.

The commanding officer appoints a nomination panel of at least three members who review the application packages, interview the candidates, and evaluate the candidates. The panel's recommendations are then forwarded to the commanding officer for consideration. The commanding officer is required by 19 TAC §61.2 to provide at least three nominations to the SBOE. The nominations may or may not be ranked in order of preference. All nominees must be qualified under the general school laws of Texas and live or be employed on the military reservation.

Colonel, United States Air Force, Scott J. Thompson, Commander of the 502d Installation Support Group, has notified the commissioner of two vacancies that exist on the board of trustees of the Lackland Independent School District due to the expiration of terms of office. Colonel Thompson has provided a nominee for each vacancy and has recommended the appointment of Mr. Khalil Gatlin and Ms. Sandra H. Wellman to fill the positions.

PUBLIC BENEFIT AND COST TO PERSONS: Both the public and the students will benefit by having qualified individuals appointed to the board of trustees.

MOTION TO BE CONSIDERED: The State Board of Education:

Based on Colonel Scott J. Thompson's recommendation, approve the appointment of Mr. Khalil Gatlin and Ms. Sandra H. Wellman to serve a term of office, from April 17, 2020, through April 17, 2022, on the Lackland Independent School District Board of Trustees.

Staff Member Responsible:

Jeff Cottrill, Deputy Commissioner of Governance and Accountability
Jason Hewitt, Associate Commissioner, Governance

Attachment: Correspondence including biographical information and supporting materials for each nominee

Khalil Gatlin, MBA
Master Sergeant US Air Force (Active)
8797 Marbach Road, Apt 13303, San Antonio, Texas 78227
(801) 309-9222 – E-mail Khalil.Gatlin@gmail.com

SUMMARY

Professional, executive leader and advisor with over 20 years of planning, developing, implementing and analyzing programs, budgets and services across a wide spectrum of business administration, higher education, veteran academic support and human resource management services. Respected mentor and team player who can integrate, relate and collaborate with corporate executives, university leadership (academia), strategic/operational leaders and administrative support staff with diverse backgrounds. Committed to excellence with a unique ability to find solutions to complex issues. A trusted limited liability corporation, strategic-operational, higher education and military leader with the ability to provide insightful/innovative and creative execution across a wide range of programs, policies and plans.

KEY QUALIFICATIONS

- **Executive Leadership**
- **Teamwork**
- **Advisor**
- **Strategic Planner**
- **Strategic Vision**
- **Program Management**
- **Critical Thinker**
- **Budget Optimization**
- **Counselor**
- **Adaptive Planner**
- **Recruiting Professional**
- **Policy Development**

Education

Doctor of Business Administration (5 Phase Doctoral Project/Dissertation Remaining—Chapter 4 & 5)
California Southern University, Irvine, California (GPA: 3.88)

Masters Business Administration
University of Phoenix, Phoenix, Arizona (GPA: 3.90)

AS Associate of Science
University of Phoenix, Phoenix, Arizona (GPA: 3.80)

AS Associate in Liberal Arts
Weber State University, Ogden, Utah (GPA: 3.56)

AS Human Resource Management
Community College of the Air Force, Maxwell, AFB, Alabama (GPA: 4.00)

Professional Manager Certification
Community College of the Air Force

Force Management & Security Support Department/Human Resource Management-Personnel (Second Air Force/Detachment 1 Technical Training Operations Center)

December 2019 to Present: Superintendent, Force Management

Primary/Personnel Superintendent Executive of all Basic Military Training Security Clearances/Accessions

- Directs Air Forces' sole security support operations for Basic Military Training; directs 5 member team, oversees clearances f/117 Air Force Specialty Code/31.5K graduates per year
- Responsible f/26 sensitive skill Air Force Specialty Code clearance program; conducts Basic Military Training briefs 2x day, oversees Force Protection submission to FBI
- Manages recruiting, personnel actions, career guidance & outbound assignment sections for Basic Military Training, Joint Base San Antonio-Lackland

Responsible for training of high caliber and diverse trainees for a leadership level work environment developing future leaders of the U.S. Air Force. Develops, apply and leverage a training program emphasizing leadership development by mentoring trainees to maximize their experiences and backgrounds. Also serves as the Detachment Recruiting Superintendent, responsible for the construction, management, and execution of all unit recruiting efforts.

- Created cradle-to-grave tracker; documented Top Secret clearance and statistics--shaped AETC way ahead for Air Force Specialty Codes
- Strategically mitigated 2.1K orders for Airman not medically cleared; canceled 98% projected classes--averted \$24M in lost training funds
- Oversaw Basic Military Training orders-hold program; Identified 118 Airmen on hold status--averted erroneous shipping/\$1.4M in empty Technical Training Seats
- Coordinated with Air Force Education Training Command to transformational/transactional analyze 140 discontinued investigations/adjudication for Basic Military Trainings' separated trainees--saved Air Force \$770K

Teaching Experience (School of Continuing Education)

January 2010 to Present: **Adjunct Professor/Instructor – Park University, Malmstrom Air Force Base, Montana (Campus) & (Online)- Park University, Joint Base San Antonio, Lackland Air Force Base, Texas (Campus) & (Online)**

Undergraduate Courses:

- Management of Organizations
- Human Resource Management
- Organizational Behavior
- Statistics

Military Experience

Dec 1996 to Present: United States Air Force (Honorable Service)

May 1997 to May 2005: **Chief Personnel Programs**

Develop Programs of Instruction and assists the senior leadership of the Mission Support and Civil Engineer Organization to sustain the combat readiness of over 3,500 airman and 40 separate units, in support of the mission effectiveness agenda.

**CENTCOM Materiel Recovery Element Team Lead, TSgt, United States Air Force, Shaw AFB, SC
August 2003— March 2004**

Part of first established United States Air Force Retrograde team. Led a multifunctional, multicomponent, joint-enabled and contractor-supported mission to execute redeployment, redistribution, and retrograde of Air Force materiel and equipment across all of Afghanistan. Orchestrated movement of assets and coordinated aircraft requests for shipment back to the United States.

- Devised retrograde start plan; liaison with Army 82nd Sustainment Brigade
- Led 17 outside the wire missions resulting in the recovery of 3K assets totaling \$25M dollars; redeployed 544 assets worth \$10M and 18 MRAP
- Managed team of 51 personnel comprised of civil engineering, transportation, and supply subject matter experts
- Received Achievement Medal and recognized as Wing Non-Commissioned Officer of the Month

August 2005 to June 2010: **Department of Technology (Indiana State University) Personnel Executive/Instructor – Terre Haute, Indiana**

Coordinated and instructed curriculum which emphasized on citizenship, character development, leadership development and community service for collegiate students enrolled in the Air Force ROTC program. The classes introduce students (cadets) to the elements of Leadership, Drill instruction and ceremonies, military customs, Uniform Inspections, Physical Fitness Training, Marksmanship, and Military history.

March 2011 to July 2012: **PERSONNEL SUPPORT CONTINGENCY OPERATION OFFICER IN CHARGE, U.S. AIR FORCE JSTO LIAISON CELL**

Supporting Operations Enduring Freedom and New Dawn, allowed seamless operations at the U. S. Army Primary Mobilization Force Generating Installation during the Global War on Terrorism

June 2010 to February 2014: **Joint Special Operations Installation Personnel Readiness, Malmstrom Air Force Base, MT**

Managed and maintained force management operations, communications, situational updates, all graphics and detailed coordination measures, as well as other combat readiness information deemed pertinent to the Chief of Operations and Wing Commanders

Aerospace Science Department/Human Resource Management-Personnel (Air Force ROTC)

December 2014 to 2019: Personnel/Program Coordinator/Instructor for University of Connecticut

Primary/Personnel coordinator of all School of Continuing Education/Human Resource activities

- Planning and providing individual and group advisement to students
- Provide administrative support to faculty members teaching at site
- Responsible for all aspects associated with operating a safe and functional Host Institution (University of Connecticut/satellite location for University of Hartford, Eastern Connecticut, Central Connecticut State University and University of Rhode Island students)

Responsible for training of high caliber and diverse candidates for a college-level program developing future leaders of the U.S. Air Force. Develop, apply and leverage a training program emphasizing academics and leadership development by mentoring candidates to maximize their experiences and backgrounds. Also serves as the Detachment Recruiting Non-Commissioned Officer, responsible for the construction, management, and execution of all unit recruiting efforts.

- Evaluate 150 highly qualified young men and women as prospective Air Force officers
- Led recruiting mission with 22 outreach events and contacted over 300 prospective students, resulting in a 60% increase in detachment growth
- Supervised 53 training events and ensured completion of required objectives
- Managed 43 Air Force and University scholarships totaling over \$640K and ran \$120K cadet pay program

Awards

Outstanding Volunteer of the Year

Hill Air Force Base Athlete of the Year

NCO of the quarter/year Award

Military Awards /Medals

Air Force Commendation Medal (3 Oak Leaf Cluster)

Air Force Achievement Medal

Air Force Organizational Excellence Award

Air Force Outstanding Unit Award

Air Force Good Conduct Medal

Air Force Nuclear Deterrence Medal

National Defense Serve Medal

Global War on Terrorism Service Medal



Joint Base San Antonio Statement of Eligibility

Applicant Full Name: Khalil Gatlin


Residential Address: 8797 Marbach Road
Apt 13303
San Antonio, TX 78227

Physical Address of Employer: 1525 Wurtsmith Road
Bldg 5725
San Antonio, TX 78253

Board of Trustees Location Applying For:

I hereby make a formal application for the above indicated Board of Trustees. In doing so, I confirm that:

- I am qualified under the general school laws of Texas and live or am employed on JBSA.
- I attest the contents of my resume.
- I am a qualified voter.
- I willingly accept the appointment to the Board of Trustees and will serve in this capacity with full adherence to the state established standards on the duties and responsibilities of school board members.



Signature of Applicant

11 FEB 20
Date

Khalil Gatlin

Printed Name of Applicant

Digital Signatures are authorized. If using a wet signature, please sign, date and print legibly. Form must be completed prior to setting up your interview with the selection board.



Senior Master Sergeant Sandra Wellman

Superintendent

Senior Master Sergeant Sandra H. Wellman is the Superintendent for the Air Force Band of the West, JBSA-Lackland Air Force Base. She advises and provides trusted counsel to the unit commander on personnel, directives, policies and programs. Sergeant Wellman hails from Lubbock, Texas, and prior to entering the Air Force, she was a sought after clarinet instructor and clinician for a variety of Texas School Districts. Sergeant Wellman holds two degrees in clarinet performance and a Master's Degree in Education. Her passion for education has afforded her the opportunity to instruct over 3,000 hours to over 350 Noncommissioned Officers as an Air Force Professional Military Instructor. She is currently working towards earning her special education teaching certification and developing a research proposal focusing on how to create an ADHD focused classroom.

EDUCATION:

1998: Bachelors of Music Degree in Clarinet Performance, Texas Tech University, Lubbock, Texas
2000: Masters of Music Degree in Clarinet Performance, Texas Christian University, Ft. Worth, Texas
2005: Airman Leadership School, Kelly Air Force Base, Texas
2008: Associate's Degree in Fine and Applied Art-Music, Community College of the Air Force
2012: Noncommissioned Officer Academy, Kapaun, Germany
2013: Senior Enlisted Joint Professional Military Education, National Defense University
2013: Associate's Degree in Instructor of Technology & Military Science, Community College of the Air Force
2015: Senior Noncommissioned Officer Academy, Distance Learning Course
2016: Professional Managers Certificate, Community College of the Air Force
2016: Masters of Education Degree, Oklahoma University, Oklahoma City, Oklahoma
2017: Senior Enlisted Joint Professional Military Education II, National Defense University
2019: Senior Noncommissioned Officer Academy, Gunter Annex, Alabama
2019: USAF Continuous Process Improvement Black Belt Course, Maxwell AFB, Alabama

ASSIGNMENTS:

1. Aug 2001 – Oct 2001, student, Basic Military Training, Lackland Air Force Base, Texas
2. Oct 2001 – Jul 2009, clarinetist, USAF Band of the West, Lackland Air Force Base, Texas
3. Jul 2009 – Jul 2012, clarinetist, United States Air Forces in Europe Band, Ramstein AB, Germany
4. Jul 2012 – Jul 2016, Instructor/Superintendent, Kisling Noncommissioned Officer Academy, Kapaun AS, Germany
5. Aug 2016 – Apr 2018, Operations Section Chief, Band of the West, JBSA-Lackland AFB
6. Apr – Oct 2018, Inspector General Superintendent, 380th Air Expeditionary Wing, Al Dhafra Air Base
7. Nov 2018 – present, Superintendent, Band of the West, JBSA-Lackland AFB

MAJOR AWARDS AND DECORATIONS:

Meritorious Service Medal with one oak leaf cluster
Air Force Commendation Medal with two oak leaf clusters
Air Force Achievement Medal with three oak leaf clusters
Military Outstanding Volunteer Service Medal with bronze star
Air Force Special Duty Ribbon

OTHER ACHIEVEMENTS:

2002: USAF Band of the West Airman of the Quarter, July – September
2004: USAF Band of the West Airman of the Year
2007: USAF Band of the West NCO of the Quarter, July –September
2009: USAF Band of the West NCO of the Quarter, January-March
2013: HQ USAFE Command Section Volunteer of the Quarter, January – March
2013: HQ USAFE Command Section NCO of the Quarter, April – June
2013: Tuskegee Airman “SMSgt BarBour” Award
2013: HQ USAFE Command Section NCO of the Year
2014: Kisling NCOA NCO of the Quarter, July – September
2015: HQ USAFE Command Section Volunteer of the Quarter, Jan – March
2015: Kisling Lance P Sijan Award – Junior Enlisted
2016: HQ USAFE Command Section SNCO of the Quarter, April – June
2017: USAF Band of the West SNCO of the Quarter, April – June
2018: 380th Wing Staff Agency Team of the Quarter, April – June
2018: 380th Air Expeditionary Wing SNCO of the Quarter, July –September
2019: Distinguished Graduate, SCNO Academy, Gunter Annex, Alabama
2019: USAF Band of the West SNCO of the Quarter, July – September
2019: USAF Band of the West SNCO of the Year

EFFECTIVE DATE OF PROMOTION:

Senior Master Sergeant 01 February 2019

(Current as of 24 January 2020)



Joint Base San Antonio Statement of Eligibility

Applicant Full Name:

Residential Address:

Band of the West
2220 Caswell
Lackland AFB TX

Physical Address of Employer:

12439 Lake Whitney
San Antonio TX 78253

Board of Trustees Location Applying For:

I hereby make a formal application for the above indicated Board of Trustees. In doing so, I confirm that:

- I am qualified under the general school laws of Texas and live or am employed on JBSA.
- I attest the contents of my resume.
- I am a qualified voter.
- I willingly accept the appointment to the Board of Trustees and will serve in this capacity with full adherence to the state established standards on the duties and responsibilities of school board members.

Signature of Applicant

2-11-2020

Date

Sandra H. Wellman

Printed Name of Applicant

**Digital Signatures are authorized. If using a wet signature, please sign, date and print legibly.
Form must be completed prior to setting up your interview with the selection board.**

Open-Enrollment Charter School Generation 25 Application Updates

April 16, 2020

COMMITTEE ON SCHOOL INITIATIVES: DISCUSSION

STATE BOARD OF EDUCATION: NO ACTION

SUMMARY: The director of the Division of Charter School Administration will discuss updates regarding the Generation Twenty-Five Open-Enrollment Charter Application cycle.

STATUTORY AUTHORITY: Texas Education Code (TEC), §12.110.

TEC, §12.110 describes the charter school application process.

The full text of statutory citations can be found in the statutory authority section of this agenda.

FUTURE ACTION EXPECTED: In September 2020, the committee and board will have an opportunity to review and take action or no action on the commissioner's list of proposed Generation Twenty-Five, Subchapter D, Open-Enrollment Charter Schools scheduled to open in school year 2021-2022.

BACKGROUND INFORMATION AND JUSTIFICATION: Applications for the current Open-Enrollment Charter School (also known as Subchapter D) application cycle were due on Tuesday, January 21, 2020. Twenty-two full applications were submitted by the deadline. All applications were reviewed for completeness; 16 applications were deemed complete and have advanced to external review.

Public information concerning open-enrollment charter schools is available on the Texas Education Agency website at the Charter Schools webpage -<https://tea.texas.gov/charterapp.aspx>. The Generation Twenty-Five application and required attachments are linked from that page.

Staff Members Responsible:

Kelvey Oeser, Deputy Commissioner, Educator and Systems Support

Joe Siedlecki, Associate Commissioner, Charters and Innovations

Heather Mauzé, Director, Charter School Authorizing and Administration

Separate Exhibit: [Open-Enrollment Charter School Generation Twenty-Five Application](#)

**Adoption of Review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters
(Adoption of Review)**

April 17, 2020

**COMMITTEE ON SCHOOL INITIATIVES: ACTION
STATE BOARD OF EDUCATION: ACTION**

SUMMARY: Texas Government Code, §2001.039, establishes a four-year rule review cycle for all state agency rules, including State Board of Education (SBOE) rules. This item presents the adoption of review of 19 Texas Administrative Code (TAC) Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters. Subchapter A establishes a provision for an SBOE member to be designated as the liaison for charter selection for charters proposed under Texas Education Code (TEC), Chapter 12, Subchapter D; charter selection procedures for charters granted under the TEC, Chapter 12, Subchapter D; and provisions for a 90-day no-contact requirement. Subchapter B sets forth provisions for adverse action on a home-rule school district charter.

STATUTORY AUTHORITY: The statutory authority for the rule review is the Texas Government Code (TGC), §2001.039. The statutory authority for 19 TAC Chapter 100, Subchapter A, is the Texas Education Code (TEC), §12.101. The statutory authority for 19 TAC Chapter 100, Subchapter B, is TEC, §§7.102(c)(8), 12.028, 12.101(b), and 12.101(b-0).

The Texas Government Code, §2001.039, requires all state agencies to review their rules at least once every four years.

The TEC, §7.102(c)(8), requires the SBOE to adopt a procedure to be used for placing on probation or revoking a home-rule school district charter as required by the TEC, Chapter 12.

The TEC, §12.028, requires the SBOE to adopt by rule a procedure to be used for placing on probation or revoking a home-rule school district charter.

The TEC, §12.101(b), requires the SBOE chair to designate a board member to liaise with the commissioner of education for the purpose of coordinating granting of open-enrollment charter schools under this section.

The TEC, §12.101(b-0), requires a majority of the board members present and voting to vote against the commissioner's charter proposals within 90 days of notice, otherwise the charter proposals take effect.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: The review of 19 TAC Chapter 100, Subchapters A and B, was presented to the Committee on School Initiatives for discussion at the January 2020 board meeting.

BACKGROUND INFORMATION AND JUSTIFICATION: The rule in 19 TAC Chapter 100, Subchapter A, addresses the open-enrollment charter selection process.

The rule in 19 TAC Chapter 100, Subchapter B, governs adverse action on a home-rule charter district. No home-rule charter districts currently exist, but such a district could be created.

No changes to the rules in 19 TAC Chapter 100, Subchapters A and B, are recommended as a result of the review.

If authorized by the SBOE, the Texas Education Agency (TEA) will file the adopted review with the Texas Register stating that the SBOE finds the reasons for adopting 19 TAC Chapter 100, Subchapters A and B, continue to exist. The filing of the adopted review stating that the reasons for adoption continue to exist would not preclude any amendments that may be proposed at different dates through a separate rulemaking process.

PUBLIC COMMENTS: The TEA filed the proposed review of 19 TAC Chapter 100, Subchapters A and B, with the Texas Register following the January 2020 SBOE meeting. The public comment period on the proposed review began March 6, 2020, and ended April 10, 2020. At the time this item was prepared, no comments had been received regarding this review. Any public comments received will be provided to the SBOE during the April 2020 meeting. The SBOE will take registered oral and written comments on the proposed review at the committee meeting in April 2020 in accordance with the SBOE board operating policies and procedures.

MOTION TO BE CONSIDERED: The State Board of Education:

Adopt the review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters.

Staff Members Responsible:

Kelvey Oeser, Deputy Commissioner, Educator and Systems Support
Joe Siedlecki, Associate Commissioner, Charters and Innovations
Heather Mauzé, Director, Charter School Authorizing and Administration

Attachment: Text of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters

**ATTACHMENT
Text of 19 TAC**

Chapter 100. Charters

Subchapter A. Open-Enrollment Charter Schools

§100.1. Selection Process.

- (a) In accordance with the Texas Education Code (TEC), §12.101, a State Board of Education (SBOE) member shall be designated by the SBOE chair to work in coordination with the commissioner of education on the review of TEC, Chapter 12, Subchapter D, open-enrollment charter school applicants.
- (b) Following the commissioner's notification to the SBOE of the charters the commissioner proposes to grant, a majority of the SBOE members present and voting may vote to veto the commissioner's proposed charter(s) or may vote to take no action. The SBOE's consideration of the proposed charters will occur no later than 90 days following the commissioner's notification.
- (c) The SBOE may not vote or deliberate on any charter application that has not been proposed by the commissioner. For purposes of this section, deliberation is defined in Texas Government Code, §551.001.
- (d) An applicant for an open-enrollment charter, or any person or entity acting on behalf of an applicant for an open-enrollment charter, shall not communicate with the commissioner or the commissioner's designee, a member of the SBOE, or a member of an external application review panel concerning a charter school application beginning on the date the application is submitted and ending 90 days after the commissioner's proposal. The SBOE may veto a proposed application for violation of this subsection.

Statutory Authority: The provisions of this §100.1 issued under the Texas Education Code, §12.101.

Source: The provisions of this §100.1 adopted to be effective October 21, 2014, 39 TexReg 8265.

Subchapter B. Home-Rule School District Charters

§100.201. Adverse Action on a Home-Rule School District Charter.

- (a) The State Board of Education (SBOE) may place on probation or revoke a home-rule school district charter if the SBOE determines that the district:
 - (1) committed a material violation of the charter;
 - (2) failed to satisfy generally accepted accounting standards of fiscal management; or
 - (3) failed to comply with the requirements of the Texas Education Code (TEC), Chapter 12, Subchapter B, or other applicable law or rule.
- (b) The recommendation to place on probation or revoke the charter of a home-rule school district charter shall be made by the Texas Education Agency (TEA) in accordance with 19 TAC §157.11 of this title (relating to Notice of Intent), no fewer than 60 calendar days prior to the meeting of the SBOE at which the recommendation will be considered.
- (c) The TEA shall notify the district before placing on probation or revoking the charter. The notice shall clearly specify the following, either in the notice or by reference to other documents included with the notice:
 - (1) the action sought and the grounds for taking such action;
 - (2) a statement of the legal authority and jurisdiction under which the hearing will be held;
 - (3) a reference to the particular sections of the statutes and rules involved; and
 - (4) the date, time, and place for a hearing on the action sought, which shall be provided to the district and to parents and guardians of district students, if requested in accordance with subsection (e) of this section.

- (d) Notice served on the district shall be notice to parents and guardians of students in the district.
- (e) Within ten calendar days after receiving the notice, the district may request a hearing and submit a written response containing specific answers to each of the findings included in the notice. If a request for hearing and a written response are not submitted within ten calendar days, the recommendations of the TEA on the proposed action shall be submitted to the SBOE for action.
- (f) A hearing held under this section shall be open to the public and must be held at the district unless a different location is agreed to by the district. The hearing shall be held not fewer than ten calendar days from the date the district receives notice and shall be governed by Chapter 157, Subchapter A, of this title (relating to General Provisions for Hearings Before the State Board of Education).
- (g) The administrative law judge may order that testimony and evidence from parents and guardians of students at the charter school be taken via prefiled written testimony under the Texas Government Code, §2001.085.

Statutory Authority: The provisions of this §100.201 issued under the Texas Education Code, §7.102(c)(8) and (9) and §12.028.

Source: The provisions of this §100.201 adopted to be effective October 10, 1999, 24 TexReg 8547.

Review of Proposed Amendments to 19 TAC Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures

April 17, 2020

**COMMITTEE ON SCHOOL INITIATIVES: ACTION
STATE BOARD OF EDUCATION: ACTION**

SUMMARY: This item provides the State Board of Education (SBOE) an opportunity to review the State Board for Educator Certification (SBEC) rule actions that would propose amendments to 19 Texas Administrative Code (TAC) Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures. The proposed amendments would implement the statutory requirements of Senate Bill (SB) 1839 and House Bills (HBs) 2039 and 3349, 85th Texas Legislature, Regular Session, 2017, and HB 3, 86th Texas Legislature, 2019. The proposed amendment to Subchapter C, Assessment of Educators, would reduce the amount of time for computer- and paper-based examination retakes from 45 to 30 days and would update the figure specifying the required test for issuance of the standard certification, including the removal of the master teacher certification class and the Principal: Early Childhood-Grade 12 certificate and the addition of Early Childhood-Grade 3 (EC-3), Science of Teaching Reading, and Trade and Industrial Workforce Training. The proposed amendment to Subchapter D, Types and Classes of Certificates Issued, would require the English as a Second Language Supplemental assessment for issuance of an intern certificate obtained through the intensive pre-service route. The proposed amendment to Subchapter E, Educational Aide Certificate, would allow the Educational Aide I certificate to be issued to high school students who have completed certain career and technical education courses. Proposed changes to Subchapter G, Certificate Issuance Procedures, would clarify that requests for certificate corrections be submitted to the Texas Education Agency (TEA) within six weeks from the original date of issuance. The proposed changes would also implement the requirement specified in statute that certified classroom teachers must complete training prior to receiving test approval for the Early Childhood: Prekindergarten-Grade 3 certificate. The SBEC made changes to the proposed text in Figure: 19 TAC §230.21(e) in response to public comment and to revert text for future rulemaking.

STATUTORY AUTHORITY: The statutory authority for 19 TAC Chapter 230 is the Texas Education Code (TEC) §§21.041(b)(1), (2), and (4); 21.044(a); 21.048, as amended by HB 3, 86th Texas Legislature, 2019; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.064, as amended by HB 3, 86th Texas Legislature, Regular Session, 2019; 22.082; and Texas Occupations Code (TOC), §54.003, for Subchapter C; 21.003(a); 21.031; 21.041(b)(1)-(5) and (9); 21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 22.064; and 22.0831(c) and (f) for Subchapter D; 21.041(a) and (b)(1)-(4) for Subchapter E; and 21.031(a); 21.041(b)(1)-(5) and (9) and (c); 21.044(a), (e), and (f); 21.048, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017; 21.0485; 21.0489; 21.050, as amended by HB 3217, 86th Texas Legislature, 2019; 21.054(a), as amended by SBs 7, 179, and 1839, 85th Texas Legislature, Regular Session, 2017, and HB 2424, 86th Texas Legislature, 2019; 22.082; and 22.0831(c) and (f); and TOC, §53.105, for Subchapter G.

TEC, §21.003(a), states a person may not be employed as a teacher, teacher intern or teacher trainee, librarian, educational aide, administrator, educational diagnostician, or school counselor by a school

district unless the person holds an appropriate certificate or permit issued as provided by the TEC, Chapter 21, Subchapter B.

TEC, §21.031(a), states the SBEC shall regulate and oversee all aspects of the certification, continuing education, and standards of conduct of public school educators.

TEC, §21.031(b), states the SBEC shall ensure all candidates for certification or renewal of certification should demonstrate the knowledge and skills necessary to improve the performance of a diverse student population.

TEC, §21.041(a), states the board may adopt rules as necessary for its own procedures.

TEC, §21.041(b)(1)-(5), requires the SBEC to propose rules that provide for the regulation of educators and the general administration of the TEC, Chapter 21, Subchapter B, in a manner consistent with the TEC, Chapter 21, Subchapter B; requires the SBEC to propose rules that specify the classes of educator certificates to be issued, including emergency certificates; the period for which each class of educator certificate is valid; and the requirements for the issuance and renewal of an educator certificate; and requires the SBEC to propose rules that include requirements for educators that hold a similar certification issued by another state or foreign country.

TEC, §21.041(b)(9), requires the SBEC to propose rules for the regulation of continuing education requirements.

TEC, §21.041(c), states the SBEC may adopt fees for the issuance and maintenance of an educator certification to adequately cover the cost of the administration.

TEC, §21.044(a), as amended by SBs 7, 1839, and 1963, 85th Texas Legislature, Regular Session, 2017, requires the SBEC to propose rules establishing training requirements a person must accomplish to obtain a certificate, enter an internship, or enter an induction-year program.

TEC, §21.044(e), states in proposing rules under this section for a person to obtain a certificate to teach a health science technology education course, the board shall specify a person must have: (1) an associate degree or more advanced degree from an accredited institution of higher education; (2) current licensure, certification, or registration as a health professions practitioner issued by a nationally recognized accrediting agency for health professionals; and (3) at least two years of wage-earning experience utilizing the licensure requirement.

TEC, §21.044(f), states the SBEC may not propose rules for a certificate to teach a health science technology education course that specifies a person must have a bachelor's degree or that establish any other credential or teaching experience requirements that exceed the requirements under Subsection (e). TEC, §21.048, as amended by HB 3, 86th Texas Legislature, 2019, states the SBEC shall propose rules prescribing comprehensive examinations for each class of certificate issued by the board that includes not requiring more than 45 days elapsing between examination retakes and that starting January 1, 2021, all candidates teaching prekindergarten through grade six must demonstrate proficiency in the science of teaching reading on a certification examination.

TEC, §21.0489, specifies the issuance requirements for the Early Childhood: Prekindergarten-Grade 3 certification.

TEC, §21.0485, states the issuance requirements for certification to teach students with visual impairments.

TEC, §21.050(a), states a person who applies for a teaching certificate must possess a bachelor's degree.

TEC, §21.050(b), as amended by HB 3217, 86th Texas Legislature, 2019, states the SBEC shall provide for a minimum number of semester credit hours of field-based experience or internship.

TEC, §21.050(c), states a person who receives a bachelor's degree required for a teaching certificate on the basis of higher education coursework completed while receiving an exemption from tuition and fees under the TEC, §54.363, may not be required to participate in any field experience or internship consisting of student teaching to receive a teaching certificate.

TEC, §21.051, as amended by SB 1839, 85th Texas Legislature, Regular Session, 2017, provides a requirement that before a school may employ a certification candidate as a teacher of record, the candidate must have completed at least 15 hours of field-based experience in which the candidate was actively engaged at an approved school in instructional or educational activities under supervision.

TEC, §21.054(a), as amended by SBs 7, 179, and 1839, 85th Texas Legislature, Regular Session, 2017, requires the SBEC to propose rules establishing a process for identifying continuing education courses and programs that fulfill educators' continuing education requirements.

TEC, §22.064, as amended by HB 3, 86th Texas Legislature, 2019, requires the SBEC to designate all Master Teacher certificates as Legacy Master Teacher.

TEC, §22.082, requires SBEC to subscribe to the criminal history clearinghouse as provided by Texas Government Code, §411.0845, and may obtain any law enforcement or criminal history records that relate to a specific applicant for or holder of a certificate issued under Chapter 21, Subchapter B.

TEC, §22.0831(c), requires SBEC to review the national criminal history of a person seeking certification.

TEC, §22.0831(f)(1) and (2), state SBEC may propose rules regarding the deadline for the national criminal history check and implement sanctions for persons failing to comply with the requirements.

TOC, §53.105, states a licensing authority may require a fee that is in an amount sufficient to cover the cost of administration.

TOC, §54.003, states a licensing authority shall provide accommodations and eligibility criteria for examinees diagnosed as having dyslexia.

The full text of statutory citations can be found in the statutory authority section of this agenda.

PREVIOUS BOARD ACTION: None.

BACKGROUND INFORMATION AND JUSTIFICATION: The SBEC rules in 19 TAC Chapter 230 specify the testing requirements for certification and the additional certificates based on examination. These requirements ensure educators are qualified and professionally prepared to instruct the schoolchildren of Texas. The following provides a description of changes to Chapter 230, Subchapters C, D, E, and G.

Subchapter C, §230.21. Assessment of Educators

The proposed amendment to §230.21(a)(1)(D) would reduce the amount of time between computer- and paper-based retakes from 45 days to 30 days. The proposed amendment is in response to stakeholder feedback from the July 2019 SBEC meeting and would allow candidates an additional testing window in the summer to meet certification requirements.

The proposed amendment to §230.21(e) would amend Figure: 19 TAC §230.21(e) to:

- comply with HB 3 by removing all master teacher certificates from the current list of active certifications
- comply with HB 3 by requiring educators that teach any grade level from Prekindergarten-Grade 6 to demonstrate proficiency in the science of teaching reading on a certification examination beginning January 1, 2021. The amendment would add 293 Science of Teaching Reading TExES as a required content pedagogy test for the §233.2, Early Childhood: Prekindergarten-Grade 3 certification.
- remove §241.60, Principal: Early Childhood-Grade 12, as new principal certifications were created, effective December 23, 2018
- provide for a transition from the current content tests to the anticipated content pedagogy tests as follows:

Certificate Name	Current Test to Anticipated Content Test
§239.84, Educational Diagnostician: Early Childhood-Grade 12	153 Educational Diagnostician EC-12 TExES to 253 Educational Diagnostician EC-12
§239.20, School Counselor: Early Childhood-Grade 12	152 School Counselor EC-12 TExES to 252 School Counselor EC-12 TExES
§233.14, Trade and Industrial Education: Grades 6-12	270 Pedagogy and Professional Responsibilities for Trade and Industrial Education 6-12 TExES to 370 Pedagogy and Professional Responsibilities for Trade and Industrial Education 6-12 TExES

- comply with SB 1839 and HB 2039 to create the required assessments for the §233.2 Early Childhood: Prekindergarten-Grade 3 certification
- comply with HB 3349 to create the required assessments for the new §233.14 Trade and Industrial Workforce Training: Grades 6-12 certification

At the February 21, 2020 meeting, the SBEC took action to revert proposed amendments to §230.21(e) to allow staff more time to work through transition dates to bring back for the SBEC's consideration at the May 1, 2020 meeting. The proposed amendments would have amended the Figure §230.21(e) to:

- comply with HB 3 by requiring educators that teach any grade level from Prekindergarten-Grade 6 to demonstrate proficiency in the science of teaching reading on a certification examination beginning January 1, 2021. The amendment would add 293 Science of Teaching Reading TExES as a required content pedagogy test for the following certifications:
 - §233.2, Core Subjects: Early Childhood-Grade 6
 - §233.2, Core Subjects: Grades 4-8
 - §233.3, English Language Arts and Reading: Grades 4-8
 - §233.3, English Language Arts and Reading/Social Studies: Grades 4-8
- provide for a transition from the current content tests to the anticipated content pedagogy tests as follows:

Certificate Name	Current Test to Anticipated Content Test
§233.12, Physical Education: Early Childhood-Grade 12	158 Physical Education EC-12 TExES to 258 Physical Education EC-12 TExES
§233.3, English Language Arts and Reading: Grades 4-8	117 English Language Arts and Reading 4-8 TExES to 217 English Language Arts and Reading 4-8
§233.2, Core Subjects: Early Childhood-Grade 6	291 Core Subjects EC-6 TExES to 2391 Core Subjects EC-6 TExES

- phase out retired assessments by removing the retired 183 Braille TExES assessment for the §233.8, Teacher of Students with Visual Impairments Supplemental: Early Childhood-Grade 12 certification

The attachment reflects the proposed rule text changes to Figure: 19 TAC §230.21(e).

Subchapter D, §230.33, Classes of Certificates, and §230.36, Intern Certificates

The proposed amendment to §230.33(b)(5) would align with the mandate in HB 3 to repeal the master teacher certificate class, giving those certificates contained therein a "legacy" designation for educator assignment purposes until they expire.

The proposed amendment to §230.36(f)(2)(C) would add the requirement of the English as Second Language (ESL) Supplemental assessment for issuance of the intern certificate through the intensive pre-service route. This will ensure teachers are ready to serve students in their classroom.

Subchapter E, §230.55, Certification Requirements for Educational Aide I

TEA staff in the divisions of Educator Certification, Instructional Support, and Career and Technical Education are working collaboratively to support the work associated with industry-based certifications. Industry certifications were designed to prepare students for success in postsecondary endeavors and are used for public school accountability.

The proposed amendment to §230.55 would add the word "either" to provide two possible paths to qualify for an Educational Aide I certificate: a path for conventional high school graduates and an

alternate path for high school students 18 years of age or older to attain educational industry experience while still in school. The alternate path to certification in proposed new §230.55(3) and (4) would allow students to earn Educational Aide I credentials after completing career and technical education courses and would allow schools to accurately reflect these students as "career ready" in their accountability measures.

Subchapter G, §230.104. Correcting a Certificate or Permit Issued in Error and §230.105. Issuance of Additional Certificates Based on Examination

The proposed amendment to §230.104(b) would add the requirement that if an entity incorrectly issues a certificate, TEA must receive a request to correct the error from the entity within six weeks. The proposed change also requires educators inform the recommending educator preparation program (EPP) of any assignment change that would require the educator to be certified in a different certification area. This will ensure teachers are teaching in their correct assignments. The proposed amendment would also apply to supplemental certifications, such as the Early Childhood-Grade 12 ESL certification, to ensure candidates are prepared to teach the students they serve.

The proposed amendment to §230.105(3) would comply with SB 1839 and HB 2039 to mandate all candidates complete training requirements for issuance of an Early Childhood: Prekindergarten-Grade 3 certification. Remaining paragraphs would be renumbered.

The attached reflects the proposed rule text changes.

SBOE Review of Proposed SBEC Rules

Under the TEC, §21.042, the SBEC must submit a written copy of each rule it proposes to adopt to the SBOE for review. The SBOE may reject the proposed rule by a vote of at least two-thirds of the members of the SBOE present and voting but may not modify a rule.

FISCAL IMPACT: Changes have been made to this section since published as proposed to reflect the impact of SBEC adopted, subject to SBOE review, rule action. The TEA staff has determined there is an anticipated fiscal impact on state government (TEA) required to comply with the proposal. The TEA estimates a cost of \$128,909 for each of the next five fiscal years (FYs) from FYs 2020-2024 for the development and ongoing administrative costs needed to maintain assessments. The TEA will receive an \$11 remittance for each Science of Teaching Reading test taken for an estimated total of \$2,750 annually for FYs 2021-2025. The TEA will receive \$17 per Educational Aide I application; this fee will be offset by the cost to process the certification. The TEA anticipates 4,872 additional Educational Aide I certifications for an estimated total of \$82,824 for FYs 2020-2024. There may be anticipated fiscal impact on local government if a school district chooses to pay the \$17 Educational Aide I application fee.

LOCAL EMPLOYMENT IMPACT: No changes have been made to this section since published as proposed. The proposal would have no effect on local economy; therefore, no local employment impact statement is required under Texas Government Code (TGC), §2001.022.

SMALL BUSINESS, MICROBUSINESS, AND RURAL COMMUNITY IMPACT: No changes have been made to this section since published as proposed. The proposal has no direct adverse economic impact for small businesses, microbusinesses, or rural communities; therefore, no regulatory flexibility analysis, specified in TGC, §2006.002, is required.

COST INCREASE TO REGULATED PERSONS: No changes have been made to this section since published as proposed. The proposal does impose a cost on regulated persons, another state agency, a special district, or a local government, and, therefore, is subject to TGC, §2001.0045. However, the proposal is exempt from TGC, §2001.0045, as provided under that statute, because the proposal is necessary to implement legislation. In addition, the proposal is necessary to ensure certified Texas educators are competent to educate Texas students and, therefore, necessary to protect the safety and welfare of the residents of this state.

TAKINGS IMPACT ASSESSMENT: No changes have been made to this section since published as proposed. The proposal does not impose a burden on private real property and, therefore, does not constitute a taking under TGC, §2007.043.

GOVERNMENT GROWTH IMPACT: No changes have been made to this section since published as proposed. The TEA staff prepared a Government Growth Impact Statement assessment for this proposed rulemaking. During the first five years the proposed rulemaking would be in effect, it would expand an existing regulation in §230.55 by allowing the SBEC to issue an Educational Aide I certificate to high school students seeking industry-based credentials. The proposed amendment to §230.105 would expand an existing regulation by adding the Early Childhood: Prekindergarten-Grade 3 certification as an ineligible certification for certification by examination. The proposed rulemaking would limit an existing regulation, §230.21(a)(1)(D), by reducing the number of days between computer- and paper-based examination retakes from 45 to 30 days. The proposed rule would require an increase in fees paid to the agency for each Science of Teaching Reading assessment taken (\$11 per assessment), but those fees would be offset by the increased costs to the agency of developing and administering the new test. The proposed rule would require an increase in fees paid to the agency for each additional Educational Aide I certificate issued, but those fees would be offset by the cost to process the certification. The proposed rule would create a new regulation in §230.104 by requiring entities to notify the agency within six weeks of certificate issuance for purposes of correction to an intern or probationary certificate and educators to notify their EPPs when their assignments change in a way that could impact the legal appropriateness of their certification. The proposed rulemaking would repeal an existing regulation as it eliminates the former principal certification and the master teacher class of certifications to implement HB 3, 86th Texas Legislature, 2019.

The proposed rulemaking would not create or eliminate a program, would not require the creation of new employee positions or elimination of existing employee positions; would not require an increase or decrease in future legislative appropriations to the agency; would not require a decrease in fees paid to the agency; would not increase or decrease the number of individuals subject to its applicability; and would not positively or adversely affect the state's economy.

PUBLIC BENEFIT AND COST TO PERSONS: Changes have been made to this section since published as proposed to reflect the impact of SBEC adopted, subject to SBOE review, rule action. The public and student benefit anticipated as a result of the proposed amendments would help broaden the pool of potential educators in Texas by expanding the Educational Aide I certificate and ensure educator candidates are demonstrating proficiency in research-based reading strategies and on rigorous and relevant assessments. Future teacher candidates seeking certification in Early Childhood: Prekindergarten-Grade 3 will be required to take the Science of Teaching Reading assessment. Based on EPP projected Early Childhood: Prekindergarten-Grade 3 teacher candidate enrollment, TEA staff anticipates this will result in about 250 test attempts with the cost of each test being \$136 for a total of \$34,000 starting FY 2021. Future candidates seeking certification in School Counselor will be required to take a certification assessment that has both selected-response and constructed-response questions. Based on the 2017-2018 data, TEA staff anticipates this impact to be about 1,633 test attempts with the cost of each test increasing from \$116 to \$200 for a total of \$137,172 starting FY 2021. Future candidates

seeking certification in Educational Diagnostician will be required to take a certification assessment that has both selected-response and constructed-response questions. Based on the 2017-2018 data, TEA staff anticipates this impact to be about 625 test attempts with the cost of each test increasing from \$116 to \$200 for a total of \$52,500 starting FY 2021. Future teacher candidates for Trade and Industrial Education 6-12 will be required to take a certification assessment that has both selected-response and constructed-response questions. Based on the 2017-2018 data, TEA staff anticipates this impact to be about 330 test attempts with the cost of each test increasing from \$116 to \$136 for a total of \$6,600 starting FY 2021. Based on 2018-2019 Public Education Information Management System (PEIMS) data, the anticipated number of candidates that would meet the new educational aide requirements would be 4,872. Each application would cost the applicant \$17 for a total of \$82,824 per FY starting FY 2020.

DATA AND REPORTING IMPACT: No changes have been made to this section since published as proposed. The proposal would have no new data and reporting impact.

PRINCIPAL AND CLASSROOM TEACHER PAPERWORK REQUIREMENTS: No changes have been made to this section since published as proposed. The TEA staff has determined the proposal would not require a written report or other paperwork to be completed by a principal or classroom teacher.

PUBLIC COMMENTS: In accordance with the SBEC rulemaking process, a summary of comments received by the SBEC on its proposed rules is shared with the SBOE under separate cover prior to this SBOE meeting.

MOTION TO BE CONSIDERED: The State Board of Education:

Take no action on the proposed amendments to 19 TAC Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures.

Staff Members Responsible:

Ryan Franklin, Associate Commissioner, Educator Leadership and Quality

Jessica McLoughlin, Director, Educator Standards and Testing

Attachment I: Text of Proposed Amendments to 19 TAC Chapter 230, Professional Educator Preparation and Certification, Subchapter C, Assessment of Educators, Subchapter D, Types and Classes of Certificates Issued, Subchapter E, Educational Aide Certificate, and Subchapter G, Certificate Issuance Procedures

Attachment II: Figure: 19 TAC §230.21(e)

Text of Proposed Amendments to 19 TAC

Chapter 230. Professional Educator Preparation and Certification**Subchapter C. Assessment of Educators****§230.21. Educator Assessment.**

- (a) A candidate seeking certification as an educator must pass the examination(s) required by the Texas Education Code (TEC), §21.048, and the State Board for Educator Certification (SBEC) in §233.1(e) of this title (relating to General Authority) and shall not retake an examination more than four times, unless the limitation is waived for good cause. The burden of proof shall be upon the candidate to demonstrate good cause.
- (1) For the purposes of the retake limitation described by the TEC, §21.048, an examination retake is defined as a second or subsequent attempt to pass any examination required for the issuance of a certificate, including an individual core subject examination that is part of the overall examination required for the issuance of a Core Subjects certificate as described in §233.2 of this title (relating to Early Childhood; Core Subjects).
- (A) A canceled examination score is not considered an examination retake.
- (B) An examination taken by an educator during a pilot period is not considered part of an educator's five-time test attempt limit.
- (C) Pursuant to TEC, §21.0491(d), the limit on number of test attempts does not apply to the trade and industrial workforce training certificate examination prescribed by the SBEC.
- (D) A candidate who fails a computer- or paper-based examination cannot retake the examination before 30 [~~45~~] days have elapsed following the candidate's last attempt to pass the examination.
- (2) Good cause is:
- (A) the candidate's highest score on an examination is within one conditional standard error of measurement (CSEM) of passing, and the candidate has completed 50 clock-hours of educational activities. CSEMs will be published annually on the Texas Education Agency (TEA) website;
- (B) the candidate's highest score on an examination is within two CSEMs of passing, and the candidate has completed 100 clock-hours of educational activities;
- (C) the candidate's highest score on an examination is within three CSEMs of passing, and the candidate has completed 150 clock-hours of educational activities;
- (D) the candidate's highest score on an examination is not within three CSEMs of passing, and the candidate has completed 200 clock-hours of educational activities;
- (E) if the candidate needs a waiver for more than one of the individual core subject examinations that are part of the overall examination required for the issuance of a Core Subjects certificate, the candidate has completed the number of clock-hours of educational activities required for each individual core subject examination as described in subparagraphs (A)-(D) of this paragraph up to a maximum of 300 clock-hours. The number of clock-hours for each examination may be divided equally based on the number of examinations in the waiver request, but the number of clock-hours for an examination shall not be less than 50; or
- (F) if a CSEM is not appropriate for an examination, the TEA staff will identify individuals who are familiar and knowledgeable with the examination content to review the candidate's performance on the five most recent examinations, identify the deficit competency or competencies, and determine the number of clock-hours of educational activities required.

- (3) Educational activities are defined as:
- (A) institutes, workshops, seminars, conferences, interactive distance learning, video conferencing, online activities, undergraduate courses, graduate courses, training programs, in-service, or staff development given by an approved continuing professional education provider or sponsor, pursuant to §232.17 of this title (relating to Pre-Approved Professional Education Provider or Sponsor) and §232.19 of this title (relating to Approval of Private Companies, Private Entities, and Individuals), or an approved educator preparation program (EPP), pursuant to §228.10 of this title (relating to Approval Process); and
 - (B) being directly related to the knowledge and skills included in the certification examination competency or competencies in which the candidate answered less than 70 percent of competency questions correctly. The formula for identifying a deficit competency is the combined total of correct answers for each competency on the five most recent examinations divided by the combined total of questions for each competency on the five most recent examinations.
- (4) Documentation of educational activities that a candidate must submit includes:
- (A) the provider, sponsor, or program's name, address, telephone number, and email address. The TEA staff may contact the provider, sponsor, or program to verify an educational activity;
 - (B) the name of the educational activity (e.g., course title, course number);
 - (C) the competency or competencies addressed by the educational activity as determined by the formula described in paragraph (3)(B) of this subsection;
 - (D) the provider, sponsor, or program's description of the educational activity (e.g., syllabus, course outline, program of study); and
 - (E) the provider, sponsor, or program's written verification of the candidate's completion of the educational activity (e.g., transcript, certificate of completion). The written verification must include:
 - (i) the provider, sponsor, or program's name;
 - (ii) the candidate's name;
 - (iii) the name of the educational activity;
 - (iv) the date(s) of the educational activity; and
 - (v) the number of clock-hours completed for the educational activity. Clock-hours completed before the most recent examination attempt or after a request for a waiver is submitted shall not be included. One semester credit hour earned at an accredited institution of higher education is equivalent to 15 clock-hours.
- (5) To request a waiver of the limitation, a candidate must meet the following conditions:
- (A) the candidate is otherwise eligible to take an examination. A candidate seeking a certificate based on completion of an EPP must have the approval of an EPP to request a waiver;
 - (B) beginning September 1, 2016, the candidate pays the non-refundable waiver request fee of \$160;
 - (C) the candidate requests the waiver of the limitation in writing on forms developed by the TEA staff; and
 - (D) the request for the waiver is postmarked not earlier than:
 - (i) 45 calendar days after an unsuccessful attempt at the fourth retake of an examination as defined in the TEC, §21.048; or

- (ii) 90 calendar days after the date of the most recent denied waiver of the limitation request; or
 - (iii) 180 calendar days after the date of the most recent unsuccessful examination attempt that was the result of the most recently approved request for waiver of the limitation.
- (6) The TEA staff shall administratively approve each application that meets the criteria specified in paragraphs (2)-(5) of this subsection.
- (7) An applicant who does not meet the criteria in paragraphs (2)-(5) of this subsection may appeal to the SBEC for a final determination of good cause. A determination by the SBEC is final and may not be appealed.
- (b) A candidate seeking a standard certificate as an educator based on completion of an approved EPP may take the appropriate certification examination(s) required by subsection (a) of this section only at such time as the EPP determines the candidate's readiness to take the examinations, or upon successful completion of the EPP, whichever comes first.
- (c) The holder of a lifetime Texas certificate effective before February 1, 1986, must pass examinations prescribed by the SBEC to be eligible for continued certification, unless the individual has passed the Texas Examination of Current Administrators and Teachers (TECAT).
- (d) The commissioner of education approves the satisfactory level of performance required for certification examinations, and the SBEC approves a schedule of examination fees and a plan for administering the examinations.
- (e) The appropriate examination(s) required for certification are specified in the figure provided in this subsection.
Figure: 19 TAC §230.21 (c) ~~Figure: 19 TAC §230.21(c)~~ ~~Figure: 19 TAC §230.21(c)~~
- (f) Scores from examinations required under this title must be made available to the examinee, the TEA staff, and, if appropriate, the EPP from which the examinee will seek a recommendation for certification.
- (g) The following provisions concern ethical obligations relating to examinations.
 - (1) An educator or candidate who participates in the development, design, construction, review, field testing, scoring, or validation of an examination shall not reveal or cause to be revealed the contents of the examination to any other person.
 - (2) An educator or candidate who administers an examination shall not:
 - (A) allow or cause an unauthorized person to view any part of the examination;
 - (B) copy, reproduce, or cause to be copied or reproduced any part of the examination;
 - (C) reveal or cause to be revealed the contents of the examination;
 - (D) correct, alter, or cause to be corrected or altered any response to a test item contained in the examination;
 - (E) provide assistance with any response to a test item contained in the examination or cause assistance to be provided; or
 - (F) deviate from the rules governing administration of the examination.
 - (3) An educator or candidate who is an examinee shall not:
 - (A) copy, reproduce, or cause to be copied or reproduced any test item contained in the examination;
 - (B) provide assistance with any response to a test item contained in the examination, or cause assistance to be provided;
 - (C) solicit or accept assistance with any response to a test item contained in the examination;

- (D) deviate from the rules governing administration of the examination; or
 - (E) otherwise engage in conduct that amounts to cheating, deception, or fraud.
- (4) An educator, candidate, or other test taker shall not:
- (A) solicit information about the contents of test items on an examination that the educator, candidate, or other test taker has not already taken from an individual who has had access to those items, or offer information about the contents of specific test items on an examination to individuals who have not yet taken the examination;
 - (B) fail to pay all test costs and fees as required by this chapter or the testing vendor; or
 - (C) otherwise engage in conduct that amounts to violations of test security or confidentiality integrity, including cheating, deception, or fraud.
- (5) A person who violates this subsection is subject to:
- (A) sanction, including, but not limited to, disallowance and exclusion from future examinations either in perpetuity or for a period of time that serves the best interests of the education profession, in accordance with the provisions of the TEC, §21.041(b)(7), and Chapter 249 of this title (relating to Disciplinary Proceedings, Sanctions, and Contested Cases); and/or
 - (B) denial of certification in accordance with the provisions of the TEC, §21.041(b)(7), and Chapter 249 of this title; and/or
 - (C) voiding of a score from an examination in which a violation specified in this subsection occurred as well as a loss of a test attempt for purposes of the retake limit in subsection (a) of this section.

Subchapter D. Types and Classes of Certificates Issued

§230.33. Classes of Certificates.

- (a) "Class of certificates" means a certificate with the following characteristics:
- (1) specific job duties or functions associated with the certificate;
 - (2) standards established by the State Board for Educator Certification (SBEC) for the issuance of the certificate; and
 - (3) comprehensive examination(s) prescribed by the SBEC, as specified in §230.21 of this title (relating to Educator Assessment).
- (b) Classes of certificates include the following:
- (1) superintendent;
 - (2) principal;
 - (3) classroom teacher (categories of classroom teaching certificates are described in Chapter 233 of this title (relating to Categories of Classroom Teaching Certificates));
 - (4) reading specialist;
 - (5) legacy master teacher [~~master teacher~~];
 - (6) school librarian;
 - (7) school counselor; and
 - (8) educational diagnostician.

§230.36. Intern Certificates.

- (a) General provisions.

- (1) Certificate classes. An intern certificate may be issued for any class of certificate except educational aide.
 - (2) Requirement to hold an intern certificate. A candidate seeking certification as an educator must hold an intern certificate while participating in an internship through an approved educator preparation program (EPP).
- (b) Requirements for issuance. An intern certificate may be issued to a candidate seeking certification as an educator who meets the conditions and requirements prescribed in this subsection.
- (1) Bachelor's degree. Except as otherwise provided in rules of the State Board for Educator Certification related to certain career and technical education certificates based on skill and experience, the candidate must hold a bachelor's degree or higher from an accredited institution of higher education. An individual who has earned a degree outside the United States must provide an original, detailed report or course-by-course evaluation for all college-level credits prepared by a foreign credential evaluation service recognized by the Texas Education Agency (TEA). The evaluation must verify that the individual holds, at a minimum, the equivalent of a bachelor's degree issued by an accredited institution of higher education in the United States.
 - (2) General certification requirements. The candidate must meet the general certification requirements prescribed in §230.11 of this title (relating to General Requirements).
 - (3) Fee. The candidate must pay the fee prescribed in §230.101 of this title (relating to Schedule of Fees for Certification Services).
 - (4) Fingerprints. The candidate must submit fingerprints in accordance with §232.35(c) of this title (relating to Submission of Required Information) and the Texas Education Code (TEC), §22.0831.
- (c) Conditions. The validity and effectiveness of an intern certificate is subject to the following conditions.
- (1) Internship. The holder of an intern certificate must be a participant in good standing of an approved Texas EPP, serving in an acceptable, paid internship supervised by the EPP.
 - (2) Inactive status. An intern certificate will become inactive 30 calendar days after the holder's separation from the school assignment or the EPP. The unexpired term of an intern certificate may be reactivated if the holder satisfies the requirements specified in this section.
 - (3) Term of an intern certificate. An intern certificate shall be valid for one 12-month period from the date of issuance.
 - (4) Limit on preliminary certifications and permits. Without obtaining standard certification, an individual may not serve for more than three 12-month periods while holding any combination of the following:
 - (A) intern certificates, limited to one 12-month period maximum, as described in this subsection;
 - (B) probationary certificates, limited to two 12-month periods maximum, as specified in §230.37 of this title (relating to Probationary Certificates)
 - (C) emergency permits as specified in Subchapter F of this chapter (relating to Permits); or
 - (D) one-year certificates as specified in Subchapter H of this chapter (relating to Texas Educator Certificates Based on Certification and College Credentials from Other States or Territories of the United States) and Chapter 245 of this title (relating to Certification of Educators from Other Countries).
 - (5) Reduction in force exception. If an educator is employed under an intern certificate and is terminated or resigns in lieu of termination before the end of the school year due to a reduction in force, that intern term shall not count as one of the three years referenced in paragraph (4) of this subsection.

- (d) Testing requirements for issuance of an intern certificate. Beginning September 1, 2017, a candidate must meet the subject matter knowledge requirements for issuance of an intern certificate to serve an internship in a classroom teacher assignment for each subject area to be taught.
- (1) To meet the subject matter knowledge requirements to be issued an intern certificate for an internship in a classroom teacher assignment on or after September 1, 2017, a candidate must pass all of the appropriate content pedagogy examinations, as prescribed in Subchapter C of this chapter.
 - (2) To meet the subject matter knowledge requirements to be issued an intern certificate for an internship in a career and technical education classroom teacher assignment that is based on skill and experience on or after September 1, 2017, a candidate must satisfy the requirements for that subject area contained in §233.14 of this title (relating to Career and Technical Education (Certificates requiring experience and preparation in a skill area)) and pass the appropriate content pedagogy examination(s), as prescribed in Subchapter C of this chapter (relating to Assessment of Educators).
- (e) Intern certificate in a certification class other than classroom teacher. An intern certificate may be issued for assignment as a superintendent, principal, reading specialist, master teacher, school librarian, school counselor, and educational diagnostician to an individual who meets the applicable requirements prescribed in subsection (b) of this section and who also meets the requirements prescribed in this subsection.
- (1) An applicant for an intern certificate in a certification class other than classroom teacher must meet all requirements established by the recommending EPP, which shall be based on the qualifications and requirements for the class of certification sought and the duties to be performed by the holder of an intern certificate in that class.
 - (2) The individual must have also been:
 - (A) accepted and enrolled to participate in a Texas EPP that has been approved to prepare candidates for the certificate sought; and
 - (B) assigned in the certificate area being sought in a Texas school district, open-enrollment charter school, or, pursuant to §228.35 of this title (relating to Preparation Program Coursework and/or Training), other school approved by the TEA.
 - (3) The holder of an intern certificate in a certification class other than classroom teacher is subject to all terms and conditions of an intern certificate prescribed in subsection (c) of this section.
 - (4) The following provisions apply to the intern certificate for Principal as Instructional Leader.
 - (A) During the transition period of December 1, 2018 through September 1, 2019, the SBEC may issue an intern certificate to a candidate who meets the requirements specified in paragraphs (1)-(3) of this subsection.
 - (B) Effective September 1, 2019, the SBEC may issue an intern certificate to a candidate who meets requirements specified in paragraphs (1)-(3) of this subsection and has passed the Principal as Instructional Leader examination specified in Subchapter C of this chapter [relating to Assessment of Educators] .
- (f) Intern certificate for intensive pre-service. An intern certificate may be issued to an applicant who is admitted to an EPP intensive pre-service as prescribed in §228.33 of this title (relating to Intensive Pre-Service) on or after January 1, 2020, who:
- (1) obtained a passing score on the aligned pedagogical rubric specified in §228.33 of this title;
 - (2) obtained a passing score, in accordance with §151.1001 of this title (relating to Passing Standards), on the required content certification (subject-matter only) examination and the following additional requirements for special education and bilingual assignments;
 - (A) Special education assignments also require a passing score, in accordance with §151.1001 of this title, on the TExES Special Education Supplemental examination prescribed in §230.21(e) of this title (relating to Educator Assessment); and

- (B) Bilingual education assignments also require a passing score, in accordance with §151.1001 of this title, on the TExES Bilingual Target Language Proficiency examination or the related language proficiency examination prescribed in §230.21(e) of this title; and
 - (C) English as Second Language (ESL) assignments also require a passing score, in accordance with §151.1001 of this title, on the TExES ESL Supplemental examination or the related language proficiency examination prescribed in §230.21(e) of this title; and
- (3) met the requirements as prescribed in subsections (a)-(c) of this section.

Subchapter E. Educational Aide Certificate

§230.55. Certification Requirements for Educational Aide I.

An applicant for an educational aide I certificate shall meet the requirements in either paragraphs (1) and (2) of this section or paragraphs (3) and (4) of this section as follows:

- (1) hold a high school diploma, the equivalent of a high school diploma, or higher; and
- (2) have experience working with students or parents as approved by the employing superintendent. Experience may be work in church-related schools, day camps, youth groups, private schools, licensed daycare centers, or similar experience ; or []
- (3) be a high school student 18 years of age or older; and
- (4) have a final grade of 70 or better in two or more education and training courses specified in Chapter 130, Subchapter E, of this title (relating to Education and Training) for three or more credits verified in writing by the superintendent of the district where the credits were earned. The education and training courses must include either:
 - (A) Instructional Practices, as described in §130.164 of this title (relating to Instructional Practices (Two Credits), Adopted 2015); or
 - (B) Practicum in Education and Training, as described in §130.165 of this title (relating to Practicum in Education and Training (Two Credits), Adopted 2015).

Subchapter G. Certificate Issuance Procedures

§230.104. Correcting a Certificate or Permit Issued in Error.

- (a) If a certificate or permit is issued with an incorrect grade level, subject area, or effective date, the recommending entity may request a correction of the certificate or permit by submitting a written request to Texas Education Agency (TEA) staff and a fee equivalent to the fee for the original certificate or permit. The entity must provide sufficient justification for the correction.
- (b) The request to amend or correct an intern or probationary certificate and the appropriate fee must be submitted to the TEA no later than six weeks from the date of issuance of the certificate or, in the case of a change of assignment, no later than six weeks from the date of the change. Within seven days, the educator must notify the recommending educator preparation program of any change in assignment that may affect the certification category required by the assignment according to the provisions of Chapter 231 of this title (relating to Requirements for Public School Personnel Assignments).

§230.105. Issuance of Additional Certificates Based on Examination.

A teacher who holds a valid provisional, professional, or standard classroom teaching certificate or a valid temporary classroom teaching certificate issued under the provisions of Subchapter H of this chapter (relating to Texas Educator Certificates Based on Certification and College Credentials from Other States or Territories of the United States), or Chapter 245 of this title (relating to Certification of Educators from Other Countries), and a bachelor's degree or higher from an accredited institution of higher education may qualify for an additional teaching field or certification to teach at another level by passing the appropriate

certification examination(s) for that subject. The teacher must submit the application to add certification based on an examination during the time the certificate is allowed to be issued by the State Board for Educator Certification. The application for the additional certification must be submitted during the validity period of the appropriate Texas classroom teaching certificate. If a teacher holds multiple teaching certificates, all teaching certificates must be active before adding certification by examination. The rule shall not be used to qualify a classroom teacher for:

- (1) initial certification;
- (2) the Teacher of Students with Visual Impairments Supplemental: Early Childhood-Grade 12 certificate;
- (3) the Early Childhood: Prekindergarten-Grade 3 certificate;
- (4) ~~(3)~~ another class of certificate, as listed in Subchapter D of this chapter (relating to Types and Classes of Certificates Issued); or
- (5) ~~(4)~~ certification for which no certification examination has been developed.

Figure: 19 TAC §230.21(e)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Art			
§233.10	Art: Early Childhood-Grade 12	178 Art EC-12 Texas Examinations of Educator Standards (TExES)	160 Pedagogy and Professional Responsibilities (PPR) EC-12 TExES or 2015 edTPA: Visual Arts (pilot exam)
Bilingual Education			
§233.6	Bilingual Education Supplemental: Spanish	164 Bilingual Education Supplemental TExES and 190 Bilingual Target Language Proficiency (BTLPT) – Spanish TExES	Not Applicable: Not a Stand-alone Certificate
§233.6	Bilingual Education Supplemental: American Sign Language	164 Bilingual Education Supplemental TExES and 184 American Sign Language (ASL) EC-12 TExES and 073 Texas Assessment of Sign Communications- American Sign Language (TASC-ASL)	Not Applicable: Not a Stand-alone Certificate
§233.6	Bilingual Education Supplemental: Arabic	164 Bilingual Education Supplemental TExES and American Council for the Teaching of Foreign Languages (ACTFL) 614 Oral Proficiency Interview (OPI) – Arabic and 615 Writing Proficiency Test (WPT) – Arabic	Not Applicable: Not a Stand-alone Certificate
§233.6	Bilingual Education Supplemental: Chinese	164 Bilingual Education Supplemental TExES and ACTFL 618 OPI – Chinese (Mandarin) and 619 WPT – Chinese (Mandarin)	Not Applicable: Not a Stand-alone Certificate

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Bilingual Education (continued)			
§233.6	Bilingual Education Supplemental: Japanese	164 Bilingual Education Supplemental TExES and ACTFL 616 OPI – Japanese and 617 WPT – Japanese	Not Applicable: Not a Stand-alone Certificate
§233.6	Bilingual Education Supplemental: Vietnamese	164 Bilingual Education Supplemental TExES and ACTFL 620 OPI – Vietnamese and 621 WPT – Vietnamese	Not Applicable: Not a Stand-alone Certificate
Career and Technical Education			
§233.13	Technology Education: Grades 6-12	171 Technology Education 6-12 TExES	160 PPR EC-12 TExES or 2143 edTPA: Technology and Engineering Education (pilot exam)
§233.13	Family and Consumer Sciences, Composite: Grades 6-12	American Association of Family and Consumer Sciences (AAFCS) 200 Family and Consumer Sciences – Composite Examination	160 PPR EC-12 TExES or 2117 edTPA: Family and Consumer Sciences (pilot exam)
§233.13	Human Development and Family Studies: Grades 8-12	AAFCS 202 Human Development and Family Studies Concentration Examination	160 PPR EC-12 TExES or 2117 edTPA: Family and Consumer Sciences (pilot exam)
§233.13	Hospitality, Nutrition, and Food Sciences: Grades 8-12	AAFCS 201 Hospitality, Nutrition, and Food Science Concentration Examination	160 PPR EC-12 TExES or 2117 edTPA: Family and Consumer Sciences (pilot exam)
§233.13	Agriculture, Food, and Natural Resources: Grades 6-12	272 Agriculture, Food, and Natural Resources 6-12 TExES	160 PPR EC-12 TExES or 2100 edTPA: Agricultural Education (pilot exam)
§233.13	Business and Finance: Grades 6-12	276 Business and Finance 6-12 TExES	160 PPR EC-12 TExES or 2102 edTPA: Business Education (pilot exam)
§233.14	Marketing: Grades 6-12	275 Marketing 6-12 TExES	160 PPR EC-12 TExES or 2102 edTPA: Business Education (pilot exam)
§233.14	Health Science: Grades 6-12	273 Health Science 6-12 TExES	160 PPR EC-12 TExES

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Career and Technical Education (continued)			
§233.14	Trade and Industrial Education: Grades 6-12	Not Applicable	270 Pedagogy and Professional Responsibilities for Trade and Industrial Education 6-12 TExES (last operational date <u>8/31/2021</u>) <u>Starting 9/1/2021 370 Pedagogy and Professional Responsibilities for Trade and Industrial Education 6-12 TExES</u>
<u>§233.14</u>	<u>Trade and Industrial Workforce Training: Grades 6-12</u>	<u>Not Applicable</u>	<u>370 Pedagogy and Professional Responsibilities for Trade and Industrial Education 6-12 TExES</u>
Computer Science and Technology Applications			
§233.5	Computer Science: Grades 8-12	241 Computer Science 8-12 TExES	160 PPR EC-12 TExES or 2143 edTPA: Technology and Engineering Education (pilot exam)
§233.5	Technology Applications: Early Childhood-Grade 12	242 Technology Applications EC-12 TExES	160 PPR EC-12 TExES or 2108 edTPA: Educational Technology Specialist (pilot exam)
Core Subjects			
§233.2	Core Subjects: Early Childhood-Grade 6	291 Core Subjects EC-6 TExES (last operational date 12/31/2020) <u>Starting 1/1/2021 391 Core Subjects EC-6 TExES and 293 Science of Teaching Reading TExES]</u>	160 PPR EC-12 TExES or 2110 edTPA: Elementary Education: Literacy with Mathematics Task 4 (pilot exam)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Core Subjects (continued)			
§233.2	Core Subjects: Grades 4-8	211 Core Subjects 4-8 TExES [and 293 Science of Teaching Reading TExES (starting 1/1/2021)]	160 PPR EC-12 TExES or 2016 edTPA: Middle Childhood Mathematics (pilot exam) or 2017 edTPA: Middle Childhood Science (pilot exam) or 2018 edTPA: Middle Childhood English-Language Arts (pilot exam) or 2019 edTPA: Middle Childhood History/Social Studies (pilot exam)
Counselor			
§239.20	School Counselor: Early Childhood-Grade 12	152 School Counselor EC-12 TExES (last operational date <u>8/31/2021</u>) <u>Starting 9/1/2021 252 School Counselor EC-12 TExES</u>	Not Applicable: Not an Initial Certificate
Dance			
§233.10	Dance: Grades 6-12	279 Dance 6-12 TExES	160 PPR EC-12 TExES or 2021 edTPA: K-12 Performing Arts (pilot exam)
Early Childhood			
<u>§233.2</u>	<u>Early Childhood: Prekindergarten-Grade 3</u>	<u>292 Early Childhood: PK-3 TExES and 293 Science of Teaching Reading TExES</u>	<u>160 PPR EC-12 TExES or 2014 edTPA: Early Childhood Education (pilot exam)</u>
Educational Diagnostician			
§239.84	Educational Diagnostician: Early Childhood-Grade 12	153 Educational Diagnostician EC-12 TExES (last operational date <u>12/31/2020</u>) <u>Starting 1/1/2021 251 Educational Diagnostician EC-12 TExES</u>	Not Applicable: Not an Initial Certificate

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
English Language Arts and Reading			
§233.3	English Language Arts and Reading: Grades 4-8	117 English Language Arts and Reading 4-8 TExES [(last operational date 12/31/2021) Starting 1/1/2022 217 English Language Arts and Reading 4-8 TExES and 293 Science of Teaching Reading TExES (starting 1/1/2024)]	160 PPR EC-12 TExES or 2018 edTPA: Middle Childhood English-Language Arts (pilot exam)
§233.3	English Language Arts and Reading: Grades 7-12	231 English Language Arts and Reading 7-12 TExES	160 PPR EC-12 TExES or 2003 edTPA: Secondary English-Language Arts (pilot exam)
§233.3	English Language Arts and Reading/Social Studies: Grades 4-8	113 English Language Arts and Reading/ Social Studies 4-8 TExES [and 293 Science of Teaching Reading TExES (starting 1/1/2021)]	160 PPR EC-12 TExES or 2018 edTPA: Middle Childhood English-Language Arts (pilot exam) or 2019 edTPA: Middle Childhood History/Social Studies (pilot exam)
§239.93	Reading Specialist: Early Childhood-Grade 12	151 Reading Specialist EC-12 TExES	Not Applicable: Not an Initial Certificate
English as a Second Language			
§233.7	English as a Second Language Supplemental	154 English as a Second Language Supplemental TExES	Not Applicable: Not a Stand-alone Certificate
Gifted and Talented			
§233.9	Gifted and Talented Supplemental	162 Gifted and Talented TExES	Not Applicable: Not a Stand-alone Certificate
Health			
§233.11	Health: Early Childhood-Grade 12	157 Health Education EC-12 TExES	160 PPR EC-12 TExES or 2119 edTPA: Health Education (pilot exam)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Journalism			
§233.3	Journalism: Grades 7-12	256 Journalism 7-12 TExES	160 PPR EC-12 TExES or 2003 edTPA: Secondary English-Language Arts (pilot exam)
Junior Reserve Officer Training			
§233.17	Junior Reserve Officer Training Corps: Grades 6-12	Not Applicable	160 PPR EC-12 TExES
Languages Other Than English			
§233.15	American Sign Language: Early Childhood-Grade 12	184 ASL EC-12 TExES and 073 TASC-ASL	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Arabic: Early Childhood-Grade 12	ACTFL 605 OPI – Arabic and 600 WPT – Arabic	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Chinese: Early Childhood-Grade 12	ACTFL 606 OPI – Chinese (Mandarin) and 601 WPT – Chinese (Mandarin)	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	French: Early Childhood-Grade 12	610 Languages Other Than English (LOTE) French EC-12 TExES	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	German: Early Childhood-Grade 12	611 LOTE German EC-12 TExES	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Hindi: Early Childhood-Grade 12	ACTFL 622 OPI – Hindi and 623 WPT – Hindi	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Italian: Early Childhood-Grade 12	ACTFL 624 OPI – Italian and 625 WPT – Italian	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Japanese: Early Childhood-Grade 12	ACTFL 607 OPI – Japanese and 602 WPT – Japanese	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Korean: Early Childhood-Grade 12	ACTFL 630 OPI – Korean and 631 WPT – Korean	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Languages Other Than English (continued)			
§233.15	Latin: Early Childhood-Grade 12	612 LOTE Latin EC-12 TExES	160 PPR EC-12 TExES or 2104 edTPA: Classical Languages (pilot exam)
§233.15	Portuguese: Early Childhood-Grade 12	ACTFL 632 OPI – Portuguese and 633 WPT – Portuguese	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Russian: Early Childhood-Grade 12	ACTFL 608 OPI – Russian and 603 WPT – Russian	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Spanish: Early Childhood-Grade 12	613 LOTE Spanish EC-12 TExES	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Turkish: Early Childhood-Grade 12	ACTFL 626 OPI – Turkish and 627 WPT – Turkish	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
§233.15	Vietnamese: Early Childhood-Grade 12	ACTFL 609 OPI – Vietnamese and 604 WPT – Vietnamese	160 PPR EC-12 TExES or 2020 edTPA: World Language (pilot exam)
Librarian			
§239.60	School Librarian: Early Childhood-Grade 12	150 School Librarian Early Childhood-12 TExES	Not Applicable: Not an Initial Certificate

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
[Master Teacher]			
§239.102	Master Mathematics Teacher: Early Childhood-Grade 4	087 Master Mathematics Teacher EC-4 Texas Examinations for Master Teachers (TExMaT)	Not Applicable: Not an Initial Certificate]
§239.102	Master Mathematics Teacher: Grades 4-8	088 Master Mathematics Teacher 4-8 TExMaT	Not Applicable: Not an Initial Certificate]
§239.102	Master Mathematics Teacher: Grades 8-12	089 Master Mathematics Teacher 8-12 TExMaT	Not Applicable: Not an Initial Certificate]
§239.101	Master Reading Teacher: Early Childhood-Grade 12	085 Master Reading Teacher EC-12 TExMaT	Not Applicable: Not an Initial Certificate]
§239.103	Master Technology Teacher: Early Childhood-Grade 12	086 Master Technology Teacher EC-12 TExMaT	Not Applicable: Not an Initial Certificate]
§239.104	Master Science Teacher: Early Childhood-Grade 4	090 Master Science Teacher EC-4 TExMaT	Not Applicable: Not an Initial Certificate]
§239.104	Master Science Teacher: Grades 4-8	091 Master Science Teacher 4-8 TExMaT	Not Applicable: Not an Initial Certificate]
§239.104	Master Science Teacher: Grades 8-12	092 Master Science Teacher 8-12 TExMaT	Not Applicable: Not an Initial Certificate]

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Mathematics and Science			
§233.4	Mathematics: Grades 4-8	115 Mathematics 4-8 TExES	160 PPR EC-12 TExES or 2016 edTPA: Middle Childhood Mathematics (pilot exam)
§233.4	Science: Grades 4-8	116 Science 4-8 TExES	160 PPR EC-12 TExES or 2017 edTPA: Middle Childhood Science (pilot exam)
§233.4	Mathematics/Science: Grades 4-8	114 Mathematics/ Science 4-8 TExES	160 PPR EC-12 TExES or 2016 edTPA: Middle Childhood Mathematics (pilot exam) or 2017 edTPA: Middle Childhood Science (pilot exam)
§233.4	Mathematics: Grades 7-12	235 Mathematics 7-12 TExES	160 PPR EC-12 TExES or 2005 edTPA: Secondary Mathematics (pilot exam)
§233.4	Science: Grades 7-12	236 Science 7-12 TExES	160 PPR EC-12 TExES or 2006 edTPA: Secondary Science (pilot exam)
§233.4	Life Science: Grades 7-12	238 Life Science 7-12 TExES	160 PPR EC-12 TExES or 2006 edTPA: Secondary Science (pilot exam)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Mathematics and Science (continued)			
§233.4	Physical Science: Grades 6-12	237 Physical Science 6-12 TExES	160 PPR EC-12 TExES or 2006 edTPA: Secondary Science (pilot exam)
§233.4	Physics/Mathematics: Grades 7-12	243 Physics/Mathematics 7-12 TExES	160 PPR EC-12 TExES or 2005 edTPA: Secondary Mathematics (pilot exam) or 2006 edTPA: Secondary Science (pilot exam)
§233.4	Mathematics/Physical Science/Engineering: Grades 6-12	274 Mathematics/Physical Science/Engineering 6-12 TExES	160 PPR EC-12 TExES or 2005 edTPA: Secondary Mathematics (pilot exam) or 2006 edTPA: Secondary Science (pilot exam) or 2143 edTPA: Technology and Engineering Education (pilot exam)
§233.4	Chemistry: Grades 7-12	240 Chemistry 7-12 TExES	160 PPR EC-12 TExES or 2006 edTPA: Secondary Science (pilot exam)
Music			
§233.10	Music: Early Childhood-Grade 12	177 Music EC-12 TExES	160 PPR EC-12 TExES or 2021 edTPA: K-12 Performing Arts (pilot exam)
Physical Education			
§233.12	Physical Education: Early Childhood-Grade 12	158 Physical Education EC-12 TExES [last operational date 8/31/2021 Starting 9/1/2021 258 Physical Education EC-12 TExES]	160 PPR EC-12 TExES or 2011 edTPA: Physical Education (pilot exam)

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Principal and Superintendent			
§241.20	Principal as Instructional Leader: Early Childhood-Grade 12	268 Principal as Instructional Leader TExES	Educational Testing Service (ETS) 368 Performance Assessment for School Leaders (PASL)
§241.35	Principal as Instructional Leader Endorsement	Not Applicable: Not an Initial Certificate (Individuals must already hold a valid certificate to serve in the role of principal to be eligible for this endorsement.)	Educational Testing Service (ETS) 368 Performance Assessment for School Leaders (PASL)
§241.60	Principal: Early Childhood-Grade 12	268 Principal TExES	Not Applicable: Not an Initial Certificate.]
§242.20	Superintendent: Early Childhood-Grade 12	195 Superintendent TExES	Not Applicable: Not an Initial Certificate
Social Studies			
§233.3	Social Studies: Grades 4-8	118 Social Studies 4-8 TExES	160 PPR EC-12 TExES or 2019 edTPA: Middle Childhood History/Social Studies (pilot exam)
§233.3	Social Studies: Grades 7-12	232 Social Studies 7-12 TExES	160 PPR EC-12 TExES or 2004 edTPA: Secondary History/Social Studies (pilot exam)
§233.3	History: Grades 7-12	233 History 7-12 TExES	160 PPR EC-12 TExES or 2004 edTPA: Secondary History/Social Studies (pilot exam)
Speech Communications			
§233.3	Speech: Grades 7-12	129 Speech 7-12 TExES	160 PPR EC-12 TExES or 2003 edTPA: Secondary English-Language Arts (pilot exam)
Special Education			
§233.8	Special Education: Early Childhood-Grade 12	161 Special Education EC-12 TExES	160 PPR EC-12 TExES or 2012 edTPA: Special Education (pilot exam)
§233.8	Special Education Supplemental	163 Special Education Supplemental TExES	Not Applicable: Not a Stand-alone Certificate

Certificate TAC Reference	Certificate Name	Required Content Pedagogy Test(s)	Pedagogical Requirement(s)
Special Education (continued)			
§233.8	Teacher of the Deaf and Hard of Hearing: Early Childhood-Grade 12	181 Deaf and Hard of Hearing EC-12 TExES and 072 TASC or 073 TASC-ASL (required for assignment but not for certification)	160 PPR EC-12 TExES or 2012 edTPA: Special Education (pilot exam)
§233.8	Teacher of Students with Visual Impairments Supplemental: Early Childhood-Grade 12	182 Visually Impaired TExES and <u>183 Braille TExES</u> [183 Braille TExES] or 283 Braille TExES	Not Applicable: Not a Stand-alone Certificate
Theatre			
§233.10	Theatre: Early Childhood-Grade 12	180 Theatre EC-12 TExES	160 PPR EC-12 TExES or 2021 edTPA: K-12 Performing Arts (pilot exam)

INFORMATION MATERIALS

STATE BOARD OF EDUCATION OPERATING RULES
(Amended September 13, 2019)

CHAPTER 1. BOARD ORGANIZATION

The statutory citation for this chapter is the Texas Education Code, §7.107.

§1.1. Officers of the Board.

(a) Selection.

- (1) The vice chair and secretary of the board shall be elected in accordance with Texas Education Code, §7.107, to serve for a term of two years and until their successors are elected.
- (2) In case of death or resignation of the vice chair or the secretary of the board, the board shall elect a board member to fill the vacancy for the unexpired term of that officer at the next board meeting. Either of these officers may be removed from office by a vote of not less than two-thirds of the membership of the board.

(b) Duties.

- (1) Chair. The chair shall preside at meetings and perform all other duties prescribed by law, by board rule, or by board direction.
- (2) Vice chair. The vice chair shall perform the duties of the chair in case of absence or disability of the chair and other duties as the chair may request. Should the office of the chair become vacant, the vice chair shall serve as chair until a successor has been appointed by the governor.
- (3) Secretary. The secretary shall perform all duties as required by law and such other duties as the chair may request.

§1.2. Committees of the Board.

- (a) The standing committees of the board and their areas of oversight are:

Committee of the Full Board

1. Public testimony
2. Establishment of essential knowledge and skills (TEKS)
3. Adopt instructional materials

Committee on Instruction

1. Establishment of curriculum and graduation requirements
2. Curriculum implementation (including procedures concerning dyslexia and related disorders)
3. Instructional materials proclamations
4. Student assessment program implementation

5. General education
6. Education of individuals with disabilities
7. Gifted and talented education
8. Adult education
9. Library standards
10. Texas School for the Blind and Visually Handicapped/Texas School for the Deaf

Committee on School Finance/Permanent School Fund

1. State and federal funding issues
2. Financial budgeting, reporting, and regulation
3. Contract and grant approval
4. Instructional materials financing and operations
5. Review commissioner's annual FSP budget
6. Community education funding
7. Oversight of the Bond Guarantee Program
8. Permanent School Fund management oversight, including audit responsibility, investment objectives, and investment decisions

Committee on School Initiatives

1. Long-range plans required by statute
 2. Educational technology and telecommunications
 3. Review and evaluation of charter school applications, revisions, and amendments the commissioner of education proposes to grant
 4. State Board for Educator Certification rules review
 5. School board member training policy
 6. Hearing examiners
 7. Military reservation and special school districts
 8. Extracurricular activities
 9. Home-rule school district probation and revocation
- (b) Amendments to the areas of committee oversight reflecting new or changing board responsibilities may be made during the board's periodic operating rules review or by means of resolution addressing the change in responsibilities should such change occur between the operating rules review.
- (c) Committees may receive information, investigate, study and report to the board. The board may from time to time define by resolution the areas of oversight of each committee as may be necessary. Each committee shall review and make recommendations on the board agenda items falling under its areas of oversight; except that the chair of the board, in consultation with the respective committee chair, may designate any board agenda item for review and recommendation by the Committee of the Full Board.
- (d) The Committee of the Full Board shall be composed of all members of the board, and the chair of the board shall be the chair of the Committee of the Full Board.
- (e) The Committees on Instruction, School Finance/Permanent School Fund, and School Initiatives shall be composed of five members selected by the officers of the board. Each member will serve on one committee in addition to the Committee of the Full Board. The

officers of the board shall request in writing the committee choices of the members ranked in order of preference and shall make committee assignments in the public view for terms of two years at the organizational meeting after the qualification of new members as the next order of business following election of board officers and adoption of rules. Vacancies shall be filled in a similar fashion. In addition to preference, the officers of the board shall also consider seniority (total years of service), ethnicity balance, gender balance, and relevant qualifications specific to a committee assignment in making committee assignments. Each committee shall elect a chair from among its members and the chair may appoint a vice chair. An officer of the board is not eligible to serve as the chair of a standing committee.

- (f) Ad hoc committees. Ad hoc committees (i.e., task forces) may be constituted from time to time as directed by a vote of the board or by the chair to perform such duties as the board or chair may assign. The personnel and length of service of ad hoc committees shall be designated by the chair unless otherwise directed by a vote of the board. No action taken by any ad hoc committee shall be final or binding upon the board unless otherwise directed by a vote of the board.
- (g) From time to time committees may find it necessary to request legal opinions, comprehensive studies, or reports to be prepared by the staff to aid the committees in their deliberations. To ensure clarity and coordination, all such requests shall be directed to the Division of State Board of Education Support and shall be reflected in the minutes of the committee meeting. The Chair or the Commissioner may request the Attorney General to issue an opinion under Texas Government Code §402.042.

§1.3. Board Member Seating Selection.

With the exception of the chair, vice chair, and secretary, the seating of board members will be by State Board of Education districts. The seating for the remaining 12 members will be rotated annually at the first board meeting of the calendar year. Any member with a special need may exchange seats with another board member who is in agreement with that exchange.

CHAPTER 2. MEETINGS

The statutory citations for this chapter are the Texas Education Code, §§7.055, 7.106, 7.107, 7.110, and 39.030, and the Texas Government Code, Title 5, Open Government; Ethics, Subtitle A, Open Government, Chapter 551, Open Meetings.

§2.1. Regular Meetings of the Board.

In accordance with Texas Education Code, §7.106, four regular meetings of the board a year shall be held in Austin, Texas. If a quorum is not present for a meeting, the meeting shall be recessed or adjourned and all items on the agenda shall be heard at a subsequent meeting.

§2.2. Special Meetings of the Board.

Special meetings of the board may be held at times and places as ordered by the chair during a regular meeting, or special meetings may be called by the chair of the board to be held at a time and place the chair shall designate.

§2.3. Open Meetings.

Regular, special, and committee meetings of the board shall be open to the public; however, the board or board committees may meet in executive session in accordance with law and these rules. Open meetings of the board and standing committees shall be broadcast live over the Internet.

§2.4. Executive Sessions.

Executive sessions of the board or of board committees are meetings with only board members and persons authorized by law. Executive sessions shall be held in accordance with Texas Government Code, Chapter 551, Open Meetings.

§2.5. Agendas.

- (a) The commissioner of education shall prepare and submit to each member of the board, prior to each meeting, a draft agenda schedule, listing item titles with short summaries of each item. Other than as is provided in subsection (b) and (c), all agenda items are subject to the approval of the chair of the board. Materials supplementing the agenda may be included. Official agendas will be available the day of the board meeting.
- (b) The chairs of the Committee on Instruction, Committee on School Finance/Permanent School Fund, Committee on School Initiatives, and ad hoc committees shall collaborate with the board chair regarding items to be placed on their respective committee agendas. Committee agendas shall include statutorily mandated motions, items assigned to the committee by the board chair, items posted at the discretion of the committee chair and items voted on as set out in subsection (c) below. Committee chairs may post discussion items per their discretion, but action items must be approved by the board chair, subject to the process set out in (c) below.

- (c) Any member of the board may request that a committee chair, other than the Committee of the Full Board, place an item on the agenda of that chair's committee, as either a discussion item or an action item. If the committee chair agrees, the item is placed on the agenda of that chair's committee in accordance with the member's request, subject to the approval of the board chair. If the committee chair denies the member's request, the member may appeal the denial to the board chair. If the board chair denies the request, the member may appeal the denial to the board. If the board approves the request, it is placed on the agenda of the committee to which the request was made at the next meeting of that committee.
- (d) A subject on the agenda that is outside the scope of the board's authority may only be considered by the board or the Committee of the Full Board by a vote of a majority of the membership of the board. The chair, in consultation with Agency legal counsel, shall make a determination of whether an item is outside the scope of the board's authority when preparing the agenda. Any member may move to place an item determined by the chair to be outside the scope of the board's authority on the agenda for a subsequent meeting.

§2.6. Official Transaction of Business.

- (a) The board shall transact official business only when in session with a quorum present. Unless otherwise provided by law, in order for a board action to be final, it must be approved by a majority of the board members present and voting.
- (b) The chair may authorize the board to meet via videoconference call. As required by Government Code §551.127(c), if videoconference calling technology is used, the meeting location where the presiding officer of the meeting is present must be open to the public, except during executive sessions. The chair may limit the number of remote videoconference locations in the interest of decorum and teleconference capacity.
- (c) No posters, props, or other visual displays are allowed by board members within the meeting rooms without permission from the presiding chair.

§2.7. Rules of Order.

- (a) The board shall observe *Robert's Rules of Order, Newly Revised*, except as otherwise provided by board rules or by statute.
- (b) The presiding chair shall preserve order and decorum during meetings. In case of disturbance or disorderly conduct in the public gallery, the chair may order that any disruptive individuals be cleared from the area.
- (c) No signs, placards, flags, noisemakers, or other objects of a similar nature shall be permitted in the audience gallery area.
- (d) No applause, outburst or other demonstration by any spectator shall be permitted during the public testimony, public hearing or debate portion of any State Board of Education meeting. After warnings to the audience to refrain from such demonstrations, the presiding chair may direct that disruptive individuals in the gallery area be removed as necessary to preserve decorum during meetings.

- (e) Supporters of a testifier may not gather behind the podiums used for testimony. Testifiers are free to use a portion of their testimony time to acknowledge supporters seated in the audience.

§2.8. Minutes.

The official minutes of the board shall be kept by the office of the commissioner of education or the commissioner's designee and shall be available to any citizen desiring to examine them. Official minutes are those which the board has approved and which carry the original signature of the secretary of the board.

§2.9. Resolutions.

- (a) A member wishing to offer a resolution shall give notice of the resolution by submitting a copy to the chair and the Division of State Board of Education Support not less than four weeks prior to the Monday of the week during which the meeting at which the resolution is to be considered. The board shall consider the resolution and any germane amendments at the next meeting following such notice.
- (b) Titles for congratulatory, commendatory or other non-substantive resolutions shall be submitted by the timelines prescribed in this section with resolution text following at date and time consistent with the staff's pre-meeting preparation timeline.
- (c) The board may consider a resolution which expresses an opinion related to specific instructional materials or which expresses concerns as to the appropriateness of specific instructional materials for certain ages or populations. Resolutions considered under this subsection must conform to the following:
 - (1) The resolution shall be submitted in compliance with subsection (a) of this section.
 - (2) Board action on a resolution expressing an opinion related to specific instructional materials may only be considered after final action has been taken concerning placement of the specific instructional materials on the list of adopted instructional materials for use in the public schools of Texas. Board action relative to instructional materials resolutions must take place within 90 days of adoption of the specific instructional materials under 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, §66.66(c).
 - (3) Nothing in the resolution shall be construed to replace or modify any final action taken by the board under 19 TAC Chapter 66.
 - (4) The board may adopt a resolution expressing an opinion related to instructional materials based on the following criteria:
 - (A) Instructional materials should present the most current factual information accurately and objectively without editorial opinion or bias by the authors. Theories should be clearly distinguished from fact and presented in an objective educational manner.

- (B) Instructional materials should promote citizenship, patriotism, understanding of the essentials and benefits of the free enterprise system, respect for recognized authority, and respect for individual rights. The materials should not include selections or works that encourage or condone civil disorder, social strife, or disregard of the law. Violence, if it appears, should be treated in the context of its cause and consequence. It should not appear for reasons of unwholesome excitement or sensationalism.
 - (i) Instructional materials should present positive aspects of the United States and its heritage.
 - (ii) When significant political or social movements in history generate no clear consensus, instructional materials should present balanced and factual treatment of the positions.
 - (iii) Free enterprise means an economic system characterized by private or corporate ownership of capital goods; investments that are determined by private decision rather than by state control; and prices, production, and the distribution of goods that are determined in a free market.
- (C) Instructional materials should not include blatantly offensive language or illustrations.
- (D) Instructional materials should treat divergent groups fairly without stereotyping and reflect the positive contributions of all individuals and groups to the American way of life. Illustrations and written materials should avoid bias toward any particular group or individual and present a wide range of goal choices. Particular care should be taken in the treatment of ethnic groups, issues related to the aging and aged, roles of men and women, the dignity of workers, and respect for the work ethic.
 - (i) Instructional materials should not encourage life-styles deviating from generally accepted standards of society.
 - (ii) Instructional materials should provide an objective view of cultural confluence and include information needed to develop mutual understanding and respect among all elements of our population. Materials should reflect an awareness that culture and language variation does exist and can be used to promote successful learning.
 - (iii) Instructional materials should present examples of men and women participating in a variety of roles and activities and also shall present the economic, political, social, and cultural contributions of men and women, past and present.
 - (iv) Instructional materials that treat aspects of the world of work should reflect the positive contributions of all types of careers to the American economic system and way of life. People presented should reflect varieties of work and be treated without bias toward particular kinds of work.

- (v) Instructional materials should present traditional and contemporary roles of men, women, boys, and girls.
 - (vi) Instructional materials should present balanced treatment of issues related to aging and the aged.
- (5) A representative of the publisher of the specific instructional material shall be given the opportunity to address the board prior to action by the board on such a resolution.
 - (6) A copy of any resolution passed by the board expressing an opinion related to specific instructional material shall be provided to the board president and superintendent of each school district in Texas.

§2.10. Oral Public Testimony in Connection with Regular Board and Committee Meetings.

(a) General Provisions.

- (1) The board shall provide opportunity for oral public testimony at regular committee meetings, special meetings, and at regularly scheduled meetings of the State Board of Education.
- (2) Work session and ad hoc committee meetings are exempt from this requirement.
- (3) The presiding chair shall take appropriate action to avoid unduly repetitious testimony.
- (4) The presiding chair shall assure that members of the public with differing viewpoints have reasonable access to address the board and take steps to ensure that individuals will be given priority over registered lobbyists.
- (5) The presiding chair shall determine which speakers will be heard and the order in which they will be heard if the number exceeds that number which may reasonably be expected to testify in the allotted time for presentations. The presiding chair shall also determine whether speakers who did not register or who registered late will be heard and whether persons asking to testify as a substitute for a registered speaker may do so.
- (6) The board, without debate, may allow a person to testify for clarification and informational purposes, whether or not he/she has registered or previously testified. The person is not required to honor the request.

(b) Registration Procedures.

- (1) Individuals may register between the hours of 8 a.m. on the Friday preceding the board meeting and 5 p.m. (Central Time) on the Monday preceding the board meeting on the agency website at <https://tea.texas.gov/PublicTestimonySBOE/>, or by facsimile at (512) 936-4319, or, during normal operating hours, by telephone at (512) 463-9007 or in person at the William B. Travis (WBT) State Office Building, 1701 N. Congress, room 1-109, Austin, Texas 78701.

- (2) The speaker shall provide his or her name and organizational affiliation, if any, contact telephone number, mailing address, email address, and indicate which item or topic the speaker will address and viewpoint on the topic; and the speaker will disclose if he or she is a lobbyist registered with the Texas Ethics Commission.
 - (3) A person may register himself or herself, and one other person. Organizations may not register more than two persons per item.
 - (4) Those registering online will receive an email confirming the registration during the next business day.
 - (5) Registrations will be listed based upon registration date and time or alternating points of view in order of registration date and time.
 - (6) Late registration will be accepted until 30 minutes before the scheduled start of a meeting, however late registrants are not guaranteed an opportunity to testify due to time constraints.
 - (7) Speakers will be informed if it appears that time constraints will not permit all speakers to make their presentation within the allotted time.
 - (8) All speakers shall provide thirty-five (35) collated or stapled copies of their testimony. Registered speakers who are unable to make their presentations due to time constraints are encouraged to provide thirty-five (35) copies of their testimony for distribution to board members and agency executive staff. Written testimony will not be attached to committee minutes.
- (c) Oral Public Testimony to Committees.
- (1) Oral public testimony to committees is limited to the topics posted for action or discussion on committee agendas at that specific committee meeting.
 - (2) Three minute time limits on individual oral testimony will be imposed unless modified by the presiding chair.
 - (3) The presiding chair shall designate whether oral public testimony shall be taken at the beginning of the meeting or at the time the related item is taken up by the committee after staff has presented the item.
 - (4) The presiding chair shall take steps to ensure that individuals will be given priority over registered lobbyists. The committee, without debate, may allow a person to testify for clarification and informational purposes, whether or not he/she has registered or previously testified. The person is not required to honor the request.
- (d) Oral Public Testimony to the General Meeting of the Board.
- (1) Oral public testimony at general meetings of the State Board of Education is limited to topics that are *not* posted for action or discussion at the corresponding regular committee meetings or information published in the information section of the agenda.

- (2) Thirty (30) minutes shall be allotted for oral public testimony, excluding the questions and answers, at the beginning of each board meeting, unless modified by a majority vote of the board. Three minute time limits on individual oral testimony will be imposed unless modified by the presiding chair. Testimony invited by board members shall not be counted against the time allotted for oral public testimony. Agency staff shall inform the presiding chair and any affected registered speakers prior to the meeting if time constraints may not allow some registered speakers to testify.
- (3) The presiding chair shall take steps to ensure that individuals will be given priority over registered lobbyists. The board, without debate, may allow a person to testify for clarification and informational purposes, whether or not he/she has registered or previously testified. The person is not required to honor the request.

§2.11. Written Testimony in Connection with Regular Board and Committee Meetings.

- (a) Persons may file written testimony with regard to any committee or board agenda item. Any written testimony or comments shall identify the date of the meeting; the subject of the comments; the name of the author; the name of the author's organizational affiliation, if any; and indicate whether the author is a lobbyist registered with the Texas Ethics Commission.
- (b) If the written testimony is submitted at the regular board or committee meeting, thirty-five (35) collated or stapled copies shall be provided for distribution to board members and agency executive staff. Written testimony will not be attached to the board minutes.
- (c) Persons who were unable to attend or to testify at a committee or board meeting due to time constraints may provide thirty-five (35) collated or stapled copies of their testimony to agency staff for distribution to board members and agency executive staff.

§2.12. Public Hearings.

- (a) Types of Public Hearings.
 - (1) Hearings regarding proposed board rules. The board shall conduct a public hearing on a substantive rule if a hearing is requested by at least 25 persons, a governmental subdivision or agency, or an association having at least 25 members. Testimony is restricted to comments regarding the proposed action. The hearing must be set to take place before any action is adopted. The public hearing shall be conducted before the appropriate board committee as determined by the board chair in accordance with the areas of oversight defined in board operating rules.
 - (2) Other types of hearings. The board may also hold public hearings on proposed actions, such as those relating to instructional materials issues. The public hearing shall be conducted before the appropriate board committee as determined by the board chair in accordance with the areas of oversight defined in board operating rules. Public hearings regarding the instructional materials adoption process are governed by 19 TAC §66.60.
- (b) Speakers shall preregister in accordance with the procedures set out in §2.10(b).

- (c) The presiding chair shall establish the procedures for conducting the public hearing. These procedures shall include, but are not limited to, the following:
 - (1) Providing for presentations from invited persons or an introduction from staff;
 - (2) Providing that preregistered speakers are heard in order of registration times and dates, or requiring alternating points of view in order of registration times and dates;
 - (3) Establishing time limits for speakers, generally three minutes each;
 - (4) Adjourning the hearing at the end of the allotted time period listed in the agenda item or any extension granted by a vote of the majority of the board or appropriate committee.
- (d) Persons who testify at a public hearing shall bring thirty-five (35) collated or stapled copies of their testimony for distribution to board members and agency executive staff.
- (e) Persons who were unable to testify at a public hearing due to time constraints may provide thirty-five (35) collated or stapled copies of their testimony to agency staff for distribution to board members and agency executive staff.
- (f) Prior to the meeting, agency staff shall inform the presiding chair and shall attempt to inform any affected registered speakers if time constraints may not allow some registered speakers to testify.

§2.13. Public Comments Regarding Proposed Rulemaking.

All interested persons have a reasonable opportunity to submit data, views and arguments, prior to the board adoption of any rule. Public comments regarding proposed board rules may be submitted as provided in the notice of proposed rulemaking published in the *Texas Register*. The deadline for submitting public comments is 5:00 p.m. on Friday the week prior to the start of the board meeting. The board will also take registered oral and written comments on proposed rulemaking at the appropriate committee meeting.

CHAPTER 3. TRAVEL AND EXPENSES

The statutory citations for this chapter are the Texas Education Code, §7.105, Texas Government Code, Chapter 660, and the General Appropriations Act.

§3.1. Reimbursement of Expenses.

- (a) Members of the State Board of Education receive no salary but are reimbursed for all expenses incurred for attending regular and special meetings of the board and of board committees.
- (b) All reimbursements for expenditures shall be in accordance with Texas Education Code, §7.105(b), Texas Government Code, Chapter 660, the General Appropriations Act, and these rules.
- (c) Only expenses of board members may be reimbursed. Expenses for spouses, family, or other persons traveling with board members are not reimbursable.
- (d) Board members must submit receipts for the following expenses:
 - (1) public transportation (excluding receipts for bus, taxi, or limousine);
 - (2) car rental;
 - (3) lodging; and
 - (4) conference registration fees (which may not include banquets, books, or materials).
- (e) Lodging receipts must show the rate for single occupancy plus tax which will be the maximum reimbursable amount per day for lodging.
- (f) Receipts are not required to claim expenses for meals; however, the General Appropriations Act provides that "none of the funds appropriated under this act for travel expenses may be expended for alcoholic beverages" and no such expenses may be claimed for reimbursement.
- (g) Other official travel expenses which board members may claim include the following when the expenses are required for the conduct of state business:
 - (1) parking fees (including personal vehicles);
 - (3) notary fees for official documents; and
 - (4) wireless connection.

- (h) Board members may not claim reimbursement for expenses such as the following:
 - (1) laundry or other personal items;
 - (2) tips or gratuities of any kind; and
 - (3) alcoholic beverages.
- (i) All claims for reimbursement will be reviewed by agency accounting personnel to ensure compliance with the requirements of the appropriations act, and any appropriate adjustments to claims shall be made by staff.
- (j) A yearly budget shall be established for travel of board members. The budgeted amount would include an allotment of travel funds for board members to attend board meetings and committee meetings, and an allotment for in-district, out-of-district, and out-of-state meetings. An additional allotment shall be budgeted for travel of the chair when representing the State Board of Education at meetings. When there is a change in office during the fiscal year, the travel budget will be reassigned to the new board member.
- (k) A board member may be reimbursed for travel expenses for attending activities other than State Board of Education meetings and committee meetings provided that the board members are in compliance with the following procedures:
 - (1) In-District and Out-of-District Travel. In-district and out-of-district travel is at each member's discretion. Prior approval is not required; however, any travel for which reimbursement is requested must be directly related to the duties and responsibilities of the State Board of Education. Any requests for reimbursement, directly or indirectly related to seeking election to office, will not be allowed.
 - (2) Out-of-State Travel. Prior approval is required by the officers of the board (chair, vice chair, and secretary).
- (l) A board member may be reimbursed for travel expenses incurred while serving on any board, council, or commission or serving in any official board position as an appointee for specific administrative functions when appointed by the State Board of Education or its chair, or subject to approval of the board or its officers of the board.
- (m) None of the funds appropriated in the General Appropriations Act shall be used for influencing the outcome of any election, or the passage or defeat of any legislative measure.

§3.2. Travel Arrangements and Hotel Reservations for State Board of Education Meetings.

- (a) Board members shall be responsible for making their own arrangements for travel to and from board meetings. Agency travel coordinators are available for assistance.
- (b) A Division of State Board of Education Support staff member or his/her designee will make guaranteed hotel reservations for each board member upon request.
- (c) Any change in or cancellation of reservations shall be the responsibility of the individual board member in whose name the reservations were made. Board members who wish to change or cancel their reservations must contact the hotel directly or call the State Board of Education support office. All bills received by the agency for unused or uncanceled reservations will be forwarded for payment to the board member in whose name the reservations were made.

§3.3. Acceptance of Gifts and/or Grants for Charter School Evaluation.

- (a) Purpose. The State Board of Education (SBOE) may accept a gift and/or grant for the limited purpose of expenses associated with evaluating an applicant for an open-enrollment charter school.
 - (1) An entity making a gift and/or grant under this section may not:
 - (A) limit the use of the funds to any individual applicant, cycle or class of applicants;
 - (B) be a charter operator in this or any other state, a management company, service provider or vendor of any kind to charter schools in this or any other state;
 - (C) have common board members or corporate members with any entity operating a charter in Texas or applying to operate a charter in Texas;
 - (D) be an individual required to register as a lobbyist under Chapter 305, Government Code; or
 - (E) be an employee, attorney, contractor or other agent of any kind to charter schools in this or any other state.
 - (2) An entity making a gift and/or grant under this section may not do so if the source of funds used for the gift and/or grant were received from an entity that could not make a gift and/or grant under this section.
 - (3) For purposes of this section, a spouse or dependent child of an individual prohibited from making a gift and/or grant is also prohibited.
 - (4) For purposes of this section, an entity includes any legal entity such as corporations, individuals and other business associations. An individual is limited to a natural person.

- (5) An entity making a gift and/or grant shall certify that it has complied with all requirements of this section in a format approved by the board chair.
- (b) Procedure. The SBOE may accept a gift and/or grant under this section only by an affirmative vote of the board.
- (1) A charter may not be evaluated using funds under this section unless the commissioner has:
 - (A) proposed to award a charter to that applicant pursuant to Section 12.101(b); or
 - (B) requested the participation of individual board members in the agency's preliminary evaluation of an applicant.
 - (2) The commissioner shall receive, disburse and account for funds accepted by the board.
 - (3) Funds accepted under this section may be used solely to pay reasonable travel expenses, including meals and accommodations, for SBOE members and TEA staff as necessary to evaluate applicants for open-enrollment under this section. Unless approved by the board chair and the commissioner, travel expenses are limited to those available for travel by SBOE members or state employees.
 - (4) In making decisions under this section, the board chair will consult with the board member acting as a liaison under Section 12.101(b). The board chair will also consult with the chair of the Committee on School Initiatives, unless doing so would create a quorum of a committee of the board. A decision by the board chair under this section is final.
 - (5) Board members evaluating a charter applicant under this section shall be selected by the board chair. The board chair will, to the extent possible, give preference to board members whose districts include proposed locations at which the charter would operate. Under no circumstances will a quorum of the board or a committee of the board participate in an evaluation under this section.
 - (6) The board chair may request that relevant TEA employees accompany board members in evaluating charter applicants under this section. The commissioner must approve participation of agency employees.
 - (7) Except as provided by this subsection, board members and TEA staff may not accept anything of value from an applicant and shall limit contact with the applicant and its employees and representatives to the actual investigation of the charter. The board chair may authorize acceptance of reasonable local transportation and meals from the applicant as necessary to facilitate the evaluation.
 - (8) In addition to board members and TEA staff, the board chair may authorize other professionals to participate in an evaluation under this section. Such a professional may not be an individual or entity unable to donate funds under subsection (a) and is subject to all conditions and limits imposed by this section on board members.

- (c) Evaluation. Each board member will individually report to the Committee on School Initiatives regarding his/her evaluation of a proposed charter prior to consideration of the charter by the board under §7.102(c)(9). The Committee on School Initiatives will develop a standard form for use by board members in evaluating a charter under this section.
- (d) Reporting. Expenses reimbursed for each board member, TEA staff or other professionals shall be made publicly available and reported as appropriate on a board member's personal financial statement.

CHAPTER 4. CONDUCT AND PUBLIC RELATIONS

The statutory citations for this chapter are the Texas Education Code, §7.108; the Texas Government Code, §305.006, and Chapter 572, Personal Financial Disclosure, Standards of Conduct, and Conflict of Interest; and the Texas Election Code, Chapter 251, General Provisions.

§4.1. Standards of Conduct and Conflicts of Interest.

- (a) Personal interest in board actions. Whenever a board member has a financial interest in any matter to be voted upon by the board, such a member shall state at an open meeting that he or she has such an interest in the matter and shall abstain from voting and discussion concerning the matter.
- (b) The Permanent School Fund ethics policy governs the conduct of State Board of Education members with respect to the investment and management of the Permanent School Fund.

§4.2. Press and Public Relations.

- (a) Prior to each State Board of Education meeting, the agenda shall be made available by agency staff to the capitol press corps; governor's office; Legislative Budget Board; Legislative Reference Library; School Land Board; Texas Higher Education Coordinating Board; regional education service centers; and state offices of professional education organizations which have requested the agenda.
- (b) A press table shall be provided at meetings of the State Board of Education and press representatives shall be supplied with copies of the official agenda for the meeting and other materials relating to specific agenda items.
- (c) The State Board of Education shall seek to maintain open relations with the press by answering reporters' questions frankly and by providing official statements through press releases and answers to follow-up inquiries.

§4.3. Disclosure of Campaign Contributions and Gifts.

- (a) Any person, corporation, or other legal entity which proposes to enter into a contract with or applies for a grant, contract, or charter which may be granted by the State Board of Education shall disclose whether, at any time in the preceding four years, the person, corporation, or other legal entity has made a campaign contribution to a candidate for or member of the State Board of Education. Disclosure shall be made in writing to the commissioner of education 14 calendar days prior to consideration by the board or any committee of a contract, grant, or charter.

- (b) A person, corporation, or other legal entity which proposes to enter into a contract with or applies for a grant, contract, or charter which may be granted by the State Board of Education shall disclose in the same manner any benefit conferred on a candidate for or member of the State Board of Education during the preceding four years. A benefit need not be disclosed if the aggregate value of benefits conferred on a candidate for or a member of the State Board of Education during the preceding four years does not exceed \$250, or a different limit set by §572.023(b)(7), Texas Government Code. This requirement applies whether or not the person, corporation, or other legal entity is required to report the expenditure to the Texas Ethics Commission. For purposes of this section, a benefit is not conferred if the candidate for or a member of the State Board of Education has paid for the member's own participation, as well as any participation by other persons for the direct benefit of any business in which the member has a substantial interest as defined under Texas Government Code §572.005 (1) - (7).
- (c) In this section:
- (1) "person, corporation, or other legal entity" includes:
 - (A) any individual who would have a "substantial interest" in the person, corporation, or other legal entity as that term is defined in Texas Government Code, §572.005 (1) - (6);
 - (B) an attorney, representative, registered lobbyist, employee, or other agent who receives payment for representing the interests of the person, firm, or corporation before the board or to board members, or whose duties are directly related to the contract, grant, or charter; or
 - (C) an individual related within the first degree by affinity or consanguinity, as determined under Chapter 573, Government Code, to the person covered by (c)(1).
 - (2) "contract, grant, or charter" means any application to enter into a contractual relationship with or otherwise receive funding from the State Board of Education, including without limitation contracts for investment advisors, consultants, or investment managers for the Permanent School Fund and applicants for charters to operate open enrollment charter schools.
 - (3) "campaign contribution" has the meaning defined in Texas Election Code, §251.001.
 - (4) "benefit" has the meaning defined in Texas Penal Code, §36.01.
 - (5) "candidate for or a member of the State Board of Education" includes a person related within the first degree of affinity or consanguinity, as determined under Chapter 573, Government Code, to a candidate for or a member of the State Board of Education.
- (d) A person, corporation, or other legal entity has a continuing duty to report contributions or expenditures made through the term of a contract, grant, or charter and shall within 21 calendar days notify the commissioner of education and the board chair upon making a contribution or expenditure covered by this section.

- (e) Failure to disclose a contribution or expenditure under this section shall be grounds for canceling or revoking the contract, grant, or charter in the discretion of the board. Only those contributions or expenditures made after the effective date of this rule are required to be disclosed.
- (f) This section does not affect the validity of contracts, grants, or charters existing on its effective date but does apply to the renewal or extension of any contract, grant, or charter.
- (g) Before distributing bids or applications for a contract with the board, staff will provide any disclosure made under subsection (a) or (b) to a board member to whom the disclosure applies. A board member shall have 10 calendar days to provide a written statement relating to the disclosure for distribution along with all disclosures.
- (h) An SBOE member shall on April 15 of each year submit a list of businesses that the SBOE member has a substantial interest in as defined in Texas Government Code §572.005 (1) - (7) and all DBAs or assumed names of any such businesses. If any change occurs in the identities of businesses that an SBOE member has a substantial interest in, the SBOE member shall submit an amendment within 30 calendar days of the date of such change. A person, corporation, or other legal entity which proposes to enter into a contract with or applies for a grant, contract, or charter that may be granted by the State Board of Education shall be provided the combined list of all board members and shall disclose any campaign contribution or benefit under subsections (a) or (b) on behalf of any business in which an SBOE member has a substantial interest.

§4.4. Instructional Materials Submitted to the Texas Resource Review.

- (a) An SBOE member shall not nominate instructional materials for submittal to the Texas Resource Review without a majority vote of the board endorsing said nomination.

CHAPTER 5. RULES AND THE RULEMAKING PROCESS

The statutory citation for this chapter is the Texas Government Code, Chapter 2001, Subchapter B; Texas Government Code, Chapter 2002, Subchapter B; Texas Education Code, §7.102(e)-(f).

§5.1. State Board of Education Rules.

- (a) An action of the board to adopt a rule under the Texas Education Code is effective only if the rule's preamble published in the *Texas Register* includes a statement of the specified statutory authority contained in the Texas Education Code to adopt the rule.
- (b) Rules submitted to the Office of the Secretary of State for publication in the *Texas Register* shall conform to requirements promulgated by the Secretary of State.

§5.2. Adoption, Amendment, and Repeal of State Board of Education Rules.

- (a) Proposed new rules, amendments, and repeals must appear on the agenda for discussion at one board meeting and for action at two subsequent board meetings as First Reading and Second Reading, unless a departure from this rulemaking process is approved by the board.
- (b) Each member of the board shall receive copies of the preliminary and official board meeting agendas containing all proposed new rules, amendments, or repeals to be considered.
- (c) The board can take action only if the rule is posted for action in the official notice of the meeting that is published in the *Texas Register*. The commissioner is authorized to file information with the Secretary of State to comply with the requirements of Texas Government Code, Chapter 2001, Subchapter B; and Texas Government Code, Chapter 2002, Subchapter B, regarding adoption of rules.
 - (1) **First Reading and Filing Authorization.** The board can authorize the commissioner to file a proposed new rule, amendment, or repeal with the Secretary of State for publication in the *Texas Register* as it appears in the agenda or with changes to the material presented in the agenda.
 - (2) **Second Reading and Final Adoption.** If the public comment period after filing the proposal with the Secretary of State has elapsed, the board can adopt a new rule, amendment, or repeal. If a board committee determines that a substantial revision of the material presented in the agenda shall be considered, the board shall not take final action before the next board meeting.
 - (3) **Withdrawal.** The board can authorize the commissioner to withdraw a proposed new rule, amendment, or repeal that was previously filed with the Secretary of State.
 - (4) **Refiling.** The board can authorize the commissioner to withdraw and refile a proposed new rule or amendment that was previously filed with the Secretary of State if there are substantive changes from the original filing.

- (d) The board can authorize the commissioner to conduct a public hearing on behalf of the State Board of Education concerning board rules. The public hearing shall be transcribed and the transcript made available for review by board members.
- (e) Except as otherwise provided by law, a rule does not take effect until the beginning of the school year that begins at least 90 days after the date of the rule adoption.
- (f) A rule may take effect earlier than the date set forth in subsection (e) if the rule's preamble specified an earlier date with the reason for the earlier date and:
 - (1) the earlier effective date is a requirement of:
 - (A) a federal law, or
 - (B) a state law that specifically refers to Texas Education Code §7.102 and expressly requires the adoption of an earlier effective date; or
 - (2) on an affirmative vote of two-thirds of the members of the board, the board makes a finding that an earlier effective date is necessary.

§5.3. Emergency Rules.

The board may adopt emergency rules without prior notice or hearing. Conditions under which emergency rules can be adopted and the periods for which they are effective are governed by Texas Government Code §2001.034. The board shall also comply with the requirements of Section 5.2(f) of these rules and the notice of emergency meeting requirements in Texas Government Code, §551.045. Emergency rules will be placed on a board agenda for adoption as a permanent rule.

§5.4. Filing Non-Substantive Rule Corrections with the Secretary of State.

The commissioner may approve and file with the Secretary of State non-substantive corrections to State Board of Education rules. Non-substantive rule corrections may only include typographical, grammatical, referencing, or spelling errors and technical edits to comply with *Texas Register* style and format requirements.

§5.5. Rulemaking Authority.

Except for rules adopted under §5.4 of these rules (relating to Filing Non-Substantive Rule Corrections with the Secretary of State), or other exceptions specifically authorized by the board, all rules of the State Board of Education shall be approved by the State Board of Education.

§5.6. Review of the State Board of Education Rules.

In accordance with Texas Government Code, §2001.039, the State Board of Education shall review its rules every four years to assure that statutory authority for the rules continues to exist. If necessary, proposed amendments will be brought to the board following the procedure described in §5.2 of these rules.

§5.7. Filing of Amendments.

A member wishing to amend any Texas Essential Knowledge and Skills (TEKS) being considered by the board for second reading and final adoption shall submit the amendment in writing to the staff no later than noon on the day prior to the final vote on the adoption of the TEKS. All amendments shall be made available to the public to the extent possible. This rule may be suspended by a two-thirds vote.

CHAPTER 6. ADVISORY GROUPS

The statutory citations for this chapter are the Texas Education Code, §§7.102(b), 29.254, 32.034, and 61.077.

§6.1. General Provisions.

- (a) The State Board of Education may establish a Committee of Investment Advisors (CIA) to the Permanent School Fund and approve all selected appointments. The CIA shall be composed of not more than 15 members, one appointed by each State Board of Education member, who each have considerable institutional investment expertise and are free from conflicts of interest. The CIA member will closely advise the individual State Board of Education member who appointed the member on all matters relative to the management of the Permanent School Fund as necessary. The CIA may meet in person or via conference call or telephone conference as needed. Duties and responsibilities of the CIA are within the *Texas Permanent School Fund - Investment Procedures Manual*, Section A.2.
- (b) If the board does not establish a CIA, nothing shall prevent a board member from selecting and working with an investment advisor in a manner consistent with federal and state laws and the Investment Procedures Manual.

**Texas Permanent School Fund
Asset Allocation Mix - SBOE
February 29, 2020**

<u>Asset Class</u>	<u>Portfolio</u>	<u>Book Value</u>	<u>Mix</u>	<u>Fair Value</u>	<u>Mix</u>
Equity	Domestic Small-Mid Cap	\$ 1,228,214,379	4.52%	\$ 1,587,507,267	4.61%
	Domestic Large Cap	1,879,777,727	6.92%	4,288,133,008	12.46%
	Total Domestic Equity	3,107,992,106	11.44%	5,875,640,275	17.07%
	International Equity - Blackrock	3,958,994,427	14.58%	4,799,327,068	13.95%
	Emerging Market Equity - Navarro	770,737,541	2.84%	913,165,353	2.65%
	Total Public Market Equity	7,837,724,074	28.86%	11,588,132,696	33.67%
Fixed Income	Domestic Fixed Income	4,247,448,830	15.64%	4,454,431,086	12.95%
	Investec Emerging Market Debt	1,190,820,021	4.39%	1,234,613,865	3.59%
	Ashmore Emerging Market Debt	1,201,874,991	4.43%	1,216,718,470	3.54%
	Total Emerging Market Debt	2,392,695,012	8.82%	2,451,332,335	7.13%
	Total Fixed Income	6,640,143,842	24.46%	6,905,763,421	20.08%
Absolute Return	Raven 1	782,126,369	2.88%	1,082,778,825	3.15%
	Raven 4	589,005,627	2.17%	1,012,681,320	2.94%
	Raven 6	353,884,155	1.30%	480,630,338	1.40%
	Raven 7	408,526,446	1.50%	581,495,803	1.69%
	Raven 8	418,586,838	1.54%	490,432,150	1.43%
	Total Absolute Return	2,552,129,435	9.39%	3,648,018,436	10.61%
Private Equity	Columbia NB Crossroads Fund L.P.	251,969,267	0.93%	313,381,203	0.91%
	Columbia NB Crossroads Fund II L.P.	369,096,806	1.36%	611,308,052	1.78%
	Columbia NB Crossroads Fund II Tranche C	774,439,490	2.85%	1,001,765,559	2.91%
	Columbia NB Crossroads Fund II Tranche D	182,245,975	0.67%	180,855,940	0.53%
	TPSF NB PE Program	825,484,870	3.04%	1,121,499,761	3.26%
	Private Equity Direct	855,654,787	3.15%	980,243,548	2.85%
	Columbia CS Fund, L.P.	237,797,281	0.88%	340,204,868	0.99%
	Total Private Equity	3,496,688,476	12.88%	4,549,258,931	13.23%
Real Estate	Direct Real Estate Investments	2,426,872,071	8.94%	2,954,456,505	8.59%
	Total Real Estate	2,426,872,071	8.94%	2,954,456,505	8.59%
Risk Parity	AQR Capital Management	831,189,345	3.06%	1,299,903,001	3.78%
	Bridgewater	750,090,891	2.76%	1,253,689,576	3.64%
	Total Risk Parity Strategies	1,581,280,236	5.82%	2,553,592,577	7.42%
Real Return	Real Return - TIPS	1,053,098,582	3.88%	1,116,012,312	3.24%
	Real Return Commodities - Terlingua 1	587,500,000	2.16%	359,997,597	1.05%
	Real Return Commodities - Terlingua 2	575,000,000	2.12%	342,212,963	0.99%
	Real Return Commodities - Terlingua 3	256,039,286	0.94%	239,398,602	0.70%
	Total Real Return	2,471,637,868	9.10%	2,057,621,474	5.98%
Total Unallocated Cash		149,558,019	0.55%	149,558,019	0.42%
Fund Total		27,156,034,021	100.00%	34,406,402,059	100.00%

Notes: The asset classes include cash that has been allocated to the investment portfolios.
Exposure includes fair value of funded investments plus unfunded commitments.

Exposure: Total Private Equity Exposure and Percentage of Fund Total Fair Value 6,877,356,644 19.99%
Total Real Estate Exposure and Percentage of Fund Total Fair Value 4,913,701,022 14.28%

Current State Board of Education approved Strategic Asset Allocation Mix (LC)	13.00%	Real Estate	10.00%
Large Cap U.S. Equity	5.00%	Risk Parity	7.00%
Small/Mid Cap U.S. Equity	14.00%	Real Return-Commodities	3.00%
Developed and Emerging Market International Large Cap Equity	3.00%	Real Return-TIPS	3.00%
Emerging Market Equity	12.00%	Absolute Return	10.00%
Domestic Investment Grade Fixed Income	7.00%	Private Equity	13.00%
Emerging Market Debt (LC)			100.00%

2017-2021 Rule Review Plan for State Board of Education Rules

STATE BOARD OF EDUCATION: INFORMATION

SUMMARY: This item outlines the rule review plan for State Board of Education (SBOE) rules during the period of September 2017 through August 2021. Texas Government Code, §2001.039, requires an ongoing four-year rule review of existing state agency rules, including SBOE rules. The rule review requirement is designed to ensure that the reason for initially adopting or readopting a rule continues to exist.

BACKGROUND INFORMATION AND JUSTIFICATION: Senate Bill (SB) 178, 76th Texas Legislature, 1999, amended the Texas Government Code by adding §2001.039, which requires the review of existing state agency rules. The rule review requirement in Texas Government Code, §2001.039, is designed to ensure that the reason for adopting or readopting the rule continues to exist.

The 2017-2021 SBOE rule review plan reflected in Attachment I repeats the cycle of review that was conducted during the 2013-2017 SBOE rule review with the addition of new rules that took effect subsequent to the adoption of that plan. The 2017-2021 plan is the sixth rule review cycle of SBOE rules.

In accordance with Texas Education Code, §28.002(m), the Texas Essential Knowledge and Skills (TEKS) are exempt from the rule review requirement and are not included in the 2017-2021 rule review plan. The TEKS were also exempt from previous rule review plans. Although the TEKS will not be reviewed as part of the rule review process, the SBOE conducts a review of the TEKS on a schedule determined by the SBOE designed to align the adoption of instructional materials with amendments to the TEKS.

Revisions to Rule Review Plan. The 2017-2021 SBOE rule review plan was approved at the November 2016 SBOE meeting and will appear on an ongoing basis in the information pages of each SBOE agenda until completion.

Any necessary modifications to the plan will appear in the information pages of the SBOE agenda along with the ongoing report.

Rule Review Procedures. Secretary of State rules specify the following two-step review process to implement the rule review requirement in the Texas Government Code, §2001.039:

1. a Notice of Proposed Review (Intention to review) that announces a public comment period for comments on whether the reason for adopting or readopting the rules continues to exist (see example in Attachment II); and
2. a Notice of Adopted Review (Readoption) that summarizes the public comments received, if any, in response to the notice of proposed review and provides a response to each comment (see examples in Attachment II).

The rule review process for SBOE rules is illustrated in this item using three examples. These examples

present the following points: (1) if no amendments are recommended to rules under review, the item presenting the adoption of the review will complete the rule review process and no further action will be necessary; and (2) if amendments are recommended to rules under review, the item presenting the adoption of the review will complete the rule review process and the amendments will be presented as a separate item under the standard rulemaking process.

Example 1. Rule Review with No Changes

January SBOE Meeting	SBOE Committee (discussion)	Discussion item that briefly describes the rule and specifies that no changes are being recommended.
	Texas Register	After the SBOE meeting, staff files Notice of Proposed Review (see Attachment II).
April SBOE Meeting	SBOE Committee and Full SBOE	Action item that presents a summary of comments received, if any, from Notice of Proposed Review. The SBOE authorizes filing the Notice of Adopted Review, noting that no changes are being proposed to the rule as a result of the review.
	Texas Register	After the SBOE meeting, staff files Notice of Adopted Review that states the rule will continue to exist without changes (see Attachment II).
END OF REVIEW PROCESS (no item at June SBOE Meeting)		

Example 2. Rule Review with Changes

January SBOE Meeting	SBOE Committee (discussion)	Discussion item that briefly describes the rule, outlines issues to be considered, and specifies anticipated changes to the rule.
	Texas Register	After the SBOE meeting, staff files Notice of Proposed Review (see Attachment II).
April SBOE Meeting	SBOE Committee and Full SBOE (first reading)	Separate action items are included in the agenda: one that presents comments received, if any, from Notice of Proposed Review and one that provides the SBOE the opportunity to propose amendments. The SBOE authorizes filing the Notice of Adopted Review and approves the proposed amendments for first reading and filing authorization.
	Texas Register	After the SBOE meeting, staff files proposed amendments and the Notice of Adopted Review that states the rule will continue to exist and changes are being proposed (see Attachment II).
END OF REVIEW PROCESS		
June SBOE Meeting	SBOE Committee and Full SBOE (second reading)	Action item that presents the proposed amendments for second reading and final adoption. Item includes a summary of comments, if any, on proposed amendments.
	Texas Register	After the SBOE meeting, staff files adopted amendments.
END OF AMENDMENT PROCESS		

Example 3. Repeal of Rule under Review

January SBOE Meeting	SBOE Committee (first reading)	Action item that presents the proposed repeal of rule. SBOE approves proposed repeal for first reading and filing authorization.
	Texas Register	After the SBOE meeting, staff files proposed repeal. No Notice of Proposed Review required for repeals.
April SBOE Meeting	SBOE Committee and Full SBOE (second reading)	Action item that presents the proposed repeal of rule for second reading and final adoption.
	Texas Register	After the SBOE meeting, staff files adopted repeal.
END OF REPEAL PROCESS		

Staff Members Responsible:

Cristina De La Fuente-Valadez, Director, Rulemaking
 Amanda Gunter, Program Specialist, Rulemaking

Attachment I: 2017-2021 Rule Review Plan for State Board of Education Rules

Attachment II: Sample Notices of Proposed Review and Adopted Review

ATTACHMENT I

2017-2021 Rule Review Plan for State Board of Education Rules (Approved November 2016, Revised January 2019)

Texas Government Code, §2001.039, requires a four-year rule review cycle for all state agency rules, including State Board of Education rules. The rule review is designed to ensure that the reason for adopting or readopting the rule continues to exist. It only includes rules currently in effect at the time the plan is adopted.

Texas Education Code, §28.002(m), exempts the Texas Essential Knowledge and Skills (TEKS) from the rule review requirement; accordingly, this rule review plan does not include the rule chapters for the TEKS. Although the rules will not be reviewed as part of the rule review process, the SBOE conducts a review of the TEKS on a schedule determined by the SBOE. This review is designed to align the adoption of instructional materials with the amendments to the TEKS.

Review Period: September 2017 - August 2018			
Chapter Title	Subchapter Title	Topic	Begin Review
Chapter 74. Curriculum Requirements	<i>Subchapter A. Required Curriculum</i>	Curriculum	September 2017
	<i>Subchapter B. Graduation Requirements</i>		
	<i>Subchapter C. Other Provisions</i>		
	<i>Subchapter D. Graduation Requirements, Beginning with School Year 2001-2002</i>		
	<i>Subchapter E. Graduation Requirements, Beginning with School Year 2004-2005</i>		
	<i>Subchapter F. Graduation Requirements, Beginning with School Year 2007-2008</i>		
	<i>Subchapter G. Graduation Requirements, Beginning with School Year 2012-2013</i>		
Chapter 105. Foundation School Program	<i>Subchapter A. Definitions</i>	Finance	November 2017
	<i>Subchapter B. Use of State Funds</i>		
Chapter 89. Adaptations for Special Populations	<i>Subchapter A. Gifted/Talented Education</i>	Special Populations	January 2018
	<i>Subchapter C. Texas Certificate of High School Equivalency</i>		
	<i>Subchapter D. Special Education Services and Settings</i>		
Chapter 61. School Districts	<i>Subchapter A. Board of Trustees Relationship</i>	Administration	April 2018

Review Period: September 2018 – August 2019			
Chapter Title	Subchapter Title	Topic	Begin Review
Chapter 157. Hearings and Appeals	<i>Subchapter A. General Provisions for Hearings Before the State Board of Education</i>	Personnel	<u>January 2019</u> [September 2018]
	<i>Subchapter D. Independent Hearing Examiners</i>		
Chapter 129. Student Attendance	<i>Subchapter A. Student Attendance Allowed</i>	Finance	January 2019
	<i>Subchapter B. Student Attendance Accounting</i>		

Review Period: September 2019 – August 2020			
Chapter Title	Subchapter Title	Topic	Begin Review
Chapter 33. Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund	<i>Subchapter A. State Board of Education Rules</i>	Finance	September 2019
Chapter 66. State Adoption and Distribution of Instructional Materials	<i>Subchapter A. General Provisions</i>	Instructional Materials	November 2019
	<i>Subchapter B. State Adoption of Instructional Materials</i>		
	<i>Subchapter C. Local Operations</i>		
Chapter 100. Charters	<i>Subchapter A. Open-Enrollment Charter Schools</i>	Charter Schools	January 2020
	<i>Subchapter B. Home-Rule School District Charters</i>		

Review Period: September 2020 – August 2021			
Chapter Title	Subchapter Title	Topic	Begin Review
Chapter 30. Administration	<i>Subchapter A. State Board of Education: General Provisions</i>	Administration	November 2020
	<i>Subchapter B. State Board of Education: Purchasing and Contracts</i>		
Chapter 101. Assessment	<i>Subchapter A. General Provisions</i>	Assessment	January 2021
	<i>Subchapter B. Implementation of Assessments</i>		
	<i>Subchapter C. Local Option</i>		
Chapter 109. Budgeting, Accounting, and Auditing	<i>Subchapter A. Budgeting, Accounting, Financial Reporting, and Auditing for School Districts</i>	Finance	January 2021
	<i>Subchapter B. Texas Education Agency Audit Functions</i>		
	<i>Subchapter C. Adoptions by Reference</i>		
	<i>Subchapter D. Uniform Bank Bid or Request for Proposal and Depository Contract</i>		

SAMPLES

Attachment II

Notice of Proposed Review (Intention to review)

The State Board of Education (SBOE) proposes the review of 19 TAC Chapter 129, Student Attendance, pursuant to the Texas Government Code, §2001.039. The rules being reviewed by the SBOE in 19 TAC Chapter 129 are organized under the following subchapters: Subchapter A, Student Attendance Allowed, and Subchapter B, Student Attendance Accounting.

As required by the Texas Government Code, §2001.039, the SBOE will accept comments as to whether the reasons for adopting 19 TAC Chapter 129, Subchapters A and B, continue to exist. The comment period begins with the publication of this notice and must last a minimum of 30 days.

Comments or questions regarding this rule review may be submitted to Cristina De La Fuente-Valadez, Rulemaking, Texas Education Agency, 1701 North Congress Avenue, Austin, Texas 78701-1494. Comments may also be submitted electronically to rules@tea.texas.gov.

Notice of Adopted Review (with no changes to rule) (Readoption)

The State Board of Education (SBOE) adopts the review of 19 TAC Chapter 129, Student Attendance, Subchapter A, Student Attendance Allowed, and Subchapter B, Student Attendance Accounting, pursuant to the Texas Government Code, §2001.039. The SBOE proposed the review of 19 TAC Chapter 129, Subchapters A and B, in the February 12, 2016 issue of the Texas Register (41 TexReg 1131).

The SBOE finds that the reasons for adopting 19 TAC Chapter 129, Subchapters A and B, continue to exist and readopts the rules. The SBOE received no comments related to the review.

No changes are necessary as a result of the review.

Notice of Adopted Review (with changes to rule) (Readoption with changes)

The State Board of Education (SBOE) adopts the review of 19 TAC Chapter 129, Student Attendance, Subchapter A, Student Attendance Allowed, and Subchapter B, Student Attendance Accounting, pursuant to the Texas Government Code, §2001.039. The SBOE proposed the review of 19 TAC Chapter 129, Subchapters A and B, in the February 12, 2016 issue of the Texas Register (41 TexReg 1131).

The SBOE finds that the reasons for adopting 19 TAC Chapter 129, Subchapters A and B, continue to exist and readopts the rules. The SBOE received no comments related to the review. As part of the review, the SBOE is proposing an amendment to 19 TAC §129.21, which may be found in the Proposed Rules section of this *Texas Register* issue.

STATUTORY AUTHORITY REFERENCE SECTION:

TEXAS CONSTITUTION ARTICLE VII

TEXAS EDUCATION CODE (TEC)

TEXAS GOVERNMENT CODE (TGC)

TEXAS OCCUPATIONS CODE (TOC)

NATURAL RESOURCES CODE (NRC)

THE TEXAS CONSTITUTION
ARTICLE 7. EDUCATION
SECTION 2

Sec. 2. PERMANENT SCHOOL FUND.

All funds, lands and other property heretofore set apart and appropriated for the support of public schools; all the alternate sections of land reserved by the State out of grants heretofore made or that may hereafter be made to railroads or other corporations of any nature whatsoever; one half of the public domain of the State; and all sums of money that may come to the State from the sale of any portion of the same, shall constitute a permanent school fund.

Sec. 2A. RELEASE OF STATE CLAIM TO CERTAIN LANDS AND MINERALS WITHIN SHELBY, FRAZIER, AND MCCORMICK LEAGUE AND IN BASTROP COUNTY.

- (a) The State of Texas hereby relinquishes and releases any claim of sovereign ownership or title to an undivided one-third interest in and to the lands and minerals within the Shelby, Frazier, and McCormick League (now located in Fort Bend and Austin counties) arising out of the interest in that league originally granted under the Mexican Colonization Law of 1823 to John McCormick on or about July 24, 1824, and subsequently voided by the governing body of Austin's Original Colony on or about December 15, 1830.
- (b) The State of Texas relinquishes and releases any claim of sovereign ownership or title to an interest in and to the lands, excluding the minerals, in Tracts 2-5, 13, 15-17, 19-20, 23-26, 29-32, and 34-37, in the A. P. Nance Survey, Bastrop County, as said tracts are:
 - (1) shown on Bastrop County Rolled Sketch No. 4, recorded in the General Land Office on December 15, 1999; and
 - (2) further described by the field notes prepared by a licensed state land surveyor of Travis County in September through November 1999 and May 2000.
- (c) Title to such interest in the lands and minerals described by Subsection (a) is confirmed to the owners of the remaining interests in such lands and minerals. Title to the lands, excluding the minerals, described by Subsection (b) is confirmed to the holder of record title to each tract. Any outstanding land award or land payment obligation owed to the state for lands described by Subsection (b) is canceled, and any funds previously paid related to an outstanding land award or land payment obligation may not be refunded.
- (d) The General Land Office shall issue a patent to the holder of record title to each tract described by Subsection (b). The patent shall be issued in the same manner as other patents except that no filing fee or patent fee may be required.
- (e) A patent issued under Subsection (d) shall include a provision reserving all mineral interest in the land to the state.
- (f) This section is self-executing.

Sec. 2B. AUTHORITY TO RELEASE STATE'S INTEREST IN CERTAIN PERMANENT SCHOOL FUND LAND HELD BY PERSON UNDER COLOR OF TITLE.

- (a) The legislature by law may provide for the release of all or part of the state's interest in land, excluding mineral rights, if:
 - (1) the land is surveyed, unsold, permanent school fund land according to the records of the General Land Office;
 - (2) the land is not patentable under the law in effect before January 1, 2002; and
 - (3) the person claiming title to the land:

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SECTION 2

- (A) holds the land under color of title;
 - (B) holds the land under a chain of title that originated on or before January 1, 1952;
 - (C) acquired the land without actual knowledge that title to the land was vested in the State of Texas;
 - (D) has a deed to the land recorded in the appropriate county; and
 - (E) has paid all taxes assessed on the land and any interest and penalties associated with any period of tax delinquency.
- (b) This section does not apply to:
- (1) beach land, submerged or filled land, or islands; or
 - (2) land that has been determined to be state-owned by judicial decree.
- (c) This section may not be used to:
- (1) resolve boundary disputes; or
 - (2) change the mineral reservation in an existing patent.

Sec. 2C. RELEASE OF STATE CLAIM TO CERTAIN LANDS IN UPSHUR AND SMITH COUNTIES.

- (a) Except as provided by Subsection (b) of this section, the State of Texas relinquishes and releases any claim of sovereign ownership or title to an interest in and to the tracts of land, including mineral rights, described as follows:

Tract 1:

The first tract of land is situated in Upshur County, Texas, about 14 miles South 30 degrees east from Gilmer, the county seat, and is bounded as follows: Bound on the North by the J. Manning Survey, A-314 the S.W. Beasley Survey A-66 and the David Meredith Survey A-315 and bound on the East by the M. Mann Survey, A-302 and by the M. Chandler Survey, A-84 and bound on the South by the G. W. Hooper Survey, A-657 and by the D. Ferguson Survey, A-158 and bound on the West by the J. R. Wadkins Survey, A-562 and the H. Alsup Survey, A-20, and by the W. Bratton Survey, A-57 and the G. H. Burroughs Survey, A-30 and the M. Tidwell Survey, A-498 of Upshur County, Texas.

Tract 2:

The second tract of land is situated in Smith County, Texas, north of Tyler and is bounded as follows: on the north and west by the S. Leeper A-559, the Frost Thorn Four League Grant A-3, A-9, A-7, A-19, and the H. Jacobs A-504 and on the south and east by the following surveys: John Carver A-247, A. Loverly A-609, J. Gimble A-408, R. Conner A-239, N.J. Blythe A-88, N.J. Blythe A-89, J. Choate A-195, Daniel Minor A-644, William Keys A-527, James H. Thomas A-971, Seaborn Smith A-899, and Samuel Leeper A-559.

- (b) This section does not apply to:
- (1) any public right-of-way, including a public road right-of-way, or related interest owned by a governmental entity;
 - (2) any navigable waterway or related interest owned by a governmental entity; or
 - (3) any land owned by a governmental entity and reserved for public use, including a park, recreation area, wildlife area, scientific area, or historic site.
- (c) This section is self-executing.

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SECTION 5

Sec. 5. COMPOSITION, MANAGEMENT, USE, AND DISTRIBUTION OF PERMANENT SCHOOL FUND AND AVAILABLE SCHOOL FUND.

- (a) The permanent school fund consists of all land appropriated for public schools by this constitution or the other laws of this state, other properties belonging to the permanent school fund, and all revenue derived from the land or other properties. The available school fund consists of the distributions made to it from the total return on all investment assets of the permanent school fund, the taxes authorized by this constitution or general law to be part of the available school fund, and appropriations made to the available school fund by the legislature. The total amount distributed from the permanent school fund to the available school fund:
- (1) in each year of a state fiscal biennium must be an amount that is not more than six percent of the average of the market value of the permanent school fund, excluding real property belonging to the fund that is managed, sold, or acquired under Section 4 of this article, but including discretionary real assets investments and cash in the state treasury derived from property belonging to the fund, on the last day of each of the 16 state fiscal quarters preceding the regular session of the legislature that begins before that state fiscal biennium, in accordance with the rate adopted by:
 - (A) a vote of two-thirds of the total membership of the State Board of Education, taken before the regular session of the legislature convenes; or
 - (B) the legislature by general law or appropriation, if the State Board of Education does not adopt a rate as provided by Paragraph (A) of this subdivision; and
 - (2) over the 10-year period consisting of the current state fiscal year and the nine preceding state fiscal years may not exceed the total return on all investment assets of the permanent school fund over the same 10-year period.
- (b) The expenses of managing permanent school fund land and investments shall be paid by appropriation from the permanent school fund.
- (c) The available school fund shall be applied annually to the support of the public free schools. Except as provided by this section, the legislature may not enact a law appropriating any part of the permanent school fund or available school fund to any other purpose. The permanent school fund and the available school fund may not be appropriated to or used for the support of any sectarian school. The available school fund shall be distributed to the several counties according to their scholastic population and applied in the manner provided by law.

- (d) The legislature by law may provide for using the permanent school fund to guarantee bonds issued by school districts or by the state for the purpose of making loans to or purchasing the bonds of school districts for the purpose of acquisition, construction, or improvement of instructional facilities including all furnishings thereto. If any payment is required to be made by the permanent school fund as a result of its guarantee of bonds issued by the state, an amount equal to this payment shall be immediately paid by the state from the treasury to the permanent school fund. An amount owed by the state to the permanent school fund under this section shall be a general obligation of the state until paid. The amount of bonds authorized hereunder shall not exceed \$750 million or a higher amount authorized by a two-thirds record vote of both houses of the legislature. If the proceeds of bonds issued by the state are used to provide a loan to a school district and the district becomes delinquent on the loan payments, the amount of the delinquent payments shall be offset against state aid to which the district is otherwise entitled.
- (e) The legislature may appropriate part of the available school fund for administration of a bond guarantee program established under this section.
- (f) Notwithstanding any other provision of this constitution, in managing the assets of the permanent school fund, the State Board of Education may acquire, exchange, sell, supervise, manage, or retain, through procedures and subject to restrictions it establishes and in amounts it considers appropriate, any kind of investment, including investments in the Texas growth fund created by Article XVI, Section [70](#), of this constitution, that persons of ordinary prudence, discretion, and intelligence, exercising the judgment and care under the circumstances then prevailing, acquire or retain for their own account in the management of their affairs, not in regard to speculation but in regard to the permanent disposition of their funds, considering the probable income as well as the probable safety of their capital.
- (g) Notwithstanding any other provision of this constitution or of a statute, the General Land Office or an entity other than the State Board of Education that has responsibility for the management of permanent school fund land or other properties may in its sole discretion distribute to the available school fund each year revenue derived during that year from the land or properties, not to exceed \$300 million each year.
- (h) Expired.

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CHAPTER 7. STATE ORGANIZATION
SUBCHAPTER D. STATE BOARD OF EDUCATION

TEC, §7.102. STATE BOARD OF EDUCATION POWERS AND DUTIES.

- (a) The board may perform only those duties relating to school districts or regional education service centers assigned to the board by the constitution of this state or by this subchapter or another provision of this code.
- (b) The board has the powers and duties provided by Subsection (c), which shall be carried out with the advice and assistance of the commissioner.
- (c)
 - (1) The board shall develop and update a long-range plan for public education.
 - (2) The board may enter into contracts relating to or accept grants for the improvement of educational programs specifically authorized by statute.
 - (3) The board may accept a gift, donation, or other contribution on behalf of the public school system or agency and, unless otherwise specified by the donor, may use the contribution in the manner the board determines.
 - (4) The board shall establish curriculum and graduation requirements.
 - ~~(5) The board shall establish a standard of performance considered satisfactory on student assessment instruments.~~
 - (6) The board may create special-purpose school districts under Chapter [11](#).
 - (7) The board shall provide for a training course for school district trustees under Section [11.159](#).
 - (8) The board shall adopt a procedure to be used for placing on probation or revoking a home-rule school district charter as required by Subchapter B, Chapter [12](#), and may place on probation or revoke a home-rule school district charter as provided by that subchapter.
 - ~~(9) The board may grant an open enrollment charter or approve a charter revision as provided by Subchapter D, Chapter [12](#).~~
 - (10) The board shall adopt rules establishing criteria for certifying hearing examiners as provided by Section [21.252](#).
 - (11) The board shall adopt rules to carry out the curriculum required or authorized under Section [28.002](#).
 - (12) The board shall establish guidelines for credit by examination under Section [28.023](#).
 - (13) The board shall adopt transcript forms and standards for differentiating high school programs for purposes of reporting academic achievement under Section [28.025](#).
 - (14) The board shall adopt guidelines for determining financial need for purposes of the Texas Advanced Placement Incentive Program under Subchapter C, Chapter [28](#), and may approve payments as provided by that subchapter.
 - (15) The board shall adopt criteria for identifying gifted and talented students and shall develop and update a state plan for the education of gifted and talented students as required under Subchapter D, Chapter [29](#).
 - (16) Repealed by Acts 2013, 83rd Leg., R.S., Ch. 73, Sec. 2.06(a)(1), eff. September 1, 2013.
 - (17) The board shall adopt rules relating to community education development projects as required under Section [29.257](#).
 - (18) The board may approve the plan to be developed and implemented by the commissioner for the coordination of services to children with disabilities as required under Section [30.001](#).
 - (19) The board shall establish a date by which each school district and state institution shall provide to the commissioner the necessary information to determine the district's share of the cost of the education of a student enrolled in the Texas School for the Blind and Visually Impaired or the Texas School for the Deaf as required under Section [30.003](#) and may adopt other rules concerning funding of the education of students enrolled in the Texas School for the Blind and Visually Impaired or the Texas School for the Deaf as authorized under Section [30.003](#).
 - (20) The board shall adopt rules prescribing the form and content of information school districts are required to provide concerning programs offered by state institutions as required under Section [30.004](#).
 - (21) The board shall adopt rules concerning admission of students to the Texas School for the Deaf as required under Section [30.057](#).

- (22) The board shall carry out powers and duties related to regional day school programs for the deaf as provided under Subchapter D, Chapter [30](#).
 - (23) The board shall adopt and purchase or license instructional materials as provided by Chapter [31](#) and adopt rules required by that chapter.
 - (24) The board shall develop and update a long-range plan concerning technology in the public school system as required under Section [32.001](#) and shall adopt rules and policies concerning technology in public schools as provided by Chapter [32](#).
 - (25) The board shall conduct feasibility studies related to the telecommunications capabilities of school districts and regional education service centers as provided by Section [32.033](#).
 - (26) The board shall appoint a board of directors of the center for educational technology under Section [32.034](#).
 - (27) Repealed by Acts 2001, 77th Leg., ch. 1420, Sec. 4.001(b), eff. Sept. 1, 2001.
 - (28) The board shall approve a program for testing students for dyslexia and related disorders as provided by Section [38.003](#).
 - (29) The board shall perform duties in connection with the public school accountability system as prescribed by Chapters [39](#) and [39A](#).
 - (30) The board shall perform duties in connection with the Foundation School Program as prescribed by Chapter [48](#) [42].
 - (31) The board may invest the permanent school fund within the limits of the authority granted by Section [5](#), Article VII, Texas Constitution, and Chapter 43.
 - (32) The board shall adopt rules concerning school district budgets and audits of school district fiscal accounts as required under Subchapter A, Chapter [44](#).
 - (33) The board shall adopt an annual report on the status of the guaranteed bond program and may adopt rules as necessary for the administration of the program as provided under Subchapter C, Chapter [45](#).
 - (34) The board shall prescribe uniform bid blanks for school districts to use in selecting a depository bank as required under Section [45.206](#).
- (d) The board may adopt rules relating to school districts or regional education service centers only as required to carry out the specific duties assigned to the board by the constitution or under Subsection (c).
 - (e) An action of the board to adopt a rule under this section is effective only if the board includes in the rule's preamble a statement of the specific authority under Subsection (c) to adopt the rule.
 - (f) Except as otherwise provided by this subsection, a rule adopted by the board under this section does not take effect until the beginning of the school year that begins at least 90 days after the date on which the rule was adopted. The rule takes effect earlier if the rule's preamble specifies an earlier effective date and the reason for that earlier date and:
 - (1) the earlier effective date is a requirement of:
 - (A) a federal law; or
 - (B) a state law that specifically refers to this section and expressly requires the adoption of an earlier effective date; or
 - (2) on the affirmative vote of two-thirds of the members of the board, the board makes a finding that an earlier effective date is necessary.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE B. STATE AND REGIONAL ORGANIZATION AND GOVERNANCE
CHAPTER 7. STATE ORGANIZATION
SUBCHAPTER D. STATE BOARD OF EDUCATION

TEC, §7.109. DESIGNATION AS STATE BOARD FOR CAREER AND TECHNOLOGY EDUCATION.

- (a) The board is also the State Board for Career and Technology Education.
- (b) The commissioner is the executive officer through whom the State Board for Career and Technology Education shall carry out its policies and enforce its rules.
- (c) The State Board for Career and Technology Education may contract with the Texas Higher Education Coordinating Board or any other state agency to assume the leadership role and administrative responsibility of the State Board for Career and Technology Education for state level administration of technical-vocational education programs in public community colleges, public technical institutes, and other eligible public postsecondary institutions in this state.
- (d) The State Board for Career and Technology Education may allocate funds appropriated to the board by the legislature or federal funds received by the board under the Carl D. Perkins Vocational Education Act (20 U.S.C. Section 2301 et seq.) or other federal law to an institution or program approved by the State Board of Education, the Texas Higher Education Coordinating Board, or another state agency specified by law.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE C. LOCAL ORGANIZATION AND GOVERNANCE
CHAPTER 11. SCHOOL DISTRICTS
SUBCHAPTER H. SPECIAL-PURPOSE SCHOOL DISTRICTS

TEC, §11.352. GOVERNANCE OF SPECIAL-PURPOSE DISTRICT.

- (a) The State Board of Education shall appoint for each district established under Section 11.351 a board of three, five, or seven trustees, as determined by the State Board of Education. A trustee is not required to be a resident of the district.
- (b) For each military reservation school district, the State Board of Education may appoint a board of three or five trustees. Enlisted military personnel and military officers may be appointed to the school board. A majority of the trustees appointed for the district must be civilians and all may be civilians. The trustees shall be selected from a list of persons who are qualified to serve as members of a school district board of trustees under Section 11.061 and who live or are employed on the military reservation. The list shall be furnished to the board by the commanding officer of the military reservation. The trustees appointed serve terms of two years.
- (c) The State Board of Education may adopt rules for the governance of a special-purpose district. In the absence of a rule adopted under this subsection, the laws applicable to independent school districts apply to a special-purpose district.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE C. LOCAL ORGANIZATION AND GOVERNANCE
CHAPTER 12. CHARTERS
SUBCHAPTER B. HOME-RULE SCHOOL DISTRICT CHARTER

TEC, §12.028. PROCEDURE FOR PLACEMENT ON PROBATION OR REVOCATION.

- (a) The State Board of Education by rule shall adopt a procedure to be used for placing on probation or revoking a home-rule school district charter.
- (b) The procedure adopted under Subsection (a) must provide an opportunity for a hearing to the district and to parents of district students. A hearing under this subsection must be held in the district.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE C. LOCAL ORGANIZATION AND GOVERNANCE
CHAPTER 12. CHARTERS
SUBCHAPTER D. OPEN-ENROLLMENT CHARTER SCHOOL

TEC, §12.101. AUTHORIZATION.

- (a) In accordance with this subchapter, the commissioner may grant a charter on the application of an eligible entity for an open-enrollment charter school to operate in a facility of a commercial or nonprofit entity, an eligible entity, or a school district, including a home-rule school district. In this subsection, "eligible entity" means:
- (1) an institution of higher education as defined under Section [61.003](#);
 - (2) a private or independent institution of higher education as defined under Section [61.003](#);
 - (3) an organization that is exempt from taxation under Section 501(c)(3), Internal Revenue Code of 1986 (26 U.S.C. Section 501(c)(3)); or
 - (4) a governmental entity.
- (b) After thoroughly investigating and evaluating an applicant, the commissioner, in coordination with a member of the State Board of Education designated for the purpose by the chair of the board, may grant a charter for an open-enrollment charter school only to an applicant that meets any financial, governing, educational, and operational standards adopted by the commissioner under this subchapter, that the commissioner determines is capable of carrying out the responsibilities provided by the charter and likely to operate a school of high quality, and that:
- (1) has not within the preceding 10 years had a charter under this chapter or a similar charter issued under the laws of another state surrendered under a settlement agreement, revoked, denied renewal, or returned; or
 - (2) is not, under rules adopted by the commissioner, considered to be a corporate affiliate of or substantially related to an entity that has within the preceding 10 years had a charter under this chapter or a similar charter issued under the laws of another state surrendered under a settlement agreement, revoked, denied renewal, or returned.
- (b-0) The commissioner shall notify the State Board of Education of each charter the commissioner proposes to grant under this subchapter. Unless, before the 90th day after the date on which the board receives the notice from the commissioner, a majority of the members of the board present and voting vote against the grant of that charter, the commissioner's proposal to grant the charter takes effect. The board may not deliberate or vote on any grant of a charter that is not proposed by the commissioner.
- (b-1) In granting charters for open-enrollment charter schools, the commissioner may not grant a total of more than:
- (1) 215 charters through the fiscal year ending August 31, 2014;

- (2) 225 charters beginning September 1, 2014;
 - (3) 240 charters beginning September 1, 2015;
 - (4) 255 charters beginning September 1, 2016;
 - (5) 270 charters beginning September 1, 2017; and
 - (6) 285 charters beginning September 1, 2018.
- (b-2) Beginning September 1, 2019, the total number of charters for open-enrollment charter schools that may be granted is 305 charters.
- (b-3) The commissioner may not grant more than one charter for an open-enrollment charter school to any charter holder. The commissioner may consolidate charters for an open-enrollment charter school held by multiple charter holders into a single charter held by a single charter holder with the written consent to the terms of consolidation by or at the request of each charter holder affected by the consolidation.
- (b-4) Notwithstanding Section [12.114](#), approval of the commissioner under that section is not required for establishment of a new open-enrollment charter school campus if the requirements of this subsection are satisfied. A charter holder having an accreditation status of accredited and at least 50 percent of its student population in grades assessed under Subchapter B, Chapter [39](#), or at least 50 percent of the students in the grades assessed having been enrolled in the school for at least three school years may establish one or more new campuses under an existing charter held by the charter holder if:
- (1) the charter holder is currently evaluated under the standard accountability procedures for evaluation under Chapter [39](#) and received a district rating in the highest or second highest performance rating category under Subchapter C, Chapter [39](#), for three of the last five years with at least 75 percent of the campuses rated under the charter also receiving a rating in the highest or second highest performance rating category and with no campus with a rating in the lowest performance rating category in the most recent ratings;
 - (2) the charter holder provides written notice to the commissioner of the establishment of any campus under this subsection in the time, manner, and form provided by rule of the commissioner; and
 - (3) not later than the 60th day after the date the charter holder provides written notice under Subdivision (2), the commissioner does not provide written notice to the charter holder that the commissioner has determined that the charter holder does not satisfy the requirements of this section.
- (b-5) The initial term of a charter granted under this section is five years.

- (b-6) The commissioner shall adopt rules to modify criteria for granting a charter for an open-enrollment charter school under this section to the extent necessary to address changes in performance rating categories or in the financial accountability system under Chapter [39](#).
- (b-7) A charter granted under this section for a dropout recovery school is not considered for purposes of the limit on the number of charters for open-enrollment charter schools imposed by this section. For purposes of this subsection, an open-enrollment charter school is considered to be a dropout recovery school if the school meets the criteria for designation as a dropout recovery school under Section [12.1141\(c\)](#).
- (b-8) In adopting any financial standards under this subchapter that an applicant for a charter for an open-enrollment charter school must meet, the commissioner shall not:
 - (1) exclude any loan or line of credit in determining an applicant's available funding; or
 - (2) exclude an applicant from the grant of a charter solely because the applicant fails to demonstrate having a certain amount of current assets in cash.
- (c) If the facility to be used for an open-enrollment charter school is a school district facility, the school must be operated in the facility in accordance with the terms established by the board of trustees or other governing body of the district in an agreement governing the relationship between the school and the district.
- (d) An educator employed by a school district before the effective date of a charter for an open-enrollment charter school operated at a school district facility may not be transferred to or employed by the open-enrollment charter school over the educator's objection.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE C. LOCAL ORGANIZATION AND GOVERNANCE
CHAPTER 12. CHARTERS
SUBCHAPTER D. OPEN-ENROLLMENT CHARTER SCHOOL

TEC, §12.110. APPLICATION.

- (a) The commissioner shall adopt:
 - (1) an application form and a procedure that must be used to apply for a charter for an open-enrollment charter school; and
 - (2) criteria to use in selecting a program for which to grant a charter.
- (b) The application form must provide for including the information required under Section 12.111 to be contained in a charter.
- (c) As part of the application procedure, the commissioner may require a petition supporting a charter for a school signed by a specified number of parents or guardians of school-age children residing in the area in which a school is proposed or may hold a public hearing to determine parental support for the school.
- (d) The commissioner shall approve or deny an application based on:
 - (1) documented evidence collected through the application review process;
 - (2) merit; and
 - (3) other criteria as adopted by the commissioner, which must include:
 - (A) criteria relating to the capability of the applicant to carry out the responsibilities provided by the charter and the likelihood that the applicant will operate a school of high quality;
 - (B) criteria relating to improving student performance and encouraging innovative programs; and
 - (C) a statement from any school district whose enrollment is likely to be affected by the open-enrollment charter school, including information relating to any financial difficulty that a loss in enrollment may have on the district.
- (e) The commissioner shall give priority to applications that propose an open-enrollment charter school campus to be located in the attendance zone of a school district campus assigned an unacceptable performance rating under Section 39.054 for the two preceding school years.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE D. EDUCATORS AND SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
CHAPTER 21. EDUCATORS
SUBCHAPTER A. GENERAL PROVISIONS

TEC, §21.003. CERTIFICATION REQUIRED.

- (a) A person may not be employed as a teacher, teacher intern or teacher trainee, librarian, educational aide, administrator, educational diagnostician, or school counselor by a school district unless the person holds an appropriate certificate or permit issued as provided by Subchapter B.
- (b) Except as otherwise provided by this subsection, a person may not be employed by a school district as an audiologist, occupational therapist, physical therapist, physician, nurse, school psychologist, associate school psychologist, licensed professional counselor, marriage and family therapist, social worker, or speech language pathologist unless the person is licensed by the state agency that licenses that profession and may perform specific services within those professions for a school district only if the person holds the appropriate credential from the appropriate state agency. As long as a person employed by a district before September 1, 2011, to perform marriage and family therapy, as defined by Section 502.002, Occupations Code, is employed by the same district, the person is not required to hold a license as a marriage and family therapist to perform marriage and family therapy with that district.
- (c) The commissioner may waive the requirement for certification of a superintendent if requested by a school district as provided by Section 7.056. A person who is not certified as a superintendent may not be employed by a school district as the superintendent before the person has received a waiver of certification from the commissioner. The commissioner may limit the waiver of certification in any manner the commissioner determines is appropriate. A person may be designated to act as a temporary or interim superintendent for a school district, but the district may not employ the person under a contract as superintendent unless the person has been certified or a waiver has been granted.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE D. EDUCATORS AND SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
CHAPTER 21. EDUCATORS
SUBCHAPTER B. CERTIFICATION OF EDUCATORS

TEC, §21.031. PURPOSE.

- (a) The State Board for Educator Certification is established to recognize public school educators as professionals and to grant educators the authority to govern the standards of their profession. The board shall regulate and oversee all aspects of the certification, continuing education, and standards of conduct of public school educators.
- (b) In proposing rules under this subchapter, the board shall ensure that all candidates for certification or renewal of certification demonstrate the knowledge and skills necessary to improve the performance of the diverse student population of this state.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE D. EDUCATORS AND SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
CHAPTER 21. EDUCATORS
SUBCHAPTER B. CERTIFICATION OF EDUCATORS

TEC, §21.041. RULES; FEES.

- (a) The board may adopt rules as necessary for its own procedures.
- (b) The board shall propose rules that:
 - (1) provide for the regulation of educators and the general administration of this subchapter in a manner consistent with this subchapter;
 - (2) specify the classes of educator certificates to be issued, including emergency certificates;
 - (3) specify the period for which each class of educator certificate is valid;
 - (4) specify the requirements for the issuance and renewal of an educator certificate;
 - (5) provide for the issuance of an educator certificate to a person who holds a similar certificate issued by another state or foreign country, subject to Section 21.052;
 - (6) provide for special or restricted certification of educators, including certification of instructors of American Sign Language;
 - (7) provide for disciplinary proceedings, including the suspension or revocation of an educator certificate, as provided by Chapter 2001, Government Code;
 - (8) provide for the adoption, amendment, and enforcement of an educator's code of ethics;
 - (9) provide for continuing education requirements; and
 - (10) provide for certification of persons performing appraisals under Subchapter H.
- (c) The board shall propose a rule adopting a fee for the issuance and maintenance of an educator certificate that, when combined with any fees imposed under Subsection (d), is adequate to cover the cost of administration of this subchapter.
- (d) The board may propose a rule adopting a fee for the approval or renewal of approval of an educator preparation program, or for the addition of a certificate or field of certification to the scope of a program's approval. A fee imposed under this subsection may not exceed the amount necessary, as determined by the board, to provide for the administrative cost of approving, renewing the approval of, and appropriately ensuring the accountability of educator preparation programs under this subchapter.

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SUBTITLE D. EDUCATORS AND SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
CHAPTER 21. EDUCATORS
SUBCHAPTER A. GENERAL PROVISIONS

TEC, §21.044. EDUCATOR PREPARATION.

- (a) The board shall propose rules establishing the training requirements a person must accomplish to obtain a certificate, enter an internship, or enter an induction-year program. The board shall specify the minimum academic qualifications required for a certificate.
- (b) Any minimum academic qualifications for a certificate specified under Subsection (a) that require a person to possess a bachelor's degree must also require that the person receive, as part of the training required to obtain that certificate, instruction in detection and education of students with dyslexia.
- (c) The instruction under Subsection (b) must:
 - (1) be developed by a panel of experts in the diagnosis and treatment of dyslexia who are:
 - (A) employed by institutions of higher education; and
 - (B) approved by the board; and
 - (2) include information on:
 - (A) characteristics of dyslexia;
 - (B) identification of dyslexia; and
 - (C) effective, multisensory strategies for teaching students with dyslexia.
- (c-1) Any minimum academic qualifications for a certificate specified under Subsection (a) that require a person to possess a bachelor's degree must also require that the person receive, as part of the training required to obtain that certificate, instruction regarding mental health, substance abuse, and youth suicide. The instruction required must:
 - 1) be provided through:
 - (A) a program selected from the list of recommended best practice-based programs and research-based practices established under Section 38.351; or
 - (B) a course offered by any accredited public or private postsecondary educational institution as part of a degree program [161.325, Health and Safety Code]; and
 - (2) include effective strategies [~~for teaching and intervening with students with mental or emotional disorders~~], including de-escalation techniques and positive behavioral interventions and supports, for teaching and intervening with students with mental health conditions or who engage in substance abuse.
- (c-2) Any minimum academic qualifications for a certificate specified under Subsection (a) that require a person to possess a bachelor's degree must also require that the person receive, as part of the training required to obtain that certificate, instruction in digital learning, including a digital literacy evaluation followed by a prescribed digital learning curriculum. The instruction required must:
 - (1) be aligned with the International Society for Technology in Education's standards for teachers;
 - (2) provide effective, evidence-based strategies to determine a person's degree of digital literacy; and
 - (3) include resources to address any deficiencies identified by the digital literacy evaluation.
- (d) In proposing rules under this section, the board shall specify that to obtain a certificate to teach an "applied STEM course," as that term is defined by Section [28.027](#), at a secondary school, a person must:

- (1) pass the certification test administered by the recognized national or international business and industry group that created the curriculum the applied STEM course is based on; and
- (2) have at a minimum:
 - (A) an associate degree from an accredited institution of higher education; and
 - (B) three years of work experience in an occupation for which the applied STEM course is intended to prepare the student.
- (e) In proposing rules under this section for a person to obtain a certificate to teach a health science technology education course, the board shall specify that a person must have:
 - (1) an associate degree or more advanced degree from an accredited institution of higher education;
 - (2) current licensure, certification, or registration as a health professions practitioner issued by a nationally recognized accrediting agency for health professionals; and
 - (3) at least two years of wage earning experience utilizing the licensure requirement.
- (f) The board may not propose rules for a certificate to teach a health science technology education course that specify that a person must have a bachelor's degree or that establish any other credential or teaching experience requirements that exceed the requirements under Subsection (e).
- (f-1) Board rules addressing ongoing educator preparation program support for a candidate seeking certification in a certification class other than classroom teacher may not require that an educator preparation program conduct one or more formal observations of the candidate on the candidate's site in a face-to-face setting. The rules must permit each required formal observation to occur on the candidate's site or through use of electronic transmission or other video-based or technology-based method.
- (g) Each educator preparation program must provide information regarding:
 - (1) the skills that educators are required to possess, the responsibilities that educators are required to accept, and the high expectations for students in this state;
 - (2) the effect of supply and demand forces on the educator workforce in this state;
 - (3) the performance over time of the educator preparation program;
 - (4) the importance of building strong classroom management skills;
 - (5) the framework in this state for teacher and principal evaluation, including the procedures followed in accordance with Subchapter H; and
 - (6) appropriate relationships, boundaries, and communications between educators and students.

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SUBCHAPTER B. CERTIFICATION OF EDUCATORS

TEC, §21.048. CERTIFICATION EXAMINATIONS.

- (a) The board shall propose rules prescribing comprehensive examinations for each class of certificate issued by the board. The commissioner shall determine the satisfactory level of performance required for each certification examination. For the issuance of a generalist certificate, the commissioner shall require a satisfactory level of examination performance in each core subject covered by the examination.
- (a-1) The board may not require that more than 45 days elapse before a person may retake an examination. A person may not retake an examination more than four times, unless the board waives the limitation for good cause as prescribed by the board.
- (a-2) For purposes of the limitation imposed by Subsection (a-1) on the number of administrations of an examination, a person who initially took an examination before September 1, 2015, may retake the examination up to four times after that date, regardless of the number of times that the person attempted to perform satisfactorily on the examination before that date. This subsection expires September 1, 2018.
- (b) The board may not administer a written examination to determine the competence or level of performance of an educator who has a hearing impairment unless the examination has been field tested to determine its appropriateness, reliability, and validity as applied to, and minimum acceptable performance scores for, persons with hearing impairments.
- (c) An educator who has a hearing impairment is exempt from taking a written examination for a period ending on the first anniversary of the date on which the board determines, on the basis of appropriate field tests, that the examination complies with the standards specified in Subsection (b).
 - (b). On application to the board, the board shall issue a temporary exemption certificate to a person entitled to an exemption under this subsection.
- (c-1) The results of an examination administered under this section are confidential and are not subject to disclosure under Chapter 552, Government Code, unless the disclosure is regarding notification to a parent of the assignment of an uncertified teacher to a classroom as required by Section 21.057.

- (d) In this section:
- (1) "Hearing impairment" means a hearing impairment so severe that the person cannot process linguistic information with or without amplification.
 - (2) "Reliability" means the extent to which an experiment, test, or measuring procedure yields the same results on repeated trials.
 - (3) "Validity" means being:
 - (A) well-grounded or justifiable;
 - (B) relevant and meaningful;
 - (C) correctly derived from premises or inferences; and
 - (D) supported by objective truth or generally accepted authority.

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TEC, §21.050. ACADEMIC DEGREE REQUIRED FOR TEACHING CERTIFICATE; FIELD-BASED EXPERIENCE OR INTERNSHIP.

- (a) A person who applies for a teaching certificate for which board rules require a bachelor's degree must possess a bachelor's degree received with an academic major or interdisciplinary academic major, including reading, ~~[other than education]~~, that is related to the curriculum as prescribed under Subchapter A, Chapter 28.
- (b) ~~[The board may not require more than 18 semester credit hours of education courses at the baccalaureate level for the granting of a teaching certificate.]~~ The board shall provide for a minimum number of semester credit hours of field-based experience or internship to be included in the credit hours needed for certification. The board may propose rules requiring additional credit hours for certification in bilingual education, English as a second language, early childhood education, or special education.
- (c) A person who receives a bachelor's degree required for a teaching certificate on the basis of higher education coursework completed while receiving an exemption from tuition and fees under Section 54.363 may not be required to participate in any field experience or internship consisting of student teaching to receive a teaching certificate.

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TEC, §21.051. RULES REGARDING FIELD-BASED EXPERIENCE AND OPTIONS FOR FIELD EXPERIENCE AND INTERNSHIPS.

- a) In this section, "teacher of record" means a person employed by a school district who teaches the majority of the instructional day in an academic instructional setting and is responsible for evaluating student achievement and assigning grades.
- (b) Before a school district may employ a candidate for certification as a teacher of record and, except as provided by Subsection (b-1), after the candidate's admission to an educator preparation program, the candidate must complete at least 15 hours of field-based experience in which the candidate is actively engaged in instructional or educational activities under supervision at:
 - (1) a public school campus accredited or approved for the purpose by the agency; or
 - (2) a private school recognized or approved for the purpose by the agency.
- (b-1) A candidate may satisfy up to 15 hours of the field-based experience requirement under Subsection (b) by serving as a long-term substitute teacher as prescribed by board rule. Experience under this subsection may occur after the candidate's admission to an educator preparation program or during the two years before the date the candidate is admitted to the program. The candidate's experience in instructional or educational activities must be documented by the educator preparation program and must be obtained at:
 - (1) a public school campus accredited or approved for the purpose by the agency; or
 - (2) a private school recognized or approved for the purpose by the agency.
- (c) Subsection (b) applies only to an initial certification issued on or after September 1, 2012. Subsection (b) does not affect:
 - (1) the validity of a certification issued before September 1, 2012; or
 - (2) the eligibility of a person who holds a certification issued before September 1, 2012, to obtain a subsequent renewal of the certification in accordance with board rule.
- (d) Subsection (b) does not affect the period within which an individual must complete field-based experience hours as determined by board rule if the individual is not accepted into an educator preparation program before the deadline prescribed by board rule and is hired for a teaching assignment by a school district after the deadline prescribed by board rule.
- (e) The board shall propose rules relating to the field-based experience required by Subsection (b). The commissioner by rule shall adopt procedures and standards for recognizing a private school under Subsection (b)(2).
- (f) The board shall propose rules providing flexible options for persons for any field-based experience or internship required for certification.

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TEC, §21.054. CONTINUING EDUCATION.

- (a) The board shall propose rules establishing a process for identifying continuing education courses and programs that fulfill educators' continuing education requirements, including opportunities for educators to receive micro-credentials in fields of study related to the educator's certification class as provided by Subsection (i).
- (b) Continuing education requirements for an educator who teaches students with dyslexia must include training regarding new research and practices in educating students with dyslexia.
- (c) The training required under Subsection (b) may be offered in an online course.

Text of subsection effective until December 01, 2019

- (d) Continuing education requirements for a classroom teacher must provide that not more than 25 percent of the training required every five years include instruction regarding:
 - (1) collecting and analyzing information that will improve effectiveness in the classroom;
 - (2) recognizing early warning indicators that a student may be at risk of dropping out of school;
 - (3) digital learning, digital teaching, and integrating technology into classroom instruction;
 - (4) educating diverse student populations, including:
 - (A) students with disabilities, including mental health disorders;
 - (B) students who are educationally disadvantaged;
 - (C) students of limited English proficiency; and
 - (D) students at risk of dropping out of school;
 - (5) understanding appropriate relationships, boundaries, and communications between educators and students; and
 - (6) how grief and trauma affect student learning and behavior and how evidence-based, grief-informed, and trauma-informed strategies support the academic success of students affected by grief and trauma.

Text of subsection effective on December 01, 2019

- (d) Continuing education requirements for a classroom teacher must provide that at least 25 percent of the training required every five years include instruction regarding:
 - (1) collecting and analyzing information that will improve effectiveness in the classroom;
 - (2) recognizing early warning indicators that a student may be at risk of dropping out of school;
 - (3) digital learning, digital teaching, and integrating technology into classroom instruction;
 - (4) educating diverse student populations, including:
 - (A) students who are eligible to participate in special education programs under Subchapter A, Chapter [29](#);
 - (B) students who are eligible to receive educational services required under Section 504, Rehabilitation Act of 1973 (29 U.S.C. Section 794);

- (C) students with mental health conditions or who engage in substance abuse;
 - (D) students with intellectual or developmental disabilities;
 - (E) students who are educationally disadvantaged;
 - (F) students of limited English proficiency; and
 - (G) students at risk of dropping out of school;
- (5) understanding appropriate relationships, boundaries, and communications between educators and students; and
 - (6) how mental health conditions, including grief and trauma, affect student learning and behavior and how evidence-based, grief-informed, and trauma-informed strategies support the academic success of students affected by grief and trauma.

Text of subsection effective on December 01, 2019

(d-1) The instruction required under Subsection (d) may include two or more listed topics together.

Text of subsection as amended by Acts 2019, 86th Leg., R.S., Ch. 464 (S.B. [11](#)), Sec. 4

(d-2) The instruction required under Subsection (d)(6) must:

- (1) comply with the training required by Section [38.036](#)(c)(1); and
- (2) be approved by the commissioner.

Text of subsection as amended by Acts 2019, 86th Leg., R.S., Ch. 352 (H.B. [18](#)), Sec. 1.04

Text of subsection effective on December 01, 2019

(d-2) The instruction required under Subsection (d)(6) must be:

- (1) based on relevant best practice-based programs and research-based practices; and
- (2) approved by the commissioner, in consultation with the Health and Human Services Commission.

Text of subsection effective until December 01, 2019

(e) Continuing education requirements for a principal must provide that not more than 25 percent of the training required every five years include instruction regarding:

- (1) effective and efficient management, including:
 - (A) collecting and analyzing information;
 - (B) making decisions and managing time; and
 - (C) supervising student discipline and managing behavior;
- (2) recognizing early warning indicators that a student may be at risk of dropping out of school;
- (3) digital learning, digital teaching, and integrating technology into campus curriculum and instruction;
- (4) educating diverse student populations, including:
 - (A) students with disabilities, including mental health disorders;
 - (B) students who are educationally disadvantaged;
 - (C) students of limited English proficiency; and

- (D) students at risk of dropping out of school; and
- (5) preventing, recognizing, and reporting any sexual conduct between an educator and student that is prohibited under Section [21.12](#), Penal Code, or for which reporting is required under Section [21.006](#) of this code.

Text of subsection effective on December 01, 2019

- (e) Continuing education requirements for a principal must provide that at least 25 percent of the training required every five years include instruction regarding:
 - (1) effective and efficient management, including:
 - (A) collecting and analyzing information;
 - (B) making decisions and managing time; and
 - (C) supervising student discipline and managing behavior;
 - (2) recognizing early warning indicators that a student may be at risk of dropping out of school;
 - (3) digital learning, digital teaching, and integrating technology into campus curriculum and instruction;
 - (4) effective implementation of a comprehensive school counseling program under Section [33.005](#);
 - (5) mental health programs addressing a mental health condition;
 - (6) educating diverse student populations, including:
 - (A) students who are eligible to participate in special education programs under Subchapter A, Chapter [29](#);
 - (B) students with intellectual or developmental disabilities;
 - (C) students who are eligible to receive educational services required under Section 504, Rehabilitation Act of 1973 (29 U.S.C. Section 794);
 - (D) students with mental health conditions or who engage in substance abuse;
 - (E) students who are educationally disadvantaged;
 - (F) students of limited English proficiency; and
 - (G) students at risk of dropping out of school;
 - (7) preventing, recognizing, and reporting any sexual conduct between an educator and student that is prohibited under Section [21.12](#), Penal Code, or for which reporting is required under Section [21.006](#) of this code; and
 - (8) how mental health conditions, including grief and trauma, affect student learning and behavior and how evidence-based, grief-informed, and trauma-informed strategies support the academic success of students affected by grief and trauma.

Text of subsection effective until December 01, 2019

- (e-2) Continuing education requirements for a principal may include instruction regarding how grief and trauma affect student learning and behavior and how evidence-based, grief-informed, and trauma-informed strategies support the academic success of students affected by grief and trauma.

Text of subsection effective on December 01, 2019

- (e-2) The instruction required under Subsection (e)(8) must be:
- (1) based on relevant best practice-based programs and research-based practices; and
 - (2) approved by the commissioner, in consultation with the Health and Human Services Commission.

Text of subsection effective until December 01, 2019

- (f) Continuing education requirements for a counselor must provide that not more than 25 percent of training required every five years include instruction regarding:
- (1) assisting students in developing high school graduation plans;
 - (2) implementing dropout prevention strategies; and
 - (3) informing students concerning:
 - (A) college admissions, including college financial aid resources and application procedures; and
 - (B) career opportunities.

Text of subsection effective on December 01, 2019

- (f) Continuing education requirements for a counselor must provide that at least 25 percent of training required every five years include instruction regarding:
- (1) assisting students in developing high school graduation plans;
 - (2) implementing dropout prevention strategies;
 - (3) informing students concerning:
 - (A) college admissions, including college financial aid resources and application procedures; and
 - (B) career opportunities;
 - (4) counseling students concerning mental health conditions and substance abuse, including through the use of grief-informed and trauma-informed interventions and crisis management and suicide prevention strategies; and
 - (5) effective implementation of a comprehensive school counseling program under Section [33.005](#).

Text of subsection effective until December 01, 2019

- (g) The board shall adopt rules that allow an educator to fulfill up to 12 hours of continuing education by participating in a mental health first aid training program offered by a local mental health authority under Section [1001.203](#), Health and Safety Code. The number of hours of continuing education an educator may fulfill under this subsection may not exceed the number of hours the educator actually spends participating in a mental health first aid training program.

Text of subsection effective on December 01, 2019

- (g) The board shall adopt rules that allow an educator to fulfill continuing education requirements by participating in an evidence-based mental health first aid training program or an evidence-based grief-informed and trauma-informed care program. The rules adopted under this subsection must allow an educator to complete a program described by this subsection and receive credit toward continuing education requirements for twice the number of hours of instruction provided under that program, not to exceed 16 hours. The program must be offered through a classroom instruction format that requires in-person attendance.

- (h) Continuing education requirements for a superintendent must include at least 2-1/2 hours of training every five years on identifying and reporting potential victims of sexual abuse, human trafficking, and other maltreatment of children. For purposes of this subsection, "other maltreatment" has the meaning assigned by Section [42.002](#), Human Resources Code.
- (i) The board shall propose rules establishing a program to issue micro-credentials in fields of study related to an educator's certification class. The agency shall approve continuing education providers to offer micro-credential courses. A micro-credential received by an educator shall be recorded on the agency's Educator Certification Online System (ECOS) and included as part of the educator's public certification records.

Added by Acts 1995, 74th Leg., ch. 260, Sec. 1, eff. May 30, 1995.

Amended by:

Acts 2005, 79th Leg., Ch. 675 (S.B. [143](#)), Sec. 2, eff. June 17, 2005.

Acts 2009, 81st Leg., R.S., Ch. 596 (H.B. [200](#)), Sec. 1, eff. September 1, 2009.

Acts 2009, 81st Leg., R.S., Ch. 895 (H.B. [3](#)), Sec. 67(a), eff. June 19, 2009.

Acts 2011, 82nd Leg., R.S., Ch. 635 (S.B. [866](#)), Sec. 2, eff. June 17, 2011.

Acts 2013, 83rd Leg., R.S., Ch. 638 (H.B. [642](#)), Sec. 1, eff. September 1, 2013.

Acts 2013, 83rd Leg., R.S., Ch. 1306 (H.B. [3793](#)), Sec. 1, eff. September 1, 2013.

Acts 2015, 84th Leg., R.S., Ch. 1236 (S.B. [1296](#)), Sec. 21.001(9), eff. September 1, 2015.

Acts 2017, 85th Leg., R.S., Ch. 178 (S.B. [7](#)), Sec. 9, eff. September 1, 2017.

Acts 2017, 85th Leg., R.S., Ch. 522 (S.B. [179](#)), Sec. 8, eff. September 1, 2017.

Acts 2017, 85th Leg., R.S., Ch. 757 (S.B. [1839](#)), Sec. 8, eff. June 12, 2017.

Acts 2019, 86th Leg., R.S., Ch. 214 (H.B. [403](#)), Sec. 2, eff. September 1, 2019.

Acts 2019, 86th Leg., R.S., Ch. 352 (H.B. [18](#)), Sec. 1.04, eff. December 1, 2019.

Acts 2019, 86th Leg., R.S., Ch. 464 (S.B. [11](#)), Sec. 4, eff. June 6, 2019.

Acts 2019, 86th Leg., R.S., Ch. 1123 (H.B. [2424](#)), Sec. 1, eff. June 14, 2019.

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TEC, §21.064. LEGACY MASTER TEACHER CERTIFICATIONS.

- (a) The board shall recognize a master teacher certificate issued under former Section 21.0481, 21.0482, 21.0483, or 21.0484 until the certificate expires. The board shall note a designation of "legacy" on the certificate.
- (b) A master teacher certificate described by Subsection (a) is not eligible for funding under the teacher incentive allotment under Section [48.112](#).

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TEC, §21.0485. CERTIFICATION TO TEACH STUDENTS WITH VISUAL IMPAIRMENTS.

- (a) To be eligible to be issued a certificate to teach students with visual impairments, a person must:
 - (1) complete either:
 - (A) all course work required for that certification in an approved educator preparation program; or
 - (B) an alternative educator certification program approved for the purpose by the board;
 - (2) perform satisfactorily on each examination prescribed under Section [21.048](#) for certification to teach students with visual impairments, after completing the course work or program described by Subdivision (1); and
 - (3) satisfy any other requirements prescribed by the board.
- (b) Subsection (a) does not apply to eligibility for a certificate to teach students with visual impairments, including eligibility for renewal of that certificate, if the application for the initial certificate was submitted on or before September 1, 2011.

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TEC, §21.0489. EARLY CHILDHOOD CERTIFICATION.

- (a) To ensure that there are teachers with special training in early childhood education focusing on prekindergarten through grade three, the board shall establish an early childhood certificate.
- (b) A person is not required to hold a certificate established under this section to be employed by a school district to provide instruction in prekindergarten through grade three.
- (c) To be eligible for a certificate established under this section, a person must:
 - (1) either:
 - (A) satisfactorily complete the course work for that certificate in an educator preparation program, including a knowledge-based and skills-based course of instruction on early childhood education that includes:
 - (i) teaching methods for:
 - (a) using small group instructional formats that focus on building social, emotional, and academic skills;
 - (b) navigating multiple content areas; and
 - (c) managing a classroom environment in which small groups of students are working on different tasks; and
 - (ii) strategies for teaching fundamental academic skills, including reading, writing, and numeracy; or
 - (B) hold an early childhood through grade six certificate issued under this subchapter and satisfactorily complete a course of instruction described by Paragraph (A);
 - (2) perform satisfactorily on an early childhood certificate examination prescribed by the board; and
 - (3) satisfy any other requirements prescribed by the board.
- (d) The criteria for the course of instruction described by Subsection (c)(1)(A) shall be developed by the board in consultation with faculty members who provide instruction at institutions of higher education in educator preparation programs for an early childhood through grade six certificate.

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CHAPTER 22. SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS

TEC, §22.064. LEGACY MASTER TEACHER CERTIFICATIONS (Excerpt):

- (a) The board shall recognize a master teacher certificate issued under former Section 21.0481, 21.0482, 21.0483, or 21.0484 until the certificate expires. The board shall note a designation of “legacy” on the certificate.

As amended by HB 3, 86th Legislature, 2019.

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CHAPTER 22. SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
SUBCHAPTER C. CRIMINAL HISTORY RECORDS

**TEC, §22.082. ACCESS TO CRIMINAL HISTORY RECORDS BY STATE BOARD FOR
EDUCATOR CERTIFICATION.**

The State Board for Educator Certification shall subscribe to the criminal history clearinghouse as provided by Section [411.0845](#), Government Code, and may obtain from any law enforcement or criminal justice agency all criminal history record information and all records contained in any closed criminal investigation file that relate to a specific applicant for or holder of a certificate issued under Subchapter B, Chapter [21](#).

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CHAPTER 22. SCHOOL DISTRICT EMPLOYEES AND VOLUNTEERS
SUBCHAPTER C. CRIMINAL HISTORY RECORDS

TEC, §22.0831. NATIONAL CRIMINAL HISTORY RECORD INFORMATION REVIEW OF CERTIFIED EDUCATORS .

- (a) In this section, "board" means the State Board for Educator Certification.
- (b) This section applies to a person who is an applicant for or holder of a certificate under Subchapter B, Chapter [21](#), and who is employed by or is an applicant for employment by a school district, open-enrollment charter school, or shared services arrangement.
- (c) The board shall review the national criminal history record information of a person who has not previously submitted fingerprints to the department or been subject to a national criminal history record information review.
- (d) The board shall place an educator's certificate on inactive status for failure to comply with a deadline for submitting information required under this section.
- (e) The board may allow a person who is applying for a certificate under Subchapter B, Chapter [21](#), and who currently resides in another state to submit the person's fingerprints and other required information in a manner that does not impose an undue hardship on the person.
- (f) The board may propose rules to implement this section, including rules establishing:
 - (1) deadlines for a person to submit fingerprints and photographs in compliance with this section; and
 - (2) sanctions for a person's failure to comply with the requirements of this section, including suspension or revocation of a certificate or refusal to issue a certificate.
- (g) Expired.

TEXAS EDUCATION CODE
CHAPTER 28. COURSES OF STUDY; ADVANCEMENT
SUBCHAPTER A. ESSENTIAL KNOWLEDGE AND SKILLS; CURRICULUM

TEC, §28.002. REQUIRED CURRICULUM.

- (a) Each school district that offers kindergarten through grade 12 shall offer, as a required curriculum:
- (1) a foundation curriculum that includes:
 - (A) English language arts;
 - (B) mathematics;
 - (C) science; and
 - (D) social studies, consisting of Texas, United States, and world history, government, economics, with emphasis on the free enterprise system and its benefits, and geography; and
 - (2) an enrichment curriculum that includes:
 - (A) to the extent possible, languages other than English;
 - (B) health, with emphasis on: ~~the importance of proper nutrition and exercise;~~
 - (i) physical health, including the importance of proper nutrition and exercise;
 - (ii) mental health, including instruction about mental health conditions, substance abuse, skills to manage emotions, establishing and maintaining positive relationships, and responsible decision-making; and
 - (iii) suicide prevention, including recognizing suicide-related risk factors and warning signs;
 - (C) physical education;
 - (D) fine arts;
 - (E) career and technology education;
 - (F) technology applications;
 - (G) religious literature, including the Hebrew Scriptures (Old Testament) and New Testament, and its impact on history and literature; and
 - (H) personal financial literacy.
- (b) The State Board of Education by rule shall designate subjects constituting a well-balanced curriculum to be offered by a school district that does not offer kindergarten through grade 12.
- (b-1) In this section, "common core state standards" means the national curriculum standards developed by the Common Core State Standards Initiative.
- (b-2) The State Board of Education may not adopt common core state standards to comply with a duty imposed under this chapter.
- (b-3) A school district may not use common core state standards to comply with the requirement to provide instruction in the essential knowledge and skills at appropriate grade levels under Subsection (c).
- (b-4) Notwithstanding any other provision of this code, a school district or open-enrollment charter school may not be required to offer any aspect of a common core state standards curriculum.
- (c) The State Board of Education, with the direct participation of educators, parents, business and industry representatives, and employers shall by rule identify the essential knowledge and skills of each subject of the required curriculum that all students should be able to demonstrate and that will be used in evaluating instructional materials under Chapter [31](#) and addressed on the assessment instruments required under Subchapter B, Chapter [39](#). As a condition of accreditation, the board shall require each district to provide instruction in the essential knowledge and skills at appropriate grade levels and to make available to each high school student in the district an Algebra II course.

- (c-1) The State Board of Education shall adopt rules requiring students enrolled in grade levels six, seven, and eight to complete at least one fine arts course during those grade levels as part of a district's fine arts curriculum.
- (c-2) Each time the Texas Higher Education Coordinating Board revises the Internet database of the coordinating board's official statewide inventory of workforce education courses, the State Board of Education shall by rule revise the essential knowledge and skills of any corresponding career and technology education curriculum as provided by Subsection (c).
- (c-3) In adopting the essential knowledge and skills for the technology applications curriculum for kindergarten through grade eight, the State Board of Education shall adopt essential knowledge and skills that include coding, computer programming, computational thinking, and cybersecurity. The State Board of Education shall review and revise, as needed, the essential knowledge and skills of the technology applications curriculum every five years to ensure the curriculum:
 - (1) is relevant to student education; and
 - (2) aligns with current or emerging professions.
- (d) The physical education curriculum required under Subsection (a)(2)(C) must be sequential, developmentally appropriate, and designed, implemented, and evaluated to enable students to develop the motor, self-management, and other skills, knowledge, attitudes, and confidence necessary to participate in physical activity throughout life. Each school district shall establish specific objectives and goals the district intends to accomplish through the physical education curriculum. In identifying the essential knowledge and skills of physical education, the State Board of Education shall ensure that the curriculum:
 - (1) emphasizes the knowledge and skills capable of being used during a lifetime of regular physical activity;
 - (2) is consistent with national physical education standards for:
 - (A) the information that students should learn about physical activity; and
 - (B) the physical activities that students should be able to perform;
 - (3) requires that, on a weekly basis, at least 50 percent of the physical education class be used for actual student physical activity and that the activity be, to the extent practicable, at a moderate or vigorous level;
 - (4) offers students an opportunity to choose among many types of physical activity in which to participate;
 - (5) offers students both cooperative and competitive games;
 - (6) meets the needs of students of all physical ability levels, including students who have a chronic health problem, disability, including a student who is a person with a disability described under Section [29.003\(b\)](#) or criteria developed by the agency in accordance with that section, or other special need that precludes the student from participating in regular physical education instruction but who might be able to participate in physical education that is suitably adapted and, if applicable, included in the student's individualized education program;
 - (7) takes into account the effect that gender and cultural differences might have on the degree of student interest in physical activity or on the types of physical activity in which a student is interested;
 - (8) teaches self-management and movement skills;
 - (9) teaches cooperation, fair play, and responsible participation in physical activity;
 - (10) promotes student participation in physical activity outside of school; and
 - (11) allows physical education classes to be an enjoyable experience for students.

- (e) American Sign Language is a language for purposes of Subsection (a)(2)(A). A public school may offer an elective course in the language.
- (f) A school district may offer courses for local credit in addition to those in the required curriculum. The State Board of Education shall:
 - (1) be flexible in approving a course for credit for high school graduation under this subsection; and
 - (2) approve courses in cybersecurity for credit for high school graduation under this subsection.
- (g) A local instructional plan may draw on state curriculum frameworks and program standards as appropriate. Each district is encouraged to exceed minimum requirements of law and State Board of Education rule. Each district shall ensure that all children in the district participate actively in a balanced curriculum designed to meet individual needs. Before the adoption of a major curriculum initiative, including the use of a curriculum management system, a district must use a process that:
 - (1) includes teacher input;
 - (2) provides district employees with the opportunity to express opinions regarding the initiative; and
 - (3) includes a meeting of the board of trustees of the district at which:
 - (A) information regarding the initiative is presented, including the cost of the initiative and any alternatives that were considered; and
 - (B) members of the public and district employees are given the opportunity to comment regarding the initiative.
- (g-1) A district may also offer a course or other activity, including an apprenticeship or training hours needed to obtain an industry-recognized credential or certificate, that is approved by the board of trustees for credit without obtaining State Board of Education approval if:
 - (1) the district develops a program under which the district partners with a public or private institution of higher education and local business, labor, and community leaders to develop and provide the courses; and
 - (2) the course or other activity allows students to enter:
 - (A) a career or technology training program in the district's region of the state;
 - (B) an institution of higher education without remediation;
 - (C) an apprenticeship training program; or
 - (D) an internship required as part of accreditation toward an industry-recognized credential or certificate for course credit.
- (g-2) Each school district shall annually report to the agency the names of the courses, programs, institutions of higher education, and internships in which the district's students have enrolled under Subsection (g-1) and the names of the courses and institutions of higher education in which the district's students have enrolled under Subsection (g-3). The agency shall make available information provided under this subsection to other districts.
- (g-3) A district may also offer a course in cybersecurity that is approved by the board of trustees for credit without obtaining State Board of Education approval if the district partners with a public or private institution of higher education that offers an undergraduate degree program in cybersecurity to develop and provide the course.
- (h) The State Board of Education and each school district shall foster the continuation of the tradition of teaching United States and Texas history and the free enterprise system in regular subject matter and in reading courses and in the adoption of instructional materials. A primary purpose of the public school curriculum is to prepare thoughtful, active citizens who understand the importance of patriotism and can function productively in a free enterprise society with appreciation for the basic democratic values of our state and national heritage.

- (i) The State Board of Education shall adopt rules for the implementation of this subchapter. Except as provided by Subsection (j), the board may not adopt rules that designate the methodology used by a teacher or the time spent by a teacher or a student on a particular task or subject.
- (j) The State Board of Education by rule may require laboratory instruction in secondary science courses and may require a specific amount or percentage of time in a secondary science course that must be laboratory instruction.
- (k) The State Board of Education, in consultation with the Department of State Health Services and the Texas Diabetes Council, shall develop a diabetes education program that a school district may use in the health curriculum under Subsection (a)(2)(B).
- (l) A school district shall require a student enrolled in full-day prekindergarten, in kindergarten, or in a grade level below grade six to participate in moderate or vigorous daily physical activity for at least 30 minutes throughout the school year as part of the district's physical education curriculum or through structured activity during a school campus's daily recess. To the extent practicable, a school district shall require a student enrolled in prekindergarten on less than a full-day basis to participate in the same type and amount of physical activity as a student enrolled in full-day prekindergarten. A school district shall require students enrolled in grade levels six, seven, and eight to participate in moderate or vigorous daily physical activity for at least 30 minutes for at least four semesters during those grade levels as part of the district's physical education curriculum. If a school district determines, for any particular grade level below grade six, that requiring moderate or vigorous daily physical activity is impractical due to scheduling concerns or other factors, the district may as an alternative require a student in that grade level to participate in moderate or vigorous physical activity for at least 135 minutes during each school week. Additionally, a school district may as an alternative require a student enrolled in a grade level for which the district uses block scheduling to participate in moderate or vigorous physical activity for at least 225 minutes during each period of two school weeks. A school district must provide for an exemption for:
 - (1) any student who is unable to participate in the required physical activity because of illness or disability; and
 - (2) a middle school or junior high school student who participates in an extracurricular activity with a moderate or vigorous physical activity component that is considered a structured activity under rules adopted by the commissioner.
- (l-1) In adopting rules relating to an activity described by Subsection (l)(2), the commissioner may permit an exemption for a student who participates in a school-related activity or an activity sponsored by a private league or club only if the student provides proof of participation in the activity.
- (l-2) To encourage school districts to promote physical activity for children through classroom curricula for health and physical education, the agency, in consultation with the Department of State Health Services, shall designate nationally recognized health and physical education program guidelines that a school district may use in the health curriculum under Subsection (a)(2)(B) or the physical education curriculum under Subsection (a)(2)(C).
- (l-3)
 - (1) This subsection may be cited as "Lauren's Law."
 - (2) The State Board of Education, the Department of State Health Services, or a school district may not adopt any rule, policy, or program under Subsections (a), (k), (l), (l-1), or (l-2) that would prohibit a parent or grandparent of a student from providing any food product of the parent's or grandparent's choice to:
 - (A) children in the classroom of the child of the parent or grandparent on the occasion of the child's birthday; or
 - (B) children at a school-designated function.
- (m) Section [2001.039](#), Government Code, as added by Chapter 1499, Acts of the 76th Legislature, Regular Session, 1999, does not apply to a rule adopted by the State Board of Education under Subsection (c) or (d).

- (n) The State Board of Education may by rule develop and implement a plan designed to incorporate foundation curriculum requirements into the career and technology education curriculum under Subsection (a)(2)(E).
- (o) In approving career and technology courses, the State Board of Education must determine that at least 50 percent of the approved courses are cost-effective for a school district to implement.
- (p) The State Board of Education, in conjunction with the office of the attorney general, shall develop a parenting and paternity awareness program that a school district shall use in the district's high school health curriculum. A school district may use the program developed under this subsection in the district's middle or junior high school curriculum. At the discretion of the district, a teacher may modify the suggested sequence and pace of the program at any grade level. The program must:
 - (1) address parenting skills and responsibilities, including child support and other legal rights and responsibilities that come with parenthood;
 - (2) address relationship skills, including money management, communication skills, and marriage preparation; and
 - (3) in district middle, junior high, or high schools that do not have a family violence prevention program, address skills relating to the prevention of family violence.
- (p-2) A school district may develop or adopt research-based programs and curriculum materials for use in conjunction with the program developed under Subsection (p). The programs and curriculum materials may provide instruction in:
 - (1) child development;
 - (2) parenting skills, including child abuse and neglect prevention; and
 - (3) assertiveness skills to prevent teenage pregnancy, abusive relationships, and family violence.
- (p-3) The agency shall evaluate programs and curriculum materials developed under Subsection (p-2) and distribute to other school districts information regarding those programs and materials.
- (p-4) A student under 14 years of age may not participate in a program developed under Subsection (p) without the permission of the student's parent or person standing in parental relation to the student.
- (q) Repealed by Acts 2013, 83rd Leg., R.S., Ch. 211, Sec. 78(b)(1), eff. September 1, 2014.
- (r) In adopting the essential knowledge and skills for the health curriculum under Subsection (a)(2)(B), the State Board of Education shall adopt essential knowledge and skills that address the science, risk factors, causes, dangers, [causes,] consequences, signs, symptoms, and treatment of substance abuse, including the use of illegal drugs, abuse of prescription drugs, abuse of alcohol such as by binge drinking or other excessive drinking resulting in [and] alcohol poisoning, inhaling solvents, and other forms of substance abuse. The agency shall compile a list of evidence-based substance abuse [alcohol] awareness programs from which a school district shall choose a program to use in the district's middle school, junior high school, and high school health curriculum. In this subsection, "evidence-based substance abuse [alcohol] awareness program" means a program, practice, or strategy that has been proven to effectively prevent substance abuse [or delay alcohol use] among students, as determined by evaluations that are evidence-based [use valid and reliable measures and that are published in peer reviewed journals].
- (s) In this subsection, "bullying" has the meaning assigned by Section [37.0832](#) and "harassment" has the meaning assigned by Section [37.001](#). In addition to any other essential knowledge and skills the State Board of Education adopts for the health curriculum under Subsection (a)(2)(B), the board shall adopt for the health curriculum, in consultation with the Texas School Safety Center, essential knowledge and skills that include evidence-based practices that will effectively address awareness, prevention, identification, self-defense in response to, and resolution of and intervention in bullying and harassment.
- (t) The State Board of Education, in consultation with the commissioner of higher education and business and industry leaders, shall develop an advanced language course that a school district may use in the curriculum under Subsection (a)(2)(A) to provide students with instruction in industry-related terminology that

prepares students to communicate in a language other than English in a specific professional, business, or industry environment.

(w) Repealed section 28.002 (w)

~~(w) In adopting the essential knowledge and skills for the health curriculum under Subsection (a)(2)(B), the State Board of Education shall adopt essential knowledge and skills that address the dangers, causes, consequences, signs, symptoms, and treatment of nonmedical use of prescription drugs. The agency shall compile a list of evidence-based prescription drug misuse awareness programs from which a school district may choose a program to use in the district's middle school, junior high school, and high school health curriculums. In this subsection, an "evidence-based prescription drug misuse awareness program" means a program, practice, or strategy that has been proven to effectively prevent nonmedical use of prescription drugs among students, as determined by evaluations that use valid and reliable measures and that are published in peer-reviewed journals.~~

(z) The State Board of Education by rule shall require each school district to incorporate instruction in digital citizenship into the district's curriculum, including information regarding the potential criminal consequences of cyberbullying. In this subsection:

(1) "Cyberbullying" has the meaning assigned by Section 37.0832.

(2) "Digital citizenship" means the standards of appropriate, responsible, and healthy online behavior, including the ability to access, analyze, evaluate, create, and act on all forms of digital communication.

TEXAS EDUCATION CODE
CHAPTER 28. COURSES OF STUDY; ADVANCEMENT
SUBCHAPTER B. ADVANCEMENT, PLACEMENT, CREDIT, AND
ACADEMIC ACHIEVEMENT RECORD

TEC, §28.025. HIGH SCHOOL DIPLOMA AND CERTIFICATE; ACADEMIC ACHIEVEMENT RECORD.

- (a) The State Board of Education by rule shall determine curriculum requirements for the foundation high school program that are consistent with the required curriculum under Section [28.002](#). The State Board of Education shall designate the specific courses in the foundation curriculum under Section [28.002](#) (a)(1) required under the foundation high school program. Except as provided by this section, the State Board of Education may not designate a specific course or a specific number of credits in the enrichment curriculum as requirements for the program.
- (b) A school district shall ensure that each student, on entering ninth grade, indicates in writing an endorsement under Subsection (c-1) that the student intends to earn. A district shall permit a student to choose, at any time, to earn an endorsement other than the endorsement the student previously indicated. A student may graduate under the foundation high school program without earning an endorsement if, after the student's sophomore year:
 - (1) the student and the student's parent or person standing in parental relation to the student are advised by a school counselor of the specific benefits of graduating from high school with one or more endorsements; and
 - (2) the student's parent or person standing in parental relation to the student files with a school counselor written permission, on a form adopted by the agency, allowing the student to graduate under the foundation high school program without earning an endorsement.
- (b-1) The State Board of Education by rule shall require that the curriculum requirements for the foundation high school program under Subsection (a) include a requirement that students successfully complete:
 - (1) four credits in English language arts under Section [28.002](#)(a)(1)(A), including one credit in English I, one credit in English II, one credit in English III, and one credit in an advanced English course authorized under Subsection (b-2);
 - (2) three credits in mathematics under Section [28.002](#)(a)(1)(B), including one credit in Algebra I, one credit in geometry, and one credit in any advanced mathematics course authorized under Subsection (b-2);
 - (3) three credits in science under Section [28.002](#)(a)(1)(C), including one credit in biology, one credit in any advanced science course authorized under Subsection (b-2), and one credit in integrated physics and chemistry or in an additional advanced science course authorized under Subsection (b-2);
 - (4) three credits in social studies under Section [28.002](#)(a)(1)(D), including one credit in United States history, at least one-half credit in government and at least one-half credit in economics, and one credit in world geography or world history;
 - (5) except as provided under Subsections (b-12), (b-13), and (b-14), two credits in the same language in a language other than English under Section [28.002](#)(a)(2)(A);
 - (6) five elective credits;
 - (7) one credit in fine arts under Section [28.002](#)(a)(2)(D); and

- (8) except as provided by Subsection (b-11), one credit in physical education under Section [28.002\(a\)\(2\)\(C\)](#).
- (b-2) In adopting rules under Subsection (b-1), the State Board of Education shall:
- (1) provide for a student to comply with the curriculum requirements for an advanced English course under Subsection (b-1)(1), for an advanced mathematics course under Subsection (b-1)(2), and for any advanced science course under Subsection (b-1)(3) by successfully completing a course in the appropriate content area that has been approved as an advanced course by board rule or that is offered as an advanced course for credit without board approval as provided by Section [28.002\(g-1\)](#); and
 - (2) allow a student to comply with the curriculum requirements for the third and fourth mathematics credits under Subsection (b-1)(2) or the third and fourth science credits under Subsection (b-1)(3) by successfully completing an advanced career and technical course designated by the State Board of Education as containing substantively similar and rigorous academic content.
- (b-3) In adopting rules for purposes of Subsection (b-2), the State Board of Education must approve a variety of advanced English, mathematics, and science courses that may be taken to comply with the foundation high school program requirements, provided that each approved course prepares students to enter the workforce successfully or postsecondary education without remediation.
- (b-4) A school district may offer the curriculum described in Subsections (b-1)(1) through (4) in an applied manner. Courses delivered in an applied manner must cover the essential knowledge and skills, and the student shall be administered the applicable end-of-course assessment instrument as provided by Sections [39.023\(c\)](#) and [39.025](#).
- (b-5) A school district may offer a mathematics or science course to be taken by a student after completion of Algebra II and physics. A course approved under this subsection must be endorsed by an institution of higher education as a course for which the institution would award course credit or as a prerequisite for a course for which the institution would award course credit.
- ~~(b-6) Repealed by Acts 2013, 83rd Leg., R.S., Ch. 211, Sec. 78(b)(3), eff. September 1, 2014.~~
- ~~(b-6) A school district may allow a student to enroll concurrently in Algebra I and geometry.~~
- (b-7) The State Board of Education, in coordination with the Texas Higher Education Coordinating Board, shall adopt rules to ensure that a student may comply with the curriculum requirements under the foundation high school program or for an endorsement under Subsection (c-1) by successfully completing appropriate courses in the core curriculum of an institution of higher education under Section [61.822](#). Notwithstanding Subsection (b-15) or (c) of this section, Section [39.025](#), or any other provision of this code and notwithstanding any school district policy, a student who has completed the core curriculum of an institution of higher education under Section [61.822](#), as certified by the institution in accordance with commissioner rule, is considered to have earned a distinguished level of achievement under the foundation high school program and is entitled to receive a high school diploma from the appropriate high school as that high school is determined in accordance with commissioner rule. A student who is considered to have earned a distinguished level of achievement under the foundation high school program under this subsection may apply for admission to an institution of higher education for the first semester or other academic term after the semester or other academic term in which the student completes the core curriculum.
- (b-8) Repealed by Acts 2013, 83rd Leg., R.S., Ch. 211, Sec. 78(b)(3), eff. September 1, 2014.
- (b-9) A school district, with the approval of the commissioner, may allow a student to satisfy the fine arts credit required under Subsection (b-1)(7) by participating in a community-based fine arts

program not provided by the school district in which the student is enrolled. The fine arts program must provide instruction in the essential knowledge and skills identified for fine arts by the State Board of Education under Section [28.002\(c\)](#). The fine arts program may be provided on or off a school campus and outside the regular school day.

- (b-10) A school district, with the approval of the commissioner, may allow a student to comply with the curriculum requirements for the physical education credit required under Subsection (b-1)(8) by participating in a private or commercially sponsored physical activity program provided on or off a school campus and outside the regular school day.
- (b-11) In adopting rules under Subsection (b-1), the State Board of Education shall allow a student who is unable to participate in physical activity due to disability or illness to substitute one credit in English language arts, mathematics, science, or social studies, one credit in a course that is offered for credit as provided by Section [28.002\(g-1\)](#), or one academic elective credit for the physical education credit required under Subsection (b-1)(8). A credit allowed to be substituted under this subsection may not also be used by the student to satisfy a graduation requirement other than completion of the physical education credit. The rules must provide that the determination regarding a student's ability to participate in physical activity will be made by:
 - (1) if the student receives special education services under Subchapter A, Chapter [29](#), the student's admission, review, and dismissal committee;
 - (2) if the student does not receive special education services under Subchapter A, Chapter [29](#), but is covered by Section 504, Rehabilitation Act of 1973 (29 U.S.C. Section 794), the committee established for the student under that Act; or
 - (3) if each of the committees described by Subdivisions (1) and (2) is inapplicable, a committee established by the school district of persons with appropriate knowledge regarding the student.
- (b-12) In adopting rules under Subsection (b-1), the State Board of Education shall adopt criteria to allow a student to comply with the curriculum requirements for the two credits in a language other than English required under Subsection (b-1)(5) by substituting two credits in computer programming languages, including computer coding.
- (b-13) In adopting rules under Subsection (b-1), the State Board of Education shall allow a student to substitute credit in another appropriate course for the second credit in the same language in a language other than English otherwise required by Subsection (b-1)(5) if the student, in completing the first credit required under Subsection (b-1)(5), demonstrates that the student is unlikely to be able to complete the second credit. The board rules must establish:
 - (1) the standards and, as applicable, the appropriate school personnel for making a determination under this subsection; and
 - (2) appropriate substitute courses for purposes of this subsection.
- (b-14) In adopting rules under Subsection (b-1), the State Board of Education shall allow a student who, due to disability, is unable to complete two courses in the same language in a language other than English, as provided under Subsection (b-1)(5), to substitute for those credits two credits in English language arts, mathematics, science, or social studies or two credits in career and technology education, technology applications, or other academic electives. A credit allowed to be substituted under this subsection may not also be used by the student to satisfy a graduation credit requirement other than credit for completion of a language other than English. The rules must provide that the determination regarding a student's ability to participate in language-other-than-English courses will be made by:

- (1) if the student receives special education services under Subchapter A, Chapter [29](#), the student's admission, review, and dismissal committee; or
 - (2) if the student does not receive special education services under Subchapter A, Chapter [29](#), but is covered by Section 504, Rehabilitation Act of 1973 (29 U.S.C. Section 794), the committee established for the student under that Act.
- (b-15) A student may earn a distinguished level of achievement under the foundation high school program by successfully completing:
- (1) four credits in mathematics, which must include Algebra II and the courses described by Subsection (b-1)(2);
 - (2) four credits in science, which must include the courses described by Subsection (b-1)(3);
 - (3) the remaining curriculum requirements under Subsection (b-1); and
 - (4) the curriculum requirements for at least one endorsement under Subsection (c-1).
- (b-16) A student may satisfy an elective credit required under Subsection (b-1)(6) with a credit earned to satisfy the additional curriculum requirements for the distinguished level of achievement under the foundation high school program or an endorsement under Subsection (c-1). This subsection may apply to more than one elective credit.
- (b-17) The State Board of Education shall adopt rules to ensure that a student may comply with the curriculum requirements under Subsection (b-1)(6) by successfully completing an advanced career and technical course, including a course that may lead to an industry-recognized credential or certificate or an associate degree.
- (b-18) In adopting rules under Subsection (b-1), the State Board of Education shall allow a student to comply with the curriculum requirements under Subsection (b-1) by successfully completing a dual credit course.
- (b-19) In adopting rules under Subsection (b-1), the State Board of Education shall adopt criteria to allow a student to comply with curriculum requirements for the world geography or world history credit under Subsection (b-1)(4) by successfully completing a combined world history and world geography course developed by the State Board of Education.
- (b-20) The State Board of Education shall adopt rules to include the instruction developed under Section [28.012](#) in one or more courses in the required curriculum for students in grade levels 9 through 12.
- (b-21) In adopting rules under Subsection (b-1), the State Board of Education shall adopt criteria to allow a student to comply with the curriculum requirement for one credit under Subsection (b-1)(5) by successfully completing at an elementary school either a dual language immersion program under Section [28.0051](#) or a course in American Sign Language [at an elementary school].
- (c) A person may receive a diploma if the person is eligible for a diploma under Section [28.0251](#). In other cases, a student may graduate and receive a diploma only if:
- (1) the student successfully completes the curriculum requirements identified by the State Board of Education under Subsection (a) and complies with Sections [28.0256](#) and [Section] [39.025](#); or
 - (2) the student successfully completes an individualized education program developed under Section [29.005](#).

(c-1) A student may earn an endorsement on the student's transcript by successfully completing curriculum requirements for that endorsement adopted by the State Board of Education by rule. The State Board of Education by rule shall provide students with multiple options for earning each endorsement, including, to the greatest extent possible, coherent sequences of courses. The State Board of Education by rule must permit a student to enroll in courses under more than one endorsement curriculum before the student's junior year. An endorsement under this subsection may be earned in any of the following categories:

- (1) science, technology, engineering, and mathematics (STEM), which includes courses directly related to science, including environmental science, technology, including computer science, cybersecurity, and computer coding, engineering, and advanced mathematics;
- (2) business and industry, which includes courses directly related to database management, information technology, communications, accounting, finance, marketing, graphic design, architecture, construction, welding, logistics, automotive technology, agricultural science, and heating, ventilation, and air conditioning;
- (3) public services, which includes courses directly related to health sciences and occupations, mental health, education and training, law enforcement, and culinary arts and hospitality;
- (4) arts and humanities, which includes courses directly related to political science, world languages, cultural studies, English literature, history, and fine arts; and
- (5) multidisciplinary studies, which allows a student to:
 - (A) select courses from the curriculum of each endorsement area described by Subdivisions (1) through (4); and
 - (B) earn credits in a variety of advanced courses from multiple content areas sufficient to complete the distinguished level of achievement under the foundation high school program.

(c-2) In adopting rules under Subsection (c-1), the State Board of Education shall:

- (1) require a student in order to earn any endorsement to successfully complete:
 - (A) four credits in mathematics, which must include:
 - (i) the courses described by Subsection (b-1)(2); and
 - (ii) an additional advanced mathematics course authorized under Subsection (b-2) or an advanced career and technology course designated by the State Board of Education;
 - (B) four credits in science, which must include:
 - (i) the courses described by Subsection (b-1)(3); and
 - (ii) an additional advanced science course authorized under Subsection (b-2) or an advanced career and technology course designated by the State Board of Education; and
 - (C) two elective credits in addition to the elective credits required under Subsection (b-1)(6); and
- (2) develop additional curriculum requirements for each endorsement with the direct participation of educators and business, labor, and industry representatives, and shall require each school district to report to the agency the categories of endorsements under

Subsection (c-1) for which the district offers all courses for curriculum requirements, as determined by board rule.

- (c-3) In adopting rules under Subsection (c-1), the State Board of Education shall adopt criteria to allow a student participating in the arts and humanities endorsement under Subsection (c-1)(4), with the written permission of the student's parent or a person standing in parental relation to the student, to comply with the curriculum requirements for science required under Subsection (c-2)(1)(B)(ii) by substituting for an advanced course requirement a course related to that endorsement.
- (c-4) Each school district must make available to high school students courses that allow a student to complete the curriculum requirements for at least one endorsement under Subsection (c-1). A school district that offers only one endorsement curriculum must offer the multidisciplinary studies endorsement curriculum.
- (c-5) A student may earn a performance acknowledgment on the student's transcript by satisfying the requirements for that acknowledgment adopted by the State Board of Education by rule. An acknowledgment under this subsection may be earned:
 - (1) for outstanding performance:
 - (A) in a dual credit course;
 - (B) in bilingualism and biliteracy;
 - (C) on a college advanced placement test or international baccalaureate examination;
 - (D) on an established, valid, reliable, and nationally norm-referenced preliminary college preparation assessment instrument used to measure a student's progress toward readiness for college and the workplace; or
 - (E) on an established, valid, reliable, and nationally norm-referenced assessment instrument used by colleges and universities as part of their undergraduate admissions process; or
 - (2) for earning a state recognized or nationally or internationally recognized business or industry certification or license.
- (c-6) Notwithstanding Subsection (c), a person may receive a diploma if the person is eligible for a diploma under Section [28.0258](#). This subsection expires September 1, ~~2019~~ 2023.
- (c-7) Subject to Subsection (c-8), a student who is enrolled in a special education program under Subchapter A, Chapter 29, may earn an endorsement on the student's transcript by:
 - (1) successfully completing, with or without modification of the curriculum:
 - (A) the curriculum requirements identified by the State Board of Education under Subsection (a); and
 - (B) the additional endorsement curriculum requirements prescribed by the State Board of Education under Subsection (c-2); and
 - (2) successfully completing all curriculum requirements for that endorsement adopted by the State Board of Education:
 - (A) without modification of the curriculum; or

(B) with modification of the curriculum, provided that the curriculum, as modified, is sufficiently rigorous as determined by the student's admission, review, and dismissal committee.

- (c-8) For purposes of Subsection (c-7), the admission, review, and dismissal committee of a student in a special education program under Subchapter A, Chapter 29, shall determine whether the student is required to achieve satisfactory performance on an end-of-course assessment instrument to earn an endorsement on the student's transcript.
- (c-10) In adopting rules under Subsection (c-1), the State Board of Education shall adopt or select five technology applications courses on cybersecurity to be included in a cybersecurity pathway for the science, technology, engineering, and mathematics endorsement.
- (d) A school district may issue a certificate of coursework completion to a student who successfully completes the curriculum requirements identified by the State Board of Education under Subsection (a) but who fails to comply with Section [39.025](#). A school district may allow a student who receives a certificate to participate in a graduation ceremony with students receiving high school diplomas.
- (e) Each school district shall report the academic achievement record of students who have completed the foundation high school program on transcript forms adopted by the State Board of Education. The transcript forms adopted by the board must be designed to clearly identify whether a student received a diploma or a certificate of coursework completion.
- (e-1) A school district shall clearly indicate a distinguished level of achievement under the foundation high school program as described by Subsection (b-15), an endorsement described by Subsection (c-1), and a performance acknowledgment described by Subsection (c-5) on the transcript of a student who satisfies the applicable requirements. The State Board of Education shall adopt rules as necessary to administer this subsection.
- (e-2) At the end of each school year, each school district shall report through the Public Education Information Management System (PEIMS) the number of district students who, during that school year, were:
- (1) enrolled in the foundation high school program;
 - (2) pursuing the distinguished level of achievement under the foundation high school program as provided by Subsection (b-15); and
 - (3) enrolled in a program to earn an endorsement described by Subsection (c-1).
- (e-3) Information reported under Subsection (e-2) must be disaggregated by all student groups served by the district, including categories of race, ethnicity, socioeconomic status, sex, and populations served by special programs, including students in special education programs under Subchapter A, Chapter [29](#).
- (f) A school district shall issue a certificate of attendance to a student who receives special education services under Subchapter A, Chapter [29](#), and who has completed four years of high school but has not completed the student's individualized education program. A school district shall allow a student who receives a certificate to participate in a graduation ceremony with students receiving high school diplomas. A student may participate in only one graduation ceremony under this subsection. This subsection does not preclude a student from receiving a diploma under Subsection (c)(2).
- (g) Repealed by Acts 2013, 83rd Leg., R.S., Ch. 211, Sec. 78(b)(3), eff. September 1, 2014.

- (h) The commissioner by rule shall adopt a transition plan to implement and administer the amendments made by H.B. No. 5, 83rd Legislature, Regular Session, 2013, replacing the minimum, recommended, and advanced high school programs with the foundation high school program beginning with the 2014-2015 school year. Under the transition plan, a student who entered the ninth grade before the 2014-2015 school year must be permitted to complete the curriculum requirements required for high school graduation under:
- (1) the foundation high school program, if the student chooses during the 2014-2015 school year to take courses under this program;
 - (2) the minimum high school program, as that program existed before the adoption of H.B. No. 5, 83rd Legislature, Regular Session, 2013, if the student was participating in that program before the 2014-2015 school year;
 - (3) the recommended high school program, as that program existed before the adoption of H.B. No. 5, 83rd Legislature, Regular Session, 2013, if the student was participating in that program before the 2014-2015 school year; or
 - (4) the advanced high school program, as that program existed before the adoption of H.B. No. 5, 83rd Legislature, Regular Session, 2013, if the student was participating in that program before the 2014-2015 school year.
- (h-1) This subsection and Subsection (h) expire September 1, 2018.
- (i) If an 11th or 12th grade student who is homeless or in the conservatorship of the Department of Family and Protective Services transfers to a different school district and the student is ineligible to graduate from the district to which the student transfers, the district from which the student transferred shall award a diploma at the student's request, if the student meets the graduation requirements of the district from which the student transferred. [~~In this subsection, "student who is homeless" has the meaning assigned to the term "homeless children and youths" under 42 U.S.C. Section 11434a].~~]

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE F. CURRICULUM, PROGRAMS, AND SERVICES
CHAPTER 31. INSTRUCTIONAL MATERIALS
SUBCHAPTER A. GENERAL PROVISIONS

TEC, §31.003. RULES.

The State Board of Education may adopt rules, consistent with this chapter, for the adoption, requisition, distribution, care, use, and disposal of instructional materials.

TEXAS EDUCATION CODE
CHAPTER 31. INSTRUCTIONAL MATERIALS
SUBCHAPTER A. GENERAL PROVISIONS

TEC, §31.022. INSTRUCTIONAL MATERIALS REVIEW AND ADOPTION.

- (a) The State Board of Education shall adopt a review and adoption cycle for instructional materials for elementary grade levels, including prekindergarten, and secondary grade levels, for each subject in the required curriculum under Section 28.002. In adopting the cycle, the board:
 - (1) is not required to review and adopt instructional materials for all grade levels in a single year; and
 - (2) shall give priority to instructional materials in the following subjects:
 - (A) foundation curriculum subjects for which the essential knowledge and skills have been substantially revised and for which assessment instruments are required under Subchapter B, Chapter 39, including career and technology courses that satisfy foundation curriculum requirements as provided by Section 28.002(n);
 - (B) foundation curriculum subjects for which the essential knowledge and skills have been substantially revised, including career and technology courses that satisfy foundation curriculum requirements as provided by Section 28.002(n);
 - (C) foundation curriculum subjects not described by Paragraph (A) or (B), including career and technology courses that satisfy foundation curriculum requirements as provided by Section 28.002(n); and
 - (D) enrichment curriculum subjects.
- (b) The board shall organize the cycle for subjects in the foundation curriculum so that not more than one-fourth of the instructional materials for subjects in the foundation curriculum are reviewed each biennium. The board shall adopt rules to provide for a full and complete investigation of instructional materials for each subject in the foundation curriculum every eight years. The adoption of instructional materials for a subject in the foundation curriculum may be extended beyond the eight-year period only if the content of instructional materials for a subject is sufficiently current.
- (c) The board shall adopt rules to provide for a full and complete investigation of instructional materials for each subject in the enrichment curriculum on a cycle the board considers appropriate.
- (d) At least 12 months before the beginning of the school year for which instructional materials for a particular subject and grade level will be adopted under the review and adoption cycle, the board shall publish notice of the review and adoption cycle for those instructional materials. A request for production must allow submission of open education resource instructional materials that are available for use by the state without charge on the same basis as instructional materials offered for sale.
- (d-1) A notice published under Subsection (d) must state that a publisher of adopted instructional materials for a grade level other than prekindergarten must submit an electronic sample of the instructional materials as required by Sections 31.027(a) and (b) and may not submit a print sample copy.
- (e) The board shall designate a request for production of instructional materials in a subject area and grade level by the school year in which the instructional materials are intended to be made available in classrooms and not by the school year in which the board makes the request for production.
- (f) The board shall amend any request for production issued for the purchase of instructional materials to conform to the instructional materials funding levels provided by the General Appropriations Act for the year of implementation.
- (g) In reviewing and adopting instructional materials, the board shall consider a school district's need for technology as well as instructional materials and in any biennium may limit the adoption of instructional materials to provide sufficient resources to purchase technology resources, including digital curriculum.
- (h) The board shall include information regarding open education resource instructional materials during the adoption cycle, including any cost savings associated with the adoption of open education resource instructional materials.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE F. CURRICULUM, PROGRAMS, AND SERVICES
CHAPTER 31. INSTRUCTIONAL MATERIALS
SUBCHAPTER D. ADMINISTRATIVE PENALTIES AND PENAL PROVISIONS

TEC, §31.151. DUTIES OF PUBLISHERS AND MANUFACTURERS

- (a) A publisher or manufacturer of instructional materials:
- (1) shall furnish any instructional material the publisher or manufacturer offers in this state at a price that does not exceed the lowest price at which the publisher offers that instructional material for adoption or sale to any state, public school, or school district in the United States;
 - (2) shall automatically reduce the price of instructional material sold for use in a school district or open-enrollment charter school to the extent that the price is reduced elsewhere in the United States;
 - (3) shall provide any instructional material or ancillary item free of charge in this state to the same extent that the publisher or manufacturer provides the instructional material or ancillary item free of charge to any state, public school, or school district in the United States;
 - (4) shall guarantee that each copy of instructional material sold in this state is at least equal in quality to copies of that instructional material sold elsewhere in the United States and is free from factual error;
 - (5) may not become associated or connected with, directly or indirectly, any combination in restraint of trade in instructional materials or enter into any understanding or combination to control prices or restrict competition in the sale of instructional materials for use in this state;
 - (6) shall deliver instructional materials to a school district or open-enrollment charter school;
 - (7) shall, at the time an order for instructional materials is acknowledged, provide to school districts or open-enrollment charter schools an accurate shipping date for instructional materials that are back-ordered;
 - (8) shall guarantee delivery of instructional materials at least 10 business days before the opening day of school of the year for which the instructional materials are ordered if the instructional materials are ordered by a date specified in the sales contract; and
 - (9) shall submit to the State Board of Education an affidavit certifying any instructional material the publisher or manufacturer offers in this state to be free of factual errors at the time the publisher executes the contract required by Section [31.026](#).
- (b) The State Board of Education may impose a reasonable administrative penalty against a publisher or manufacturer who knowingly violates Subsection (a). The board shall provide for

a hearing to be held to determine whether a penalty is to be imposed and, if so, the amount of the penalty. The board shall base the amount of the penalty on:

- (1) the seriousness of the violation;
 - (2) any history of a previous violation;
 - (3) the amount necessary to deter a future violation;
 - (4) any effort to correct the violation; and
 - (5) any other matter justice requires.
- (c) A hearing under Subsection (b) shall be held according to rules adopted by the State Board of Education.
- (d) A penalty collected under this section shall be deposited to the credit of the state instructional materials and technology fund.
- (e) An eligible institution, as defined by Section [31.0241](#)(a), that offers open education resource instructional materials under Section [31.0241](#) is not a publisher or manufacturer for purposes of this section.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE I. SCHOOL FINANCE AND FISCAL MANAGEMENT
CHAPTER 44. FISCAL MANAGEMENT
SUBCHAPTER A. SCHOOL DISTRICT FISCAL MANAGEMENT

TEC, §44.001. FISCAL GUIDELINES.

- (a) The commissioner shall establish advisory guidelines relating to the fiscal management of a school district.
- (b) The commissioner shall report annually to the State Board of Education the status of school district fiscal management as reflected by the advisory guidelines and by statutory requirements.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE I. SCHOOL FINANCE AND FISCAL MANAGEMENT
CHAPTER 44. FISCAL MANAGEMENT
SUBCHAPTER A. SCHOOL DISTRICT FISCAL MANAGEMENT

TEC, §44.007. ACCOUNTING SYSTEM; REPORT.

- (a) A standard school fiscal accounting system must be adopted and installed by the board of trustees of each school district. The accounting system must conform with generally accepted accounting principles.
- (b) The accounting system must meet at least the minimum requirements prescribed by the commissioner, subject to review and comment by the state auditor.
- (c) A record must be kept of all revenues realized and of all expenditures made during the fiscal year for which a budget is adopted. A report of the revenues and expenditures for the preceding fiscal year shall be filed with the agency on or before the date set by the State Board of Education.
- (d) The State Board of Education shall require each district, as part of the report required by this section, to include management, cost accounting, and financial information in a format prescribed by the board and in a manner sufficient to enable the board to monitor the funding process and determine educational system costs by district, campus, and program.
- (e) Expired.
- (f) Expired.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE I. SCHOOL FINANCE AND FISCAL MANAGEMENT
CHAPTER 44. FISCAL MANAGEMENT
SUBCHAPTER A. SCHOOL DISTRICT FISCAL MANAGEMENT

TEC, §44.008. ANNUAL AUDIT; REPORT.

- (a) The board of school trustees of each school district shall have its school district fiscal accounts audited annually at district expense by a certified or public accountant holding a permit from the Texas State Board of Public Accountancy. The audit must be completed following the close of each fiscal year.
- (b) The independent audit must meet at least the minimum requirements and be in the format prescribed by the State Board of Education, subject to review and comment by the state auditor. The audit shall include an audit of the accuracy of the fiscal information provided by the district through the Public Education Information Management System (PEIMS).
- (c) Each treasurer receiving or having control of any school fund of any school district shall keep a full and separate itemized account with each of the different classes of its school funds coming into the treasurer 's hands. The treasurer 's records of the district 's itemized accounts and records shall be made available to audit.
- (d) A copy of the annual audit report, approved by the board of trustees, shall be filed by the district with the agency not 11 later than the 150th day after the end of the fiscal year for which the audit was made. If the board of trustees declines or refuses to approve its auditor 's report, it shall nevertheless file with the agency a copy of the audit report with its statement detailing reasons for failure to approve the report.
- (e) The audit reports shall be reviewed by the agency, and the commissioner shall notify the board of trustees of objections, violations of sound accounting practices or law and regulation requirements, or of recommendations concerning the audit reports that the commissioner wants to make. If the audit report reflects that penal laws have been violated, the commissioner shall notify the appropriate county or district attorney and the attorney general. The commissioner shall have access to all vouchers, receipts, district fiscal and financial records, and other school records as the commissioner considers necessary and appropriate for the review, analysis, and passing on audit reports.

TEXAS EDUCATION CODE
TITLE 2. PUBLIC EDUCATION
SUBTITLE I. SCHOOL FINANCE AND FISCAL MANAGEMENT
CHAPTER 44. FISCAL MANAGEMENT
SUBCHAPTER A. SCHOOL DISTRICT FISCAL MANAGEMENT

TEC, §44.010. REVIEW BY AGENCY.

The budgets, fiscal reports, and audit reports filed with the agency shall be reviewed and analyzed by the staff of the agency to determine whether all legal requirements have been met and to collect fiscal data needed in preparing school fiscal reports for the governor and the legislature.

TEXAS EDUCATION CODE
TITLE 2: PUBLIC EDUCATION
SUBTITLE I. SCHOOL FINANCE AND FISCAL MANAGEMENT
CHAPTER ~~48~~ [42]. FOUNDATION SCHOOL PROGRAM
SUBCHAPTER A. GENERAL PROVISIONS

TEC, §48.004 [~~42.004~~]. ADMINISTRATION OF THE PROGRAM.

The commissioner, [~~in accordance with the rules of the State Board of Education,~~] shall adopt rules and take [~~such~~] action and require [~~such~~] reports consistent with this chapter as [~~may be~~] necessary to implement and administer the Foundation School Program.

TEXAS GOVERNMENT CODE
TITLE 10. GENERAL GOVERNMENT
SUBTITLE A. ADMINISTRATIVE PROCEDURE AND PRACTICE
CHAPTER 2001. ADMINISTRATIVE PROCEDURE
SUBCHAPTER B. RULEMAKING

TGC, §2001.039. AGENCY REVIEW OF EXISTING RULES.

- (a) A state agency shall review and consider for readoption each of its rules in accordance with this section.
- (b) A state agency shall review a rule not later than the fourth anniversary of the date on which the rule takes effect and every four years after that date. The adoption of an amendment to an existing rule does not affect the dates on which the rule must be reviewed except that the effective date of an amendment is considered to be the effective date of the rule if the agency formally conducts a review of the rule in accordance with this section as part of the process of adopting the amendment.
- (c) The state agency shall readopt, readopt with amendments, or repeal a rule as the result of reviewing the rule under this section.
- (d) The procedures of this subchapter relating to the original adoption of a rule apply to the review of a rule and to the resulting repeal, readoption, or readoption with amendments of the rule, except as provided by this subsection. Publishing the Texas Administrative Code citation to a rule under review satisfies the requirements of this subchapter relating to publishing the text of the rule unless the agency readopts the rule with amendments as a result of the review.
- (e) A state agency's review of a rule must include an assessment of whether the reasons for initially adopting the rule continue to exist.

TEXAS OCCUPATIONS CODE
TITLE 2. GENERAL PROVISIONS RELATING TO LICENSING
CHAPTER 53. CONSEQUENCES OF CRIMINAL CONVICTION
SUBCHAPTER D. PRELIMINARY EVALUATION OF LICENSE ELIGIBILITY

TOC, §53.105. FEES.

A licensing authority may charge a person requesting an evaluation under this subchapter a fee adopted by the authority. Fees adopted by a licensing authority under this subchapter must be in an amount sufficient to cover the cost of administering this subchapter.

TEXAS OCCUPATIONS CODE
TITLE 2. GENERAL PROVISIONS RELATING TO LICENSING
CHAPTER 54. EXAMINATION ON RELIGIOUS HOLY DAY;
EXAMINATION ACCOMMODATIONS FOR PERSON WITH DYSLEXIA

TOC, §54.003. EXAMINATION ACCOMMODATIONS FOR PERSON WITH DYSLEXIA.

- (a) In this section, "dyslexia" has the meaning assigned by Section [51.970](#), Education Code.
- (b) For each licensing examination administered by a state agency, the agency shall provide reasonable examination accommodations to an examinee diagnosed as having dyslexia.
- (c) Each state agency shall adopt rules necessary to implement this section, including rules to establish the eligibility criteria an examinee must meet for accommodation under this section.

Minutes

State Board of Education

January 31, 2020

STATE BOARD OF EDUCATION
(State Board for Career and Technology Education)

KEVEN ELLIS, Lufkin
Chair of the State Board of Education
District 9

MARTY ROWLEY, Amarillo
Vice Chair of the State Board of
Education
District 15

GEORGINA PÉREZ, El Paso
Secretary of the State Board of
Education
District 1

Board Members

LAWRENCE ALLEN, JR., Houston
District 4

PAM LITTLE, Fairview
District 12

DONNA BAHORICH, Houston
District 6

TOM MAYNARD, Florence
District 10

BARBARA CARGILL, Conroe
District 8

SUE MELTON-MALONE, Robinson
District 14

RUBEN CORTEZ, JR., Brownsville
District 2

KEN MERCER, San Antonio
District 5

AICHA DAVIS, Dallas
District 13

MARISA PEREZ-DIAZ, Converse
District 3

PATRICIA HARDY, Fort Worth
District 11

MATT ROBINSON, Friendswood
District 7

Committees of the State Board of Education

INSTRUCTION

Sue Melton-Malone, chair
Pam Little, vice chair
Aicha Davis
Georgina C. Pérez
Marty Rowley

SCHOOL FINANCE/PERMANENT SCHOOL FUND

Tom Maynard, chair
Lawrence A. Allen, Jr., vice chair
Donna Bahorich
Patricia Hardy
Ken Mercer

SCHOOL INITIATIVES

Barbara Cargill, chair
Marisa B. Perez-Diaz, vice chair
Ruben Cortez, Jr.
Keven Ellis
Matt Robinson

Minutes
State Board of Education
January 31, 2020

The State Board of Education met at 9:04 a.m. on Friday, January 31, 2020, in the State Board of Education Room, #1-104, of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Keven Ellis, chair; Lawrence A. Allen, Jr.; Donna Bahorich; Barbara Cargill; Ruben Cortez, Jr.; Pat Hardy; Pam Little; Tom Maynard; Sue Melton-Malone; Ken Mercer; Georgina C. Pérez, secretary; Marisa B. Perez-Diaz; Matt Robinson; Marty Rowley, vice chair

Student performance

The student performance was provided by Memorial Middle School Chamber Orchestra in the Spring Branch Independent School District (ISD).

Invocation

Pledge of Allegiance

Roll Call

The State Board of Education considered items in the following order: Item number 1, 2, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 3, 4, 6, 7, 8, 9, 5

1. Resolutions and Presentations

The Milken National Educator Award obelisk was presented to teacher Susan Moreno of Dallas ISD by Chair Keven Ellis and Texas Milken Educator Award Coordinator Gabriela Duran-Lara.

Presidential Award for Excellence in Mathematics and Science Teaching

The State Board of Education, by unanimous consent, adopted a resolution honoring state and national finalists for the 2019 Presidential Awards for Excellence in Mathematics and Science Teaching program.

(ATTACHMENT 1, page 17)

The State Board of Education, by unanimous consent, adopted a resolution honoring national awardees for the 2017 Presidential Awards for Excellence in Mathematics and Science Teaching program.

(ATTACHMENT 2, page 19)

The State Board of Education, by unanimous consent, adopted a resolution honoring national awardees for the 2018 Presidential Awards for Excellence in Mathematics and Science Teaching program.

(ATTACHMENT 3, page 21)

Employers for Education Excellence Award

The State Board of Education, by unanimous consent, adopted a resolution honoring Toyota of Boerne, the Haynes Boone law firm, and Southwest Airlines as recipients of the gold Employers for Education Excellence award, the Dallas Fire-Rescue Department and Accenture as recipients of the silver Education Excellence award, and Pricewaterhouse Coopers and Thomas Reuters as recipients of the bronze Education Excellence award.

(ATTACHMENT 4, page 23)

Career and Technical Education Month

The State Board of Education, by unanimous consent, adopted a resolution proclaiming February 1-29, 2020 as Career and Technical Education Month in Texas.

(ATTACHMENT 5, page 25)

Public Testimony

The State Board of Education received no presentations of public testimony.

2. Approval of Consent Agenda

Any agenda item may be placed on the consent agenda by any State Board of Education committee. The State Board of Education may elect to take separate action on any item on the consent agenda.

By unanimous consent, the State Board of Education approved the following items on the consent agenda.

(1) Ratification of the Purchases and Sales of the Investment Portfolio of the Permanent School Fund for the Months of October and November 2019

(Board agenda page III-9)

(Committee on School Finance/Permanent School Fund)

The State Board of Education ratified the purchases and sales for the months of October and November 2019, in the amounts of \$756,881,353 and \$783,201,264 respectively (ATTACHMENT 6, page 27).

- (2) **Recommendation for Appointments to the to the Boys Ranch Independent School District Board of Trustees**
(Board agenda page IV-1)
(Committee on School Initiatives)

The State Board of Education, approved the reappointments of Mr. George Owen and Mr. Mark Strother to serve a two-year term of office, from January 31, 2020 to January 31, 2022, on the Boys Ranch Independent School District Board of Trustees.

- (3) **Recommendation for Appointments to the Randolph Field Independent School District Board of Trustees**
(Board agenda page IV-27)

The State Board of Education approved the reappointment of Ms. Vanessa Bowden, Mr. Jimmy Cornelius, and Mr. William Morrison to serve a term of office, from January 31, 2020 to January 31, 2022, on the Randolph Field Independent School District Board of Trustees.

COMMITTEE OF THE FULL BOARD

3. **One-Time Procedural Action to Correct Amendment to 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter B, State Adoption of Instructional Materials**
(Board agenda page I-5)

MOTION AND VOTE: *It was moved by Mr. Rowley and carried unanimously that the State Board of Education amend the previously adopted motion from the November 15, 2019 minutes of the State Board of Education to reinstate the sentence "Samples of submitted prekindergarten materials must match the format of the products to be provided to schools upon ordering" in 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter B, State Adoption of Instructional Materials, §66.28(d)(2), and to remove the sentence "Samples of adopted prekindergarten materials must match the format of the products to be provided to schools upon ordering" from §66.28(d)(7), as recommended by the Committee of the Full Board.*

(Mrs. Melton-Malone was absent for the vote.)

4. **Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements**
(First Reading and Filing Authorization)
(Board agenda page I-9)

MOTION AND VOTE: *It was moved by Mr. Rowley and carried unanimously that the State Board of Education approve for first reading and filing authorization proposed amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements; §74.12, Foundation High School Program; and §74.13, Endorsements, as recommended by the Committee of the Full Board.*

(Mrs. Melton-Malone was absent for the vote.)

5. **Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses (First Reading and Filing Authorization)**
(Board agenda page I-20)

MOTION: *It was moved by Mr. Rowley that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, as amended and recommended by the Committee of the Full Board.*

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Mr. Maynard and carried unanimously to approve the following recommendations from TEA staff:*

Add new §113.51(a) to read:

(a) General requirements. Students shall be awarded one credit for successful completion of this course. This course is recommended for students in Grades 10-12.

Amend SE (2)(A) and add new SE (2)(B) to clarify language as follows:

(2)(A) analyze the economic, political, and social reasons for ~~focusing~~ the African diaspora ~~on Africa~~, including the role of Africans, Europeans, ~~and colonization in North, Central, and South America, and the West Indies and neighboring islands, and the interactions among enslaved Africans and Native Americans;~~

(2)(B) compare and contrast the colonization of North, Central, and South America, and the West Indies and neighboring islands and analyze the interactions among enslaved Africans and Native Americans;

Revise SE (4)(C) to clarify the language and add Marcus Garvey in the correct time period as follows:

(4)(C) compare ~~examine~~ the opportunities and that resulted from challenges faced by African Americans ~~American men and women~~ from post-Reconstruction to the early 20th century and the viewpoints and actions of African Americans, including Ida B. Wells, W.E.B Du Bois, Booker T. Washington, Marcus Garvey, the National Association for the Advancement of Colored People (NAACP), Freedmen's Towns, and the Exodusters;

Strike Buffalo Soldiers from SE (4)(H) and add new SE (4)(D) as follows:

(4)(H) examine the experiences of African American soldiers during and after World War I; ~~and ,including the Buffalo Soldiers.~~

(4)(I) evaluate the impact of African American military service from Reconstruction through World War I, including the role of the Buffalo Soldiers.

Amend (10)(C) as follows:

(10)(C) identify and analyze the contributions of ~~civic participation~~ of African Americans in ~~terms of~~ leadership roles at local, state, and national ~~federal~~ levels of government, including U.S. Supreme Court cases.

(Mr. Cortez and Mrs. Melton-Malone were absent for the vote.)

MOTION AND VOTE: *It was moved by Ms. Pérez that the State Board of Education approve a series of amendments to §113.51 primarily to address verbs in the student expectations. The motion was withdrawn.*

MOTION AND VOTE: *It was moved by Mrs. Bahorich and carried that the State Board of Education consider each amendment proposed by Ms. Pérez separately.*

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Pérez, and carried that the State Board of Education amend §113.51(b)(2)(D) to read as follows:*

“~~analyze~~ explain the causes for the growth and development of slavery, primarily in the Southern colonies”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich and carried that the State Board of Education amend §113.51(b)(2)(C) to read as follows:*

“~~assess and discuss~~ describe and explain the impact of the Middle Passage on African American culture”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Pérez, and carried that the State Board of Education amend §113.51(b)(3)(A) to read as follows:*

“~~identify~~ analyze and evaluate the economic, social, religious, and legal rationalization used by Americans to continue and expand slavery after declaring independence from Great Britain”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(3)(D) to read as follows:*

“~~identify~~ analyze and evaluate various forms of individual and group resistance against the enslavement of African Americans”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(3)(F) to read as follows:*

“~~examine~~ analyze national and international abolition efforts, including the U.S. ban on the slave trade (1808), ~~and~~ the abolition of slavery in Mexico (1829) and Great Britain (1833), and the ~~role that~~ significance of the Guerrero Decree ~~played~~ in the Texas Revolution”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(4)(B) to read as follows:*

“describe and ~~analyze~~ explain the successes and failures of Reconstruction”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(4)(F) to read as follows:*

“~~evaluate~~ describe the impact of the 1896 Plessy v. Ferguson U.S. Supreme Court decision, Plessy v. Ferguson (1896)”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Pérez, and carried that the State Board of Education amend §113.51(b)(5)(D) to read as follows:*

“~~assess~~ describe the impact of racism during World War II”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(6)(B) to read as follows:*

“~~distinguish~~ describe the major contributions of contemporary African Americans and how their contributions have shaped the American experience such as Barbara Jordan, Shirley Chisholm, Condoleezza Rice, Earl G. Graves, Colin Powell, John H. Johnson, Muhammad Ali, and Barack Obama”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(7)(D) to read as follows:*

“analyze how environmental changes ~~have~~ impacted African American communities such as land use, settlement patterns, and urban development”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(8)(D) to read as follows:*

“explain how economic policies such as sharecropping, Jim Crow economics, and redlining ~~have~~ impacted the standard of living of African Americans”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(8)(G) to read as follows:*

“analyze how various geographic, cultural, social, political, and financial factors ~~have impacted~~ influenced the economic mobility of African Americans such as skin color, wealth, and educational background”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(8)(H) to read as follows:*

“~~analyze~~ evaluate the effectiveness of various approaches African Americans have used to solve economic issues”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(8)(J) to read as follows:*

“~~examine~~ analyze the contributions of African American and Black American Business entrepreneurship such as Black Wall Street, black inventors, and the black experience in business and the economic contributions of individuals such as Madam C. J. Walker and Fannie Lou Hamer”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Pérez, and carried that the State Board of Education amend §113.51(b)(9)(D) to read as follows:*

“~~analyze~~ explain how government policies, court actions, and legislation impacted African Americans from the 1920s through the 1950s”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(9)(F) to read as follows:*

“~~analyze~~ explain how the changing political environment ~~has impacted~~ influenced civil rights from the late 20th century to the present”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(10)(A) to read as follows:*

“analyze examples of conflict and cooperation between African Americans and other groups in the pursuit of individual freedoms and civil rights, such as the Freedom Riders and Memphis Sanitation Workers Strike”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(10)(B) to read as follows:*

“explain how various philosophies and ideologies have ~~played a role in~~ influenced the African American experience for social, political, and legal equality such as fair housing, equal opportunity, affirmative action, and voting rights”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Hardy, and carried that the State Board of Education amend §113.51(b)(11)(B) to read as follows:*

“analyze how regional differences ~~have impacted~~ influenced political perspectives of African American communities”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(11)(D) to read as follows:*

“~~evaluate~~ analyze selected contemporary African American issues that have led to diverse points of view in public discourse, including rights and activism”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(13)(A) to read as follows:*

“identify and ~~evaluate~~ describe the influence of African oral traditions, visual art, literary art, theater, music, and dance on African American culture”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(13)(B) to read as follows:*

“describe ~~and evaluate~~ the influence ~~impact~~ of enslavement on African American culture”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(13)(C) to read as follows:*

“identify ~~and evaluate~~ the contributions of early African American literature, including the works of Phillis Wheatley and Jupiter Hammon”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(14)(B) to read as follows:*

“~~examine~~ describe how various African American expressions of dance forms such as tap dance, step dance, hip hop, and modern dance, and the contributions of African American dancers, such as Katherine Dunham, Misty Copeland, Alvin Ailey, Bill “Bojangles” Robinson, and the Dance Theater of Harlem have contributed to the shared identity of various groups”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Ms. Pérez, and carried that the State Board of Education amend §113.51(b)(14)(D) to read as follows:*

“~~interpret the reviews~~ describe the reactions to and the influence of selected works by African American authors such as The Souls of Black Folk by W.E.B. Du Bois, Native Son by Richard Wright, Their Eyes Were Watching God by Zora Neale Hurston, and Eyes on the Prize by Henry Hampton”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(14)(E) to read as follows:*

“~~examine~~ describe storytelling, literary, filmmaking, and visual arts contributions related to self-identity made by African Americans such as Maya Angelou, bell hooks, John T. Biggers, Oscar Micheaux, Lorraine Hansberry, Amiri Baraka, August Wilson, Faith Ringgold, Sidney Poitier, Spike Lee, John Singleton, and Oprah Winfrey”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(14)(F) to read as follows:*

“~~explain~~ describe how characteristics of African American history and culture have been reflected in various genres of art, music, film, theatre, visual arts, and dance”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Mercer, and carried that the State Board of Education amend §113.51(b)(15)(C) to read as follows:*

“~~examine~~ describe the contributions of significant African American individuals to science, philosophy, mathematics, and technology, including Benjamin Banneker, Katherine Johnson, Henrietta Lacks, Mae Jemison, Dorothy Vaughan, George Washington Carver, Neil deGrasse Tyson, Granville Woods, and Mary Jackson”

(Mr. Cortez, Mrs. Melton-Malone, and Ms. Perez-Diaz were absent for the vote.)

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mr. Allen, and carried that the State Board of Education instruct staff to make technical edits to the social studies skills strand to match the streamlined social studies standards for other high school courses.*

(Mr. Cortez and Mrs. Melton-Malone were absent for the vote.)

VOTE: *A vote was taken on the motion that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, as amended and recommended by the Committee of the Full Board, as amended. The motion carried.*

(Mr. Allen, Mr. Cortez, and Mrs. Melton-Malone were absent for the vote.)

6. Proposed Revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education

(First Reading and Filing Authorization)

(Board agenda page I-43)

MOTION AND VOTE: *It was moved by Mr. Rowley and carried unanimously that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy, as recommended by the Committee of the Full Board.*

7. Amendments to Proclamation 2021 of the State Board of Education Advertising for Bids on Instructional Materials

(Board agenda page I-138)

MOTION AND VOTE: *It was moved by Mr. Rowley and carried unanimously that the State Board of Education approve proposed amendments to Proclamation 2021 of the State Board of Education Advertising for Bids on Instructional Materials, as recommended by the Committee of the Full Board.*

8. Update on Texas Essential Knowledge and Skills (TEKS) Review

(Board agenda page I-139)

MOTION AND VOTE: *It was moved by Mr. Rowley and carried that the State Board of Education direct the science TEKS review work groups to strongly consider maintaining the language in Biology student expectations 7.B, 4.A, and 6.A as well as 3.A, as recommended by the Committee of the Full Board.*

MOTION AND VOTE: *It was moved by Mr. Rowley and carried that the State Board of Education direct the science TEKS review work groups to standardize the language of student expectation 3.A in Biology, Chemistry, IPC, and Physics in all other high school science courses, as recommended by the Committee of the Full Board.*

MOTION: *It was moved by Mr. Rowley that the State Board of Education direct the science TEKS review work groups to consider how the K-12 Framework and the Next Generation Science Standards will be used as a resource to inform recommendations for revision of the science TEKS, as recommended by the Committee of the Full Board.*

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mrs. Bahorich, and carried to amend the motion to read:*

“direct the science TEKS review work groups to consider how the K-12 Framework will be used as a resource to inform recommendations for revision of the science TEKS”

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mrs. Cargill, and carried to amend the motion to read:*

“direct the science TEKS review work groups to consider how ‘A Framework for K-12 Science Education’ will be used as a resource to inform recommendations for revision of the science TEKS”

MOTION AND VOTE: *It was moved by Mrs. Bahorich, seconded by Mr. Maynard, and carried to amend the motion to read:*

“direct staff to provide the science TEKS review work groups with ‘A Framework for K-12 Science Education’ as a resource to inform recommendations for revision of the science TEKS”

VOTE: *A vote was taken on the motion to direct staff to provide the science TEKS review work groups with ‘A Framework for K-12 Science Education’ as a resource to inform recommendations for revision of the science TEKS, as amended. The motion carried unanimously.*

9. **Proposed New 19 TAC Chapter 61, School Districts, Subchapter B, Special Purpose School Districts, §61.101, Applicability of State Law for Special Purpose School Districts (First Reading and Filing Authorization)**
(Board agenda page I-142)

The committee postponed action on this item until April 2020; therefore, this item was removed from the agenda.

COMMITTEE ON INSTRUCTION

10. **Proposed Amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit**
(Second Reading and Final Adoption)

(Board agenda page II-1)

MOTION AND VOTE: *It was moved by Mrs. Melton-Malone and carried unanimously that the State Board of Education approve for second reading and final adoption the proposed amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit; and*

Make an affirmative finding that immediate adoption of proposed amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register, as recommended by the Committee on Instruction. (ATTACHMENT 7, page 29)

(Mrs. Bahorich and Mr. Maynard were absent for the vote.)

11. **Proposed Amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies One Credit), Adopted 2013**

(Second Reading and Final Adoption)

(Board agenda page II-6)

MOTION AND VOTE: *It was moved by Mrs. Melton-Malone and carried unanimously that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies (One Credit), Adopted 2013; and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies (One Credit), Adopted 2013, is necessary and shall have an effective date of August 1, vote.) 2020, as recommended by the Committee on Instruction. (ATTACHMENT 8, pg. 31)

(Mrs. Bahorich was absent for the vote.)

12. **Proposed Repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32**
(First Reading and Filing Authorization)
(Board agenda page II-11)

MOTION AND VOTE: *It was moved by Mrs. Melton-Malone and carried unanimously that the State Board of Education suspend the board operating procedures in accordance with §5.2(a) to allow consideration at first reading and filing authorization; and*

Approve for first reading and filing authorization the proposed repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32, as recommended by the Committee on Instruction.

13. **Adoption of Review of 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter A, General Provisions, Subchapter B, State Adoption of Instructional Materials, and Subchapter C, Local Operations**
(Adoption of Review)
(Board agenda page II-14)

MOTION AND VOTE: *It was moved by Mrs. Melton-Malone and carried unanimously that the State Board of Education adopt the review of 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter A, General Provisions, Subchapter B, State Adoption of Instructional Materials, and Subchapter C, Local Operations, as recommended by the Committee on Instruction.*

14. **Approval of Substitution of Instructional Materials for Origo Education**
(Board agenda page II-41)

The committee took no action; therefore, this item was removed from the agenda.

15. **Proposed Approval of Innovative Courses**
(Board agenda page II-42)

MOTION AND VOTE: *It was moved by Mrs. Melton-Malone and carried unanimously that the State Board of Education approve for a period of five years the following innovative courses that do not fall within any of the subject areas of the foundation or enrichment curriculum: Advanced Placement Seminar, Advanced Placement Research, Gifted and Talented Interdisciplinary Studies/Mentor Seminar I-IV, Logic I, and Logic II, as recommended by the Committee on Instruction.*

COMMITTEE ON SCHOOL FINANCE/PERMANENT SCHOOL FUND

- 16. Proposed Repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds (First Reading and Filing Authorization)**
(Board agenda page III-1)

MOTION AND VOTE: *It was moved by Mr. Maynard and carried unanimously that the State Board of Education suspend the board operating procedures in accordance with §5.2(a) to allow consideration at first reading and filing authorization; and*

Approve for first reading and filing authorization the proposed repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds, as recommended by the Committee on School Finance/Permanent School Fund.

- 17. Proposed Amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules (Second Reading and Final Adoption)**
(Board agenda page III-13)

MOTION AND VOTE: *It was moved by Mr. Maynard and carried unanimously that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules; and*

Make an affirmative finding that immediate adoption of proposed amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register, as recommended by the Committee on School Finance/Permanent School Fund. (ATTACHMENT 9, page 33)

COMMITTEE ON SCHOOL INITIATIVES

- 18. Proposed Amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship (Second Reading and Final Adoption)**
(Board agenda page IV-78)

MOTION: *It was moved by Mrs. Cargill that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship; as substituted and recommended by the Committee on School Initiatives, and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register.

MOTION AND VOTE: *It was moved by Dr. Ellis, seconded by Mr. Cortez, and carried that the State Board of Education amend §61.1(b)(4)(F) to read:*

“The team-building session shall be provided by an ESC or a registered provider as described in subsection (c) of this section ~~an authorized provider as described in subsection (d) of this section.~~”

MOTION AND VOTE: *It was moved by Ms. Pérez and carried that the State Board of Education postpone further consideration of the motion until a later point in the meeting.*

MOTION AND VOTE: *It was moved by Mrs. Cargill, seconded by Ms. Perez-Diaz, and carried that the State Board of Education add new §61.1(m) to read:*

“(m) This section is implemented May 1, 2020. Section 61.1 as it read prior to adoption by the State Board of Education at their January 2020 hearing controls continuing education for school board members until May 1, 2020.”

VOTE: *A vote was taken on the original motion that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship; as substituted and recommended by the Committee on School Initiatives, as amended and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register. The motion carried unanimously. (ATTACHMENT 10, page 47)

(Mr. Mercer was absent for the vote.)

19. Review of Proposed Amendments to 19 TAC Chapter 249, Disciplinary Proceedings, Sanctions, and Contested Cases, Subchapter B, Enforcement Actions and Guidelines
(Board agenda page IV-96)

MOTION AND VOTE: *It was moved by Mrs. Cargill and carried unanimously that the State Board of Education take no action on the proposed amendments to 19 TAC Chapter 249, Disciplinary Proceedings, Sanctions, and Contested Cases, Subchapter B, Enforcement Actions and Guidelines, as recommended by the Committee on School Initiatives.*

REGARDING AGENDA ITEMS POSTED FOR DISCUSSION ON COMMITTEE AGENDAS

Committee on Instruction

Mrs. Melton-Malone explained that the committee took no action to recommend approval of substitution of instructional materials for Origo Education because the publisher had not provided the necessary materials. She explained that the committee asked staff to research actions the committee and board can consider regarding this publisher at the April 2020 SBOE meeting.

Committee on School Finance/Permanent School Fund

Mr. Maynard provided updates related to the current value of the SBOE portion of the Permanent School Fund and the School Land Board (SLB) portion of the fund, the bond guarantee program including the charter school reserve fund, the legislatively created liquid fund, the third quarter performance report, and the release of the annual report. Mr. Maynard also announced that the Senate Finance Committee will have a hearing on February 25 that he and the SBOE chair will attend. Finally, he shared that the SBOE will hear from the state auditor's office in April and a request has been made to meet with SLB in April.

Committee on School Initiatives

Mrs. Cargill did not report on the Committee on School Initiatives.

REPORTS OF OTHER STATE BOARD OF EDUCATION MEMBERS REGARDING AGENDA ITEMS AND EDUCATIONAL ACTIVITIES AND CONCERNS IN INDIVIDUAL DISTRICTS

Dr. Ellis stated his intent to appoint two ad hoc committees, one to review the framework for school board governance and one to work with TEA, Texas Tech University, and The University of Texas at Austin on recommendations for governance of their special purpose districts. He then gave board members an opportunity to provide information regarding agenda items or other relevant information about public education. Brief reports were made.

The meeting adjourned at 2:08 p.m.

Georgina C. Pérez., Secretary

RESOLUTION

WHEREAS the *Presidential Awards for Excellence in Mathematics and Science Teaching* program identifies outstanding mathematics and science teachers in each state and the four U.S. jurisdictions; and

WHEREAS through state selection committees, three mathematics finalists and three science finalists were selected as Texas finalists; and

WHEREAS these teachers have become candidates for the *Presidential Awards for Excellence in Mathematics and Science Teaching*; now, therefore, be it

RESOLVED, That the State Board of Education does hereby extend its congratulations to Amy Edmondson, Willow Wood Junior High School, Tomball Independent School District, Tomball, Texas; Bridget Matamoros, John H. Guyer High School, Denton Independent School District, Denton, Texas; Brent Voorhees, Skyline High School, Dallas Independent School District, Dallas, Texas; for being named State Finalists in the secondary mathematics category for the 2019 Presidential Award; and be it further

RESOLVED, That the State Board of Education does hereby extend its congratulations to Kay Fincher, Amarillo High School, Amarillo Independent School District, Amarillo, Texas; Terry Snow, Aledo High School, Aledo Independent School District, Aledo, Texas; Markaela van Putten, Tomball High School, Tomball Independent School District, Tomball, Texas; for being named State Finalists in the secondary science category for the 2019 Presidential Award; and be it further

RESOLVED, That this resolution be presented to the aforementioned teachers for being identified as state and national finalists for the 2019 *Presidential Awards for Excellence in Mathematics and Science Teaching* program, and that a copy be included in the permanent records of the State Board of Education.

WITNESS our signatures this thirty-first day of January, two thousand and twenty, in Austin, Texas.

Dr. Keven Ellis, Chair

Georgina C. Pérez, Secretary

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RESOLUTION

WHEREAS the *Presidential Awards for Excellence in Mathematics and Science Teaching* program identifies outstanding mathematics and science teachers in each state and the four U.S. jurisdictions; and

WHEREAS through national selection committees, one mathematics finalist and one science finalist were selected to represent Texas; and

WHEREAS these teachers have become Texas national awardees for the *Presidential Awards for Excellence in Mathematics and Science Teaching*; now, therefore, be it

RESOLVED, That the State Board of Education does hereby extend its congratulations to Wanda “Jean” Streepey, Highland Park Middle School, Highland Park Independent School District, Dallas, Texas for being named Texas National Awardee in the secondary mathematics category for the 2017 Presidential Award; and be it further

RESOLVED, That the State Board of Education does hereby extend its congratulations to Dolores “Lollie” Garay, Redd School, Houston, Texas for being named Texas National Awardee in the secondary science category for the 2017 Presidential Award; and be it further

RESOLVED, That this resolution be presented to the aforementioned teachers for being identified as state and national awardees for the 2017 *Presidential Awards for Excellence in Mathematics and Science Teaching* program, and that a copy be included in the permanent records of the State Board of Education.

WITNESS our signatures this thirty-first day of January, two thousand and twenty, in Austin, Texas.

Keven Ellis, Chair

Georgina C. Pérez, Secretary

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RESOLUTION

WHEREAS the *Presidential Awards for Excellence in Mathematics and Science Teaching* program identifies outstanding mathematics and science teachers in each state and the four U.S. jurisdictions; and

WHEREAS through national selection committees, one mathematics finalist and one science finalist were selected to represent Texas; and

WHEREAS these teachers have become Texas national awardees for the *Presidential Awards for Excellence in Mathematics and Science Teaching*; now, therefore, be it

RESOLVED, That the State Board of Education does hereby extend its congratulations to Angelica Niño, Lorenzo De Zavala Elementary School, San Antonio Independent School District, San Antonio, Texas for being named Texas National Awardee in the elementary mathematics category for the 2018 Presidential Award; and be it further

RESOLVED, That the State Board of Education does hereby extend its congratulations to Brenda Williams, Argyle Intermediate School, Argyle Independent School District, Argyle, Texas for being named Texas National Awardee in the elementary science category for the 2018 Presidential Award; and be it further

RESOLVED, That this resolution be presented to the aforementioned teachers for being identified as state and national awardees for the 2018 *Presidential Awards for Excellence in Mathematics and Science Teaching* program, and that a copy be included in the permanent records of the State Board of Education.

WITNESS our signatures this thirty-first day of January, two thousand and twenty, in Austin, Texas.

Keven Ellis, Chair

Georgina C. Pérez, Secretary

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RESOLUTION

WHEREAS parents and employers play a key role in supporting public schools; and

WHEREAS mentoring children can have a lifelong impact on students' lives; and

WHEREAS the Texas Legislature recognized this important school-parent-business partnership when it directed the State Board of Education to create the Employers for Education Excellence award in 2007; and

WHEREAS Toyota of Boerne, the Haynes and Boone law firm, and Southwest Airlines are recipients of the 2019 Employers for Education Excellence gold level award for their extensive involvement with their communities' schools; and

WHEREAS Toyota of Boerne supports the Boerne Independent School District by providing auto parts and vehicles to the district's automotive; science, technology, engineering, and math classes; and FFA chapter and its employees have donated 300 hours of volunteer service; and

WHEREAS the Haynes and Boone law firm collaborates with Dallas ISD's L.G. Pinkston High School's law practicum, engages with students from middle school to college to increase the diversity of the legal provision, and supports a flexible environment that allows parents to participate in school activities; and

WHEREAS Southwest Airlines partners with North Dallas High School's P-Tech program, sponsors an Adopt-A-Pilot program that brings aviators into classrooms, offers employees the "freedom to flex" work hours so they can attend school events; and donates round-trip tickets to non-profit organizations for every 40 hours of volunteer time; and

WHEREAS the Dallas Fire-Rescue Department and Accenture are recipients of the silver level award for their student mentoring programs and volunteer activities; and

WHEREAS the Dallas Fire-Rescue Department works with Dallas ISD's P-Tech program, mentors students and sponsors a Fire-Rescue Explorers Troop in which student learn basic knowledge about the fire service, including emergency medical services; and

WHEREAS Accenture partners with Dallas ISD's P-Tech program at Seagoville High School and works with the Bridges from School to Work program to help prepare young people with disabilities for employment; and

WHEREAS Pricewaterhouse Coopers and Thomson Reuters are recognized as bronze award recipients for their family-and-school friendly volunteer policies; and

WHEREAS Pricewaterhouse Coopers assists with career development and mentoring activities in the James Madison High School P-Tech program in Dallas ISD and makes discretionary volunteer time available to employees, which can be used to support school activities; and

WHEREAS Thomson Reuters is a signature partner with Dallas ISD's P-Tech program where it actively engages in mentorship activities and provides grants to schools and other non-profit organizations when employees donate 20 or more hours of their time; and

WHEREAS school districts and charter schools that encourage parental and community involvement are vital components of this program; now therefore, be it

RESOLVED that the State Board of Education urges Texas businesses to look upon these seven Employers for Education Excellence award recipients as role models for civic engagement; and be it further

RESOLVED that the State Board of Education today awards Toyota of Boerne, Haynes and Boone, Southwest Airlines, Dallas Fire-Rescue Department, Accenture, Pricewaterhouse Coopers, and Thomson Reuters with the 2019 Employers for Education Excellence award for their generous and continuing support of Texas students and teachers.

WITNESS our signatures this thirty-first day of January, two thousand and twenty, in Austin, Texas.

Keven Ellis, Chair
State Board of Education

Georgina C. Pérez, Secretary
State Board of Education

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RESOLUTION

WHEREAS February 1-29, 2020, has been designated National Career and Technical Education Month; and

WHEREAS about 1,424,391 Texas secondary students are enrolled in one or more career and technical education (CTE) courses in 1,200 school districts and charter schools throughout the State; and

WHEREAS career and technical education offers students the opportunity to gain the academic, technical and employability skills necessary for true career readiness; and

WHEREAS students in career and technical education programs participate in authentic, meaningful experiences which improve the quality of their education by offering opportunities to apply academic knowledge and skills from across the curriculum; and

WHEREAS career and technical education is a vital and integral part of the Foundation High School Program, offering students pathways to earn recognized endorsements, performance acknowledgements and industry validated credentials; and

WHEREAS Texas is proud to support nine CTE student organizations – Business Professionals of America; the Texas Association of DECA; Educators Rising; Future Business Leaders of America; Family, Career and Community Leaders of America; the Texas FFA Association; Health Occupations Students of America; SkillsUSA; and Texas Technical Students of America; and

WHEREAS career and technical education programs prepare students for fulfilling careers by offering integrated programs of study that link secondary and postsecondary education and significantly contribute to college readiness; and

WHEREAS ensuring that employers have access to a qualified workforce is a crucial step in ensuring productivity among the business and industry communities as well as continued American economic growth and global competitiveness; now, therefore, be it

RESOLVED, That the State Board of Education, which has been designated by the Texas Legislature as the State Board for Career and Technical Education, does hereby proclaim February 1-29, 2020 as Career and Technical Education Month in Texas, and does hereby urge all Texans to become familiar with the outstanding curriculum delivered by exceptional career and technical education teachers in communities across the state, and to support and participate in these programs to enhance individual skills and productivity.

WITNESS our signatures this thirty-first day of January, two thousand and twenty, in Austin, Texas.

Keven Ellis, Chair

Georgina C. Pérez, Secretary

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**TEXAS PERMANENT SCHOOL FUND
SUMMARY OF TRANSACTIONS FOR APPROVAL
(Including External Manager's Trades)
For October 1, 2019 through November 30, 2019**

Purchases/Capital Calls:

Long Term Fixed Income	\$ 232,973,579
Public Market Equities	202,966,460
Alternative Investments	<u>320,941,314</u>
TOTAL	<u>\$ 756,881,353</u>

Sales/Distributions:

Long Term Fixed Income	\$ 325,099,633
Public Market Equities	272,530,215
Alternative Investments	<u>185,571,416</u>
TOTAL	<u>\$ 783,201,264</u>

General Land Office Contributions:

FY 2019 Cumulative November 2018	FY 2020 Cumulative November 2019
\$63,750,000	\$2,500,000

Based on the above information provided by staff including a report that deposits to the Permanent School Fund from the General Land Office were \$63,750,000 through November 2018 for fiscal year 2019 versus \$2,500,000 through November 2019 for fiscal year 2020, and the recommendation of the Executive Administrator and Chief Investment Officer and the Commissioner of Education; it is moved by unanimous consent that the Committee on School Finance/Permanent School Fund ratify for the months of October 2019 and November 2019 Permanent School Fund portfolio purchases of \$756,881,353 and sales of \$783,201,264.

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ATTACHMENT
Text of Proposed Amendment to 19 TAC

Chapter 74. Curriculum Requirements

Subchapter C. Other Provisions

§74.26. Award of Credit.

- (a) The award of credit for a course by a school district affirms that a student has satisfactorily met all state and local requirements. Any course for which credit is awarded must be provided according to this subsection.
- (1) Credit earned toward state graduation requirements by a student in an accredited school district shall be transferable and must be accepted by any other school district in the state. A district may not prohibit a new student from attending school pending receipt of transcripts or records from the school district the student previously attended. Credit earned in a local-credit course may be transferred only with the consent of the receiving school district.
- (2) A school district must ensure that the records or transcripts of an out-of-state or out-of-country transfer student (including foreign exchange students) or a transfer student from a Texas nonpublic school are evaluated and that the student is placed in appropriate classes promptly. The district may use a variety of methods to verify the content of courses for which a transfer student has earned credit.
- (b) Districts may offer courses designated for Grades 9-12 (refer to §74.11 of this title (relating to High School Graduation Requirements)) in earlier grade levels. A course must be considered completed and credit must be awarded if the student has demonstrated achievement by meeting the standard requirements of the course, including demonstrated proficiency in the subject matter, regardless of the time the student has received instruction in the course or the grade level at which proficiency was attained. The academic achievement record (transcript) shall reflect that students have satisfactorily completed courses at earlier grade levels than Grades 9-12 and have been awarded state graduation credits.
- (c) Credit for courses for high school graduation may be earned only if the student received a grade which is the equivalent of 70 on a scale of 100, based upon the essential knowledge and skills for each course.
- (d) In accordance with local district policy, students who are able to successfully complete only half of a ~~one semester of a two semester~~ course can be awarded credit proportionately.
- (e) A school district shall award credit proportionately to a student who is homeless or in substitute care who successfully completes only half of a ~~one semester of a two semester~~ course.

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ATTACHMENT
Text of Proposed Amendments to 19 TAC

Chapter 117. Texas Essential Knowledge and Skills for Fine Arts

Subchapter C. High School

§117.312. Music, Level III (One Credit), Adopted 2013.

- (a) General requirements. Students may fulfill fine arts and elective requirements for graduation by successfully completing one or more of the following music courses: Band III, Choir III, Orchestra III, Jazz Ensemble III, Jazz Improvisation III, Instrumental Ensemble III, Vocal Ensemble III, World Music Ensemble III, Applied Music III, Mariachi III, Piano III, Guitar III, ~~[and]~~ Harp III, International Baccalaureate (IB) Music Standard Level (SL), or IB Music Higher Level (HL) (one credit per course). The recommended prerequisite for IB Music SL is one credit in music. The prerequisite for all other Music, Level III music courses is one credit of Music, Level II in the corresponding discipline.
- (b)-(c) (No change.)

§117.313. Music, Level IV (One Credit), Adopted 2013.

- (a) General requirements. Students may fulfill fine arts and elective requirements for graduation by successfully completing one or more of the following music courses: Band IV, Choir IV, Orchestra IV, Jazz Ensemble IV, Jazz Improvisation IV, Instrumental Ensemble IV, Vocal Ensemble IV, World Music Ensemble IV, Applied Music IV, Mariachi IV, Piano IV, Guitar IV, ~~[and]~~ Harp IV, International Baccalaureate (IB) Music Standard Level (SL), or IB Music Higher Level (HL) (one credit per course). The prerequisite for all Music, Level IV courses is one credit of Music, Level III in the corresponding discipline.
- (b)-(c) (No change.)

§117.314. Music Studies (One Credit), Adopted 2013.

- (a) General requirements. Students may fulfill fine arts and elective requirements for graduation by successfully completing one or more of the following music courses: Music Theory I-II; Music Appreciation I-II; Music Business I-II; Music Composition I-II; Music Production I-II; Music and Media Communications I-II; or College Board Advanced Placement (AP) Music Theory [~~International Baccalaureate (IB) Music, Standard Level (SL); and IB Music, Higher Level (HL)~~]. There are no prerequisites for Music Study Level I courses [~~however, the prerequisite for IB Music, SL and IB Music, HL is one credit of any Music, Level II course~~]. Students may take Music Studies with different course content for a maximum of three credits.
- (b)-(c) (No change.)

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ATTACHMENT
Text of Proposed Amendments to 19 TAC

**Chapter 33. Statement of Investment Objectives, Policies, and Guidelines of the Texas
Permanent School Fund**

Subchapter A. State Board of Education Rules

§33.10. Purposes of Texas Permanent School Fund Assets and the Statement of Investment Policy.

- (a) The purpose of the Texas Permanent School Fund (PSF), as defined by the Texas Constitution, shall be to support and maintain an efficient system of public free schools. The State Board of Education (SBOE) views the PSF as a perpetual institution. Consistent with its perpetual nature, the PSF shall be an endowment fund with a long-term investment horizon. The SBOE shall strive to manage the PSF consistently with respect to the following: generating income for the benefit of the public free schools of Texas, the real growth of the corpus of the PSF, protecting capital, and balancing the needs of present and future generations of Texas school children. The PSF will strive to maintain intergenerational equity by attempting to pay out a constant distribution and maintain the value of assets per student after adjusting for inflation.
- (b) The purposes of the investment policy statement are to:
- (1) specify the investment objectives, policies, and guidelines the SBOE considers appropriate and prudent, considering the needs of the PSF, and to comply with the Texas Constitution by directing PSF assets;
 - (2) establish SBOE performance criteria for an investment manager;
 - (3) communicate the investment objectives, guidelines, and performance criteria to the SBOE, PSF investment staff and managers, and all other parties;
 - (4) guide the ongoing oversight of PSF investment and test compliance with the Texas Constitution and other applicable statutes;
 - (5) document that the SBOE is fulfilling its responsibilities for managing PSF investments solely in the interests of the PSF;
 - (6) document that the SBOE is fulfilling its responsibilities under Texas law; and
 - (7) provide transparency and accountability to the citizens of Texas.

§33.15. Objectives.

- (a) Investment objectives.
- (1) Investment objectives have been formulated based on the following considerations:
 - (A) the anticipated financial needs of the Texas public free school system in light of expected future contributions to the Texas Permanent School Fund (PSF);
 - (B) the need to preserve capital;
 - (C) the risk tolerance set by the State Board of Education (SBOE) and the need for diversification;
 - (D) observations about historical rates of return on various asset classes;
 - (E) assumptions about current and projected capital market and general economic conditions and expected levels of inflation;
 - (F) the need to maintain liquidity in the PSF Liquid Account;
 - (G) [~~(E)~~] the need to invest according to the prudent person rule; and

- ~~(H)~~ ~~(G)~~ the need to document investment objectives, guidelines, and performance standards.
- (2) Investment objectives represent desired results and are long-term in nature, covering typical market cycles of three to five years. Any shortfall in meeting the objectives should be explainable in terms of general economic and capital market conditions and asset allocation.
 - (3) The investment objectives are consistent with generally accepted standards of fiduciary responsibility.
 - (4) Under the provisions of this chapter, investment managers shall have discretion and authority to implement security selection and timing.
- (b) Goal and objectives for the PSF.
- (1) Goal. The goal of the SBOE for the PSF shall be to invest for the benefit of current and future generations of Texans consistent with the safety of principal, in light of the strategic asset allocation plan adopted. To achieve this goal, PSF investment shall be carefully administered at all times.
 - (2) Objectives.
 - (A) The preservation and safety of principal shall be a primary consideration in PSF investment.
 - (B) Fixed income securities shall be purchased at the highest total return consistent with the preservation and safety of principal.
 - (C) To the extent possible, the PSF management shall hedge against inflation.
 - (D) Securities, except investments for cash management purposes, shall be selected for investment on the basis of long-term investment merits rather than short-term gains.
- (c) Investment rate of return and risk objectives.
- (1) Because the education needs of the future generations of Texas school children are long-term in nature, the return objective of the PSF shall also be long-term and focused on fairly balancing the benefits between the current generation and future generations while preserving the real per capita value of the PSF.
 - (2) Investment rates of return shall adhere to the Chartered Financial Analyst (CFA) Institute Global Investment Performance Standards (GIPS) guidelines in calculating and reporting investment performance return information.
 - (3) The overall risk level of PSF assets in terms of potential for price fluctuation shall not be extreme and risk variances shall be acceptable in the context of the overall goals and objectives for the investment of the PSF assets. The primary means of achieving such a risk profile are:
 - (A) a broad diversification among asset classes that react as independently as possible through varying economic and market circumstances;
 - (B) careful control of risk level within each asset class by avoiding over-concentration and not taking extreme positions against the market indices; and
 - (C) a degree of emphasis on stable growth.
 - (4) Over time, the volatility of returns (or risk) for the total fund, as measured by standard deviation of investment returns, should be comparable to investments in market indices in the proportion in which the PSF invests.
 - (5) The rate of return objective of the total PSF fund shall be to earn, over time, an average annual total rate of return that meets or exceeds the rate of return of a composite benchmark index, consisting of representative benchmark indices for the asset classes in which the PSF is invested that are aggregated in proportion to the strategic target asset allocation of the total PSF fund as

determined by the SBOE, while maintaining an acceptable risk level compared to that of the composite benchmark index.

- (6) The rate of return objective of each asset class in which the PSF is invested, other than the short-term cash fund, shall be to earn, over time, an average annual average rate of return that meets or exceeds that of a representative benchmark index for such asset class in U.S. dollars, combining dividends, capital appreciation, income, and interest income, as applicable, while maintaining an acceptable risk level compared to that of the representative benchmark index.
- (7) The objective of the short-term cash fund shall be to provide liquidity for the timely payment of security transactions, while earning a competitive return. The expected return, over time, shall meet or exceed that of the representative benchmark index, while maintaining an acceptable risk level compared to that of the representative benchmark index.
- (8) The objective of the PSF Liquid Account shall be to maintain liquidity for the needs of the School Land Board while earning a competitive return. The expected return, over time, shall meet or exceed that of the representative benchmark index while maintaining an acceptable risk level compared to that of the representative benchmark index.
- (9) [~~8~~] Notwithstanding the risk parameters specified in paragraphs (4)-(6) of this subsection, consideration shall be given to marginal risk variances exceeding the representative benchmark indices if returns are commensurate with the risk levels of the respective portfolios.

(d) Asset allocation policy.

- (1) The SBOE shall adopt and implement a strategic asset allocation plan based on a well diversified, balanced investment approach that uses a broad range of asset classes indicated by the following characteristics of the PSF:
 - (A) the long-term nature of the PSF;
 - (B) the spending policy of the PSF;
 - (C) the relatively low liquidity requirements of the PSF;
 - (D) the investment preferences and risk tolerance of the SBOE;
 - (E) the liquidity mandates under the Texas Natural Resources Code, Chapter 51, Subchapter I;
 - (F) [~~E~~] the rate of return objectives; and
 - (G) [~~F~~] the diversification objectives of the PSF, specified in the Texas Constitution, Article VII, §5(d), the Texas Education Code, Chapter 43, and the provisions of this chapter.
- (2) The strategic asset allocation plan shall contain guideline percentages, at market value of the total fund's assets, to be invested in various asset classes. The guideline percentages will include both a target percentage and an acceptable strategic range for each asset class, recognizing that the target mix may not be attainable at a specific point in time since actual asset allocation will be dictated by current and anticipated market conditions, as well as the overall directions of the SBOE.
- (3) The SBOE Committee on School Finance/Permanent School Fund, with the advice of the PSF investment staff, shall review the provisions of this section at least annually and, as needed, rebalance the assets of the portfolio according to the asset allocation rebalancing procedure specified in the PSF Investment Procedures Manual. The SBOE Committee on School Finance/Permanent School Fund shall consider the industry diversification and the percentage allocation within the following asset classes:
 - (A) domestic equities;
 - (B) international equities;
 - (C) emerging market equities;
 - (D) domestic fixed income;

- (E) emerging market debt local currency;
 - (F) real estate;
 - (G) private equity;
 - (H) absolute return;
 - (I) real return;
 - (J) risk parity;
 - (K) cash; and
 - (L) other asset classes as approved by the SBOE.
- (4) To the extent practicable, investments shall not exceed the strategic ranges the SBOE establishes for each asset class, recognizing the inability to actively reduce allocations to certain asset classes.
 - (5) Periodically, the SBOE shall allocate segments of the total fund to each investment manager and specify guidelines, investment objectives, and standards of performance that apply to those assets.

§33.20. Responsible Parties and Their Duties.

- (a) The Texas Constitution, Article VII, §§1-8, ~~establish~~ establishes the Available School Fund, the Texas Permanent School Fund (PSF), and the State Board of Education (SBOE), and ~~specify~~ specifies the standard of care SBOE members must exercise in managing PSF assets. In addition, the constitution directs the legislature to establish suitable provisions for supporting and maintaining an efficient public free school system, defines the composition of the PSF and the Available School Fund, and requires the SBOE to set aside sufficient funds to provide free instructional materials for the use of children attending the public free schools of this state.
- (b) The Texas Natural Resources Code, Chapter 51, Subchapter I, creates the PSF Liquid Account within the PSF to be invested in liquid assets and managed by the SBOE in the same manner it manages the PSF.
- (c) ~~(b)~~ The SBOE shall be responsible for overseeing all aspects of the PSF and may contract with any of the following parties, whose duties and responsibilities are as follows.
 - (1) An external investment manager is a Person the SBOE retains by contract to manage and invest a portion of the PSF assets under specified guidelines.
 - (2) A custodian is an organization, normally a financial company, the SBOE retains to safe keep, and provide accurate and timely reports of, PSF assets.
 - (3) A consultant is a Person the SBOE retains to advise the SBOE on PSF matters based on professional expertise.
 - (4) Investment Counsel is a Person retained under criteria specified in the PSF Investment Procedures Manual to advise PSF investment staff and the SBOE Committee on School Finance/Permanent School Fund within the policy framework established by the SBOE. Investment Counsel may be assigned such tasks as asset allocation reviews, manager searches, performance analysis, recommendations on spending policy, performance reporting, and benchmarking and research related to the management of PSF assets, with any such assigned tasks to be performed in consultation with PSF staff.
 - (5) A performance measurement consultant is a Person retained to provide the SBOE Committee on School Finance/Permanent School Fund an analysis of the PSF portfolio performance. The outside portfolio performance measurement service firm shall perform the analysis on a quarterly or as-needed basis. Quarterly reports shall be distributed to each member of the SBOE Committee on School Finance/Permanent School Fund and Investment Counsel, and a representative of the firm shall be available as necessary to brief the committee.
 - (6) The State Auditor's Office is an independent state agency that performs an annual financial audit of the Texas Education Agency (TEA) at the direction of the Texas Legislature. The financial

audit, conducted according to generally accepted auditing standards, is designed to test compliance with generally accepted accounting principles. The state auditor performs tests of the transactions of the PSF Investment Office as part of this annual audit, including compliance with governing statutes and SBOE policies and directives. The TEA Internal Audit Division will participate in the audit process by participating in entrance and exit conferences, being provided copies of all reports and management letters furnished by the external auditor, and having access to the external auditor's audit programs and working papers.

- (7) The SBOE may retain independent external auditors to review the PSF accounts annually or on an as-needed basis. The TEA Internal Audit Division will participate in the audit process by participating in entrance and exit conferences, being provided copies of all reports and management letters furnished by the external auditor, and having access to the external auditor's audit programs and working papers.
- (d) ~~(c)~~ The SBOE shall meet on a regular or as-needed basis to conduct the affairs of the PSF.
- (e) ~~(d)~~ In case of emergency or urgent public necessity, the SBOE Committee on School Finance/Permanent School Fund or the SBOE, as appropriate, may hold an emergency meeting under the Texas Government Code, §551.045.
- (f) ~~(e)~~ The SBOE shall have the following exclusive duties:
- (1) determining the strategic asset allocation mix between asset classes based on the attending economic conditions and the PSF goals and objectives including determining the separate asset allocation for the PSF Liquid Account based on the specific goals and objectives for investing the PSF Liquid Account ;
 - (2) ratifying all investment transactions pertaining to the purchase, sale, or reinvestment of assets by all internal and external investment managers for the current reporting period;
 - (3) appointing members to the SBOE Investment Advisory Committee;
 - (4) approving the selection of, and all contracts with, external investment managers, financial advisors, Investment Counsel, financial or other consultants, or other external professionals retained to help the SBOE invest PSF assets;
 - (5) approving the selection of, and the performance measurement contract with, a well-recognized and reputable firm retained to evaluate and analyze PSF investment results. The service shall compare investment results to the written investment objectives of the SBOE and also compare the investment of the PSF with the investment of other public and private funds against market indices and by managerial style;
 - (6) setting policies, objectives, and guidelines for investing PSF assets; ~~and~~
 - (7) submitting a list of six nominees for any vacant position on the School Land Board to the Texas Governor for consideration; and
 - (8) ~~(7)~~ representing the PSF to the state.
- (g) ~~(f)~~ The SBOE may establish committees to administer the affairs of the PSF. The duties and responsibilities of any committee established shall be specified in the PSF Investment Procedures Manual.
- (h) ~~(g)~~ The PSF shall have an executive administrator, with a staff to be adjusted as necessary, who functions directly with the SBOE through the SBOE Committee on School Finance/Permanent School Fund concerning investment matters, and who functions as part of the internal operation under the commissioner of education. At all times, the PSF executive administrator and staff shall invest PSF assets as directed by the SBOE according to the Texas Constitution and all other applicable Texas statutes, as amended, and SBOE rules governing the operation of the PSF. The PSF staff shall:
- (1) administer the PSF, including investing and managing assets and contracting in connection therewith, according to SBOE goals and objectives;
 - (2) execute all directives, policies, and procedures from the SBOE and the SBOE Committee on School Finance/Permanent School Fund;

- (3) keep records and provide a continuous and accurate accounting of all PSF transactions, revenues, and expenses and provide reports on the status of the PSF portfolio;
 - (4) advise any officials, investment firms, or other interested parties about the powers, limitations, and prohibitions regarding PSF investments that have been placed on the SBOE or PSF investment staff by statutes, attorney general opinions and court decisions, or by SBOE policies and operating procedures;
 - (5) continuously research all internally managed securities held by the PSF and report to the SBOE Committee on School Finance/Permanent School Fund and the SBOE any information requested, including reports and statistics on the PSF, for the purpose of administering the PSF;
 - (6) establish and maintain a procedures manual that implements this section to be approved by the SBOE;
 - (7) make recommendations regarding investment and policy matters to the SBOE Committee on School Finance/Permanent School Fund and the SBOE, except for formal recommendations for benchmarks for internally managed PSF asset classes, which duties the Committee will assign to an appropriate third party who will present such recommendations after consultation with PSF staff; and
 - (8) establish and maintain accounting policies and internal control procedures concerning all receipts, disbursements and investments of the PSF, according to the procedures adopted by the SBOE.
- (i) The SBOE delegates to the SBOE Committee on School Finance/Permanent School Fund, to which it has delegated certain powers and duties relating to the investment of the PSF, the responsibility of representing the SBOE at the joint annual meeting between the School Land Board and the SBOE under Texas Natural Resources Code, §32.0161. The chairs of the SBOE and the SBOE Committee on School Finance/Permanent School Fund shall be responsible for coordinating the joint annual meeting between the School Land Board and the SBOE.

§33.25. Permissible and Restricted Investments and General Guidelines for Investment Managers.

- (a) Permissible investments. Any investment that satisfies the prudence standard, is consistent with the Fund's investment policy and portfolio objectives, and is used in executing investment strategies approved by the State Board of Education (SBOE).
- (b) Prohibited transactions and restrictions. Except as provided in subsection (a) of this section or as approved or delegated by the SBOE, the following prohibited transactions and restrictions apply to all Texas Permanent School Fund (PSF) investment managers with respect to the investment or handling of PSF assets, except as otherwise noted:
 - (1) short sales of any kind except for U.S. Treasury futures for purposes of hedging fixed income portfolios ;
 - (2) purchasing letter or restricted stock;
 - (3) buying or selling on margin;
 - (4) engaging in purchasing or writing options or similar transactions;
 - ~~(5) purchasing or selling futures on commodities contracts;~~
 - (5) ~~(6)~~ borrowing by pledging or otherwise encumbering PSF assets;
 - (6) ~~(7)~~ purchasing the equity or debt securities of the PSF investment manager's own organization or an affiliated organization;
 - (7) ~~(8)~~ engaging in any purchasing transaction, after which the cumulative market value of common stock in a single corporation exceeds 2.5% of the PSF total market value or 5.0% of the manager's total portfolio market value;

- (8) ~~(9)~~ engaging in any purchasing transaction, after which the cumulative number of shares of common stock in a single corporation held by the PSF exceeds 5.0% of the outstanding voting stock of that issuer;
- (9) ~~(10)~~ engaging in any purchasing transaction, after which the cumulative market value of fixed income securities or cash equivalent securities in a single corporation (excluding the U.S. government, its federal agencies, and government sponsored enterprises) exceeds 2.5% of the PSF total market value or 5.0% of the investment manager's total portfolio market value with the PSF;
- (10) ~~(11)~~ purchasing tax exempt bonds;
- (11) ~~(12)~~ purchasing guaranteed investment contracts (GICs) from an insurance company or bank investment contracts (BICs) from a bank not rated at least AAA by Standard & Poor's or Moody's;
- (12) ~~(13)~~ purchasing any publicly traded fixed income security not rated investment grade by Standard & Poor's (BBB-), Moody's (Baa3), or Fitch (BBB-), subject to the provisions of the PSF Investment Procedures Manual and the following restrictions:
- (A) when ratings are provided by the three rating agencies, the middle rating shall be used;
 - (B) when ratings are provided by two ratings agencies, the lower rating is used; or
 - (C) when a rating is provided by one rating agency, the sole rating is used;
- (13) ~~(14)~~ purchasing short-term money market instruments rated below A-1 by Standard & Poor's or P-1 by Moody's;
- (14) ~~(15)~~ engaging in any transaction that results in unrelated business taxable income (excluding current holdings);
- (15) ~~(16)~~ engaging in any transaction considered a "prohibited transaction" under the Internal Revenue Code or the Employee Retirement Income Security Act (ERISA);
- (16) ~~(17)~~ purchasing precious metals or other commodities;
- (17) ~~(18)~~ engaging in any transaction that would leverage a manager's position;
- (18) ~~(19)~~ lending securities owned by the PSF, but held in custody by another party, such as a bank custodian, to any other party for any purpose, unless lending securities according to a separate written agreement the SBOE approved; and
- (19) ~~(20)~~ purchasing fixed income securities without a stated par value amount due at maturity.
- (c) General guidelines for investment managers.
- (1) Each investment manager retained to manage a portion of PSF assets shall be aware of, and operate within, the provisions of this chapter and all applicable Texas statutes.
 - (2) As fiduciaries of the PSF, investment managers shall discharge their duties solely in the interests of the PSF according to the prudent expert rule, engaging in activities that include the following.
 - (A) Diversification. Each manager's portfolio should be appropriately diversified within its applicable asset class.
 - (B) Securities trading.
 - (i) Each manager shall send copies of each transaction record to the PSF investment staff and custodians.
 - (ii) Each manager shall be required to reconcile the accounts under management on a monthly basis with the PSF investment staff and custodians.
 - (iii) Each manager shall be responsible for complying fully with PSF policies for trading securities and selecting brokerage firms, as specified in §33.40 of this title (relating to Trading and Brokerage Policy). In particular, the emphasis of security trading shall be on best execution; that is, the highest proceeds to the

PSF and the lowest costs, net of all transaction expenses. Placing orders shall be based on the financial viability of the brokerage firm and the assurance of prompt and efficient execution.

- (iv) The SBOE shall require each external manager to indemnify the PSF for all failed trades not due to the negligence of the PSF or its custodian in instances where the selection of the broker dealer is not in compliance with §33.40 of this title (relating to Trading and Brokerage Policy).

(C) Acknowledgments in writing.

- (i) Each external investment manager retained by the PSF must be a person, firm, or corporation registered as an investment adviser under the Investment Adviser Act of 1940, a bank as defined in the Act, or an insurance company qualified to do business in more than one state, and must acknowledge its fiduciary responsibility in writing. A firm registered with the Securities and Exchange Commission (SEC) must annually provide a copy of its Form ADV, Section II.
- (ii) The SBOE may require each external manager to obtain coverage for errors and omissions in an amount set by the SBOE, but the coverage shall be at least the greater of \$500,000 or 1.0% of the assets managed, not exceeding \$10 million. The coverage should be specific as to the assets of the PSF. The manager shall annually provide evidence in writing of the existence of the coverage.
- (iii) Each external manager may be required by the SBOE to obtain fidelity bonds, fiduciary liability insurance, or both.
- (iv) Each manager shall acknowledge in writing receiving a copy of, and agreeing to comply with, the provisions of this chapter.

(D) Discretionary investment authority. Subject to the provisions of this chapter, any investment manager of marketable securities or other investments, retained by the PSF, shall have full discretionary investment authority over the assets for which the manager is responsible. Specialist advisors and investment managers retained for alternative asset investments may have a varying degree of discretionary authority, which will be outlined in contract documentation.

(d) Reporting procedures for investment managers. The investment manager shall:

- (1) prepare a monthly and quarterly report for delivery to the SBOE, the SBOE Committee on School Finance/Permanent School Fund, and the PSF investment staff that shall include, in the appropriate format, items requested by the SBOE. The monthly reports shall briefly cover the firm's economic review; a review of recent and anticipated investment activity; a summary of major changes that have occurred in the investment markets and in the portfolio, particularly since the last report; and a summary of the key characteristics of the PSF portfolio. Quarterly reports shall comprehensively cover the same information as monthly reports but shall also include any changes in the firm's structure, professional team, or product offerings; a detail of the portfolio holdings; and transactions for the period. Periodically, the PSF investment staff shall provide the investment manager a detailed description of, and format for, these reports;
- (2) when requested by the SBOE Committee on School Finance/Permanent School Fund, make a presentation describing the professionals retained for the PSF, the investment process used for the PSF portfolio under the manager's responsibility, and any related issues;
- (3) when requested by the PSF investment staff, meet to discuss the management of the portfolio, new developments, and any related matters; and
- (4) implement a specific investment process for the PSF. The manager shall describe the process and its underlying philosophy in an attachment to its investment management agreement with the PSF and manage according to this process until the PSF and manager agree in writing to any change.

§33.30. Standards of Performance.

- (a) The State Board of Education (SBOE) Committee on School Finance/Permanent School Fund shall set and maintain performance standards for the total Texas Permanent School Fund (PSF) and separately for the PSF Liquid Account , for each asset class in which the assets of the PSF and the PSF Liquid Account are invested, and for all investment managers based on criteria that include the following:
 - (1) time horizon;
 - (2) real rate of return;
 - (3) representative benchmark index;
 - (4) volatility of returns (or risk), as measured by standard deviation; and
 - (5) universe comparison.
- (b) The SBOE Committee on School Finance/Permanent School Fund shall develop and implement the procedures necessary to establish and recommend to the SBOE the performance standards criteria.
- (c) Performance standards shall be included in the PSF Investment Procedures Manual.

§33.35. Guidelines for the Custodian and the Securities Lending Agent.

Completing custodial and security lending functions in an accurate and timely manner is necessary for effective investment management and accurate records.

- (1) A custodian shall have the following responsibilities regarding the segments of the funds for which the custodian is responsible.
 - (A) Provide complete custody and depository services for the designated accounts.
 - (B) Provide for investment of any cash on a daily basis to avoid uninvested amounts.
 - (C) Implement the investment actions in a timely and effective manner as directed by the investment managers.
 - (D) Collect all realizable income and principal and properly report the information on the periodic statements to the Texas Permanent School Fund (PSF) investment staff, the investment managers, or other appropriate parties.
 - (E) Provide monthly and annual accounting statements, as well as on-line, real-time accounting, that includes all transactions. Accounting shall be based on accurate security values for cost and market value and provided within a time frame acceptable to the State Board of Education (SBOE).
 - (F) Report to the PSF investment staff situations in which security pricing is either not possible or subject to considerable uncertainty.
 - (G) Distribute all proxy voting materials in a timely manner.
 - (H) Provide research and assistance to the SBOE and the PSF investment staff on all issues related to accounting and administration.
 - (I) Confirm that the depth of resources and personnel associated with the designated funds are comparable to those of the nation's leading custodial banks.
- (2) A securities lending agent for the PSF shall have the following responsibilities.
 - (A) Provide complete transaction reporting for the designated funds.
 - (B) Provide a monthly accounting, as well as on-line, real-time accounting for securities lending transactions, based on accurate security values.
 - (C) Report to the PSF investment staff any irregular situation that is outside the standard of practice for securities lending or inconsistent with the provisions of the securities lending agreement.

- (D) Implement a securities lending program for the PSF in a manner that does not impair any rights of the PSF by virtue of PSF ownership in securities.
- (E) As requested, provide research and assistance to the SBOE and the PSF investment staff on all issues related to accounting and administration.
- (F) Provide indemnification to the PSF satisfactory to the SBOE in the event of default on securities lending transactions.
- (G) Fully disclose all revenues and other fees associated with the securities lending program.
- (H) Comply with restrictions on types of securities lending transactions or eligible investments of cash collateral or any other restrictions imposed by the SBOE or the PSF investment staff. Unless the SBOE gives its written approval, the following guidelines apply to the PSF Securities Lending Program. Cash collateral reinvestment guidelines must meet the following standards.
 - (i) Permissible investments.
 - (I) U.S. Government and U.S. Agencies, under the following criteria:
 - (-a-) any security issued by or fully guaranteed as to payment of principal and interest by the U.S. Government or a U.S. Government Agency or sponsored Agency, and eligible for transfer via Federal Reserve Bank book entry, Depository Trust Company book entry, and/or Participants Trust Company book entry;
 - (-b-) maximum 397-day maturity on fixed rate;
 - (-c-) maximum three-year maturity on floating rate, with maximum reset period of 94 days and use a standard repricing index such as London InterBank Offered Rate (LIBOR), Federal Funds, Treasury Bills, or commercial paper; and
 - (-d-) no maximum dollar limit.
 - (II) Bank obligations, under the following criteria:
 - (-a-) time deposits with maximum 60-day maturity on fixed rate or three-year maturity for floating rate, with maximum reset period of 60 days and use a standard repricing index such as LIBOR, Federal Funds, Treasury Bills, or commercial paper;
 - (-b-) negotiable Certificates of Deposit with maximum 397-day maturity on fixed rate or three-year maturity for floating rate, with maximum reset period of 94 days and use a standard repricing index such as LIBOR, Federal Funds, Treasury Bills, or commercial paper;
 - (-c-) bank notes with maximum 397-day maturity on fixed rate or three-year maturity on floating rate, with maximum reset period of 94 days and use a standard repricing index such as LIBOR, Federal Funds, Treasury Bills, or commercial paper;
 - (-d-) bankers acceptances with maximum 45-day maturity;
 - (-e-) issued by banks with at least \$25 billion in assets and, for floating rate bank obligations with a maturity greater than 397 days, a long-term rating of AA2 and AA by Moody's Investor Service and Standard & Poor's Corporation at time of purchase; and, for fixed rate or floating rate bank obligations with a remaining maturity of 397 days or less, a short-term rating of "Tier 1" as defined in clause (ii)(IV) of this

subparagraph or, for such bank obligations without a short-term rating, an issuer rating of Tier 1. In addition, placements can be made in branches within the following countries:

- (-1-) Canada;
 - (-2-) France;
 - (-3-) United Kingdom; and
 - (-4-) United States; and
- (-f-) dollar limit maximum per institution of 5.0% of investment portfolio at time of purchase.
- (III) Commercial paper, under the following criteria:
- (-a-) dollar limit maximum per issuer of 5.0% of investment portfolio at time of purchase including any other obligations of that issuer as established in subclause (II)(-d-) of this clause. If backed 100% by bank Letter of Credit, then dollar limit is applied against the issuing bank;
 - (-b-) must be rated "Tier 1" as defined in clause (ii)(IV) of this subparagraph; and
 - (-c-) maximum 397-day maturity.
- (IV) Asset backed commercial paper, under the following criteria:
- (-a-) dollar limit maximum per issuer of 5.0% of investment portfolio;
 - (-b-) must be rated "Tier 1" as defined in clause (ii)(IV) of this subparagraph; and
 - (-c-) maximum 397-day maturity.
- (V) Asset backed securities, under the following criteria:
- (-a-) maximum 397-day weighted average life on fixed rate;
 - (-b-) maximum three-year weighted average life on floating rate, with maximum reset period of 94 days and use a standard repricing index such as LIBOR, Federal Funds, Treasury Bills, or commercial paper; and
 - (-c-) rated Aaa and AAA by Moody's Investor Service and Standard & Poor's Corporation at time of purchase. One AAA rating may suffice if only rated by one Nationally Recognized Securities Rating Organization (NRSRO).
- (VI) Corporate debt (other than commercial paper), under the following criteria:
- (-a-) must be senior debt;
 - (-b-) maximum 397-day maturity on fixed rate;
 - (-c-) maximum three-year maturity on floating rate, with maximum reset period of 94 days and use a standard repricing index such as LIBOR, Federal Funds, Treasury Bills, or commercial paper;
 - (-d-) for floating rate corporate obligations with a maturity greater than 397 days, a long-term rating of AA2 and AA by Moody's

Investor Service and Standard & Poor's Corporation at time of purchase; and, for fixed rate or floating rate corporate obligations with a remaining maturity of 397 days or less, a short-term rating of "Tier 1" as defined in clause (ii)(IV) of this subparagraph or, for such corporate obligations without a short-term rating, an issuer rating of Tier 1; and

- (-e-) dollar limit maximum per issuer of 5.0% of investment portfolio at time of purchase, including any other obligations of that issuer.

(VII) Reverse repurchase agreements, under the following criteria:

- (-a-) counterparty must be "Tier 1" rated as defined in clause (ii)(IV) of this subparagraph for fixed rate and AA2 and AA by Moody's Investor Service and Standard & Poor's Corporation for floating rate or be a "Primary Dealer" in Government Securities as per the New York Federal Reserve Bank;
- (-b-) underlying collateral may be any security permitted for direct investment;
- (-c-) lending agent or a third party custodian must hold collateral under tri-party agreement;
- (-d-) collateral must be marked to market daily and maintained at the following margin levels \pm [x]
 - (-1-) U.S. Government, U.S. Government Agency, sponsored Agency, International Organization at 100%;
 - (-2-) Certificate of Deposits, Bankers Acceptance, bank notes, commercial paper at 102% under one year to maturity and rated at least "Tier 1" as defined in clause (ii)(IV) of this subparagraph; and
 - (-3-) corporate debt (other than commercial paper) at 105% rated at least AA2/AA or better by Moody's Investor Service and Standard & Poor's Corporation at time of purchase;
- (-e-) due to daily margin maintenance, dollar limits and maturity limits of underlying collateral are waived, except with respect to the maturity limit in subclause (II)(-d-) of this clause;
- (-f-) maximum 180-day maturity; and
- (-g-) dollar limit for total reverse repurchase agreements is the greater of \$300 million or 15% of value of cash collateral portfolio with one counterparty at time of purchase.

(VIII) Foreign sovereign debt, under the following criteria:

- (-a-) any security issued by or fully guaranteed as to payment of principal and interest by a foreign government whose sovereign debt is rated AA2/AA or better by Moody's Investor Service and Standard & Poor's Corporation at time of purchase. Securities must be delivered to Lending Agent or a third party under a Tri-Party agreement;

- (-b-) dollar limit maximum per issuer or guarantor of 2.5% of investment portfolio; and
 - (-c-) maximum maturity of 397 days.
- (IX) Short Term Investment Fund (STIF) and/or Registered Mutual Funds, under the following criteria:
 - (-a-) funds must comprise investments similar to those that would otherwise be approved for securities lending investment under the provisions of this subparagraph, not invest in derivatives, and not re-hypothecate assets;
 - (-b-) lender must approve each fund in writing and only upon receipt of offering documents and qualified letter; and
 - (-c-) fund must have an objective of a constant share price of one dollar.
- (ii) Investment parameters.
 - (I) Maximum weighted average maturity of investment portfolio must be 180 days.
 - (II) Maximum weighted average interest rate exposure of investment portfolio must be 60 days.
 - (III) All investments must be U.S. dollar-denominated.
 - (IV) "Tier 1" credit quality is defined as the highest short-term rating category by the following NRSROs:
 - (-a-) Standard & Poor's;
 - (-b-) Moody's Investors Service; and
 - (-c-) Fitch Investors Service; [and]
 - ~~[-d-] Duff & Phelps, LLC.~~
 - (V) At time of purchase all investments must be rated in the highest short-term numerical category by at least two NRSROs, one of which must be either Standard & Poor's or Moody's Investors Service.
 - (VI) Issuer's ratings cannot be on negative credit watch at the time of purchase.
 - (VII) Interest and principal only (IO, PO) stripped mortgages are not permitted.
 - (VIII) Mortgage backed securities are not permitted.
 - (IX) Complex derivative or structured securities, including, but not limited to the following are not permitted:
 - (-a-) inverse floating rate notes;
 - (-b-) defined range floating rate notes;
 - (-c-) trigger notes; and
 - (-d-) set-up notes.
- (I) Provide a copy of the investment policy governing the custodian's securities lending program, as amended, to the PSF investment staff.
- (J) Confirm that the depth of resources and personnel associated with the designated funds are comparable to those of the nation's leading securities lending agents.

§33.60. Performance and Review Procedures.

As requested by the State Board of Education (SBOE) or Texas Permanent School Fund (PSF) investment staff, evaluation and periodic investment reports shall supply critical information on a continuing basis, such as the amount of trading activity, investment performance, cash positions, diversification ratios, rates of return, and other perspectives of the portfolios. The reports shall address compliance with investment policy guidelines.

- (1) Performance measurements. The SBOE Committee on School Finance/Permanent School Fund shall review the quarterly performance of each portfolio of the PSF in terms of the provisions of this chapter. The investment performance review shall include comparisons with representative benchmark indices, a broad universe of investment managers, and the consumer price index. A time-weighted return formula (which minimizes the effect of contributions and withdrawals) shall be used for investment return analysis. The review also may include quarterly performance analysis and comparisons of retained firms. The services of an outside, independent consulting firm that provides performance measurement and evaluation shall be retained.
- (2) Meeting and reports. Upon request, the SBOE Committee on School Finance/Permanent School Fund shall meet with the PSF investment managers and custodian to review their responsibilities, the PSF portfolio, and investment results in terms of the provisions of this chapter.
- (3) Reports to the School Land Board. Each quarter, the SBOE shall provide the School Land Board a financial report on the portion of the PSF assets and funds for which the SBOE is responsible in accordance with Texas Natural Resources Code, §43.0052.
- ~~(4)~~ ~~(3)~~ Review and modification of investment policy statement. The SBOE Committee on School Finance/Permanent School Fund shall review the provisions of this chapter at least once a year to determine if modifications are necessary or desirable. Upon approval by the SBOE, any modifications shall be promptly reported to all investment managers and other responsible parties.
- ~~(5)~~ ~~(4)~~ Compliance with this chapter and Texas statutes. Annually, the SBOE Committee on School Finance/Permanent School Fund shall confirm that the PSF and each of its managed portfolios have complied with the provisions of this chapter concerning exclusions imposed by the SBOE, proxy voting, and trading and brokerage selection.
- ~~(6)~~ ~~(5)~~ Significant events. The SBOE must be notified promptly if any of the following events occur within the custodian or external investment manager organizations:
 - (A) any event that is likely to adversely impact to a significant degree the management, professionalism, integrity, or financial position of the custodian or investment manager. A custodian must report the loss of an account of \$500 million or more. An investment manager must report the loss of an account of \$25 million or more;
 - (B) a loss of one or more key people;
 - (C) a significant change in investment philosophy;
 - (D) the addition of a new portfolio manager on the sponsor's account;
 - (E) a change in ownership or control, through any means, of the custodian or investment manager; or
 - (F) any violation of policy.

Text of Proposed Amendments to 19 TAC

Chapter 61. School Districts

Subchapter A. Board of Trustees Relationship

§61.1. Continuing Education for School Board Members.

- (a) Under the Texas Education Code (TEC), §11.159, the State Board of Education (SBOE) shall adopt a framework for governance leadership to be used in structuring continuing education for school board members. The framework shall be posted to the Texas Education Agency (TEA) website and shall be distributed annually by the president of each board of trustees to all current board members and the superintendent.
- (b) The continuing education required under the TEC, §11.159, applies to each member of an independent school district board of trustees. ~~[The continuing education requirement consists of orientation sessions, an annual team building session with the local board and the superintendent, and specified hours of continuing education based on identified needs. The superintendent's participation in team building sessions as part of the continuing education for board members shall represent one component of the superintendent's ongoing professional development.]~~
- (1) Each school board member of an independent school district shall complete ~~[receive]~~ a local district orientation ~~[and an orientation to the TEC]~~ .
- (A) The purpose of the local orientation is to familiarize new board members with local board policies and procedures and district goals and priorities.
- (B) A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.
- (C) The orientation shall be at least three hours in length.
- (D) The orientation shall address local district practices in the following, in addition to topics chosen by the local district:
- (i) curriculum and instruction;
- (ii) business and finance operations;
- (iii) district operations;
- (iv) superintendent evaluation; and
- (v) board member roles and responsibilities.
- (E) Each board member should be made aware of the continuing education requirements of this section and those of the following:
- (i) open meetings act in Texas Government Code, §551.005;
- (ii) public information act in Texas Government Code, §552.012; and
- (iii) cybersecurity in Texas Government Code, §2054.5191.
- (F) The orientation shall be open to any board member who chooses to attend.
- ~~[(A) Each new board member shall participate in a local district orientation session within one year before or 120 days after the board member's election or appointment. The purpose of the local orientation is to familiarize new board members with local board policies and procedures and district goals and priorities. The local district orientation shall be at least three hours in length for each new board member. Any sitting board member may attend~~

~~or participate in the local district orientation. The local district orientation shall address local district practices in the following, in addition to topics chosen by the local district:~~

~~[(i) — curriculum and instruction;]~~

~~[(ii) — business and finance operations;]~~

~~[(iii) — district operations;]~~

~~[(iv) — superintendent evaluation; and]~~

~~[(v) — board member roles and responsibilities.]~~

~~[(B) — A sitting board member shall receive a basic orientation to the TEC and relevant legal obligations. The orientation shall have special but not exclusive emphasis on statutory provisions related to governing Texas school districts. The orientation shall be delivered by regional education service centers (ESCs) and shall be no less than three hours in length. Topics shall include, but not be limited to, the TEC, Chapter 26 (Parental Rights and Responsibilities), and the TEC, §28.004 (Local School Health Advisory Council and Health Education Instruction). A newly elected or appointed board member of an independent school district shall receive the orientation to the TEC within the first 120 days of service. The orientation to the TEC shall be open to any sitting board member who chooses to attend.]~~

~~[(C) — After each session of the Texas Legislature, including each regular session and called session related to education, each school board member shall receive an update from an ESC or any registered provider to the basic orientation to the TEC. The update session shall be of sufficient length to familiarize board members with major changes in the code and other relevant legal developments related to school governance. A board member who has attended an ESC basic orientation session that incorporates the most recent legislative changes is not required to attend an update.]~~

~~(2) Each school board member of an independent school district shall complete a basic orientation to the TEC and relevant legal obligations.~~

~~(A) The orientation shall have special, but not exclusive, emphasis on statutory provisions related to governing Texas school districts.~~

~~(B) A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.~~

~~(C) The orientation shall be at least three hours in length.~~

~~(D) Topics shall include, but not be limited to, the TEC, Chapter 26 (Parental Rights and Responsibilities), and the TEC, §28.004 (Local School Health Advisory Council and Health Education Instruction).~~

~~(E) The orientation shall be provided by a regional education service center (ESC).~~

~~(F) The orientation shall be open to any board member who chooses to attend.~~

~~(G) The continuing education may be fulfilled through online instruction, provided that the training incorporates interactive activities that assess learning and provide feedback to the learner and offers an opportunity for interaction with the instructor.~~

~~(H) The ESC shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.~~

~~(3) After each session of the Texas Legislature, including each regular session and called session related to education, each school board member shall complete an update to the basic orientation to the TEC.~~

- (A) The update session shall be of sufficient length to familiarize board members with major changes in statute and other relevant legal developments related to school governance.
 - (B) The update shall be provided by an ESC or a registered provider, as defined by subsection (c) of this section.
 - (C) A board member who has attended an ESC basic orientation session described in paragraph (2) of this subsection that incorporated the most recent legislative changes is not required to attend an update.
 - (D) The continuing education may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
 - (E) The ESC or registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (4) The entire board shall participate with their superintendent in a team-building session.
- (A) The purpose of the team-building session is to enhance the effectiveness of the board-superintendent team and to assess the continuing education needs of the board-superintendent team.
 - (B) The session shall be held annually.
 - (C) The session shall be at least three hours in length.
 - (D) The session shall include a review of the roles, rights, and responsibilities of a local board as outlined in the framework for governance leadership described in subsection (a) of this section.
 - (E) The assessment of needs shall be based on the framework for governance leadership described in subsection (a) of this section and shall be used to plan continuing education activities for the year for the governance leadership team.
 - (F) The team-building session shall be provided by an ~~ESC or a registered~~ authorized provider as described in subsection ~~(c)~~ (d) of this section.
 - (G) The superintendent's participation in team-building sessions as part of the continuing education for board members shall represent one component of the superintendent's ongoing professional development.
- ~~(2) The entire board, including all board members, shall annually participate with their superintendent in a team building session facilitated by the ESC or any registered provider. The team building session shall be at least three hours in length. The purpose of the team building session is to enhance the effectiveness of the board-superintendent team and to assess the continuing education needs of the board-superintendent team. The session shall include a review of the roles, rights, and responsibilities of a local board as outlined in the framework for governance leadership. The assessment of needs shall be based on the framework for governance leadership and shall be used to plan continuing education activities for the year for the governance leadership team.~~
- (5) ~~(3)~~ In addition to the continuing education requirements in paragraphs (1) through (4) ~~and (2)~~ of this subsection, each board member shall complete ~~receive~~ additional continuing education ~~on an annual basis in fulfillment of assessed needs and~~ based on the framework for governance leadership described in subsection (a) of this section . ~~The continuing education sessions may be provided by ESCs or other registered providers.~~
- (A) The purpose of continuing education is to address the continuing education needs referenced in paragraph (4) of this subsection.
 - (B) The continuing education shall be completed annually.

- (C) ~~(A)~~ In a board member's first year of service, he or she shall complete ~~[receive]~~ at least ten hours of continuing education in fulfillment of assessed needs. ~~[Up to five of the required ten hours may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor. The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (g) of this section.]~~
- (D) ~~(B)~~ Following a board member's first year of service, he or she shall complete ~~[receive]~~ at least five hours of continuing education annually in fulfillment of assessed needs. ~~[A board member may fulfill the five hours of continuing education through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor. The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (g) of this section.]~~
- (E) ~~(C)~~ A board president shall complete ~~[receive]~~ continuing education related to leadership duties of a board president as some portion of the annual requirement.
- (F) At least 50% of the continuing education shall be designed and delivered by persons not employed or affiliated with the board member's local school district. No more than one hour of the required continuing education that is delivered by the local district may utilize self-instructional materials.
- (G) The continuing education shall be provided by an ESC or a registered provider, as defined by subsection (c) of this section.
- (H) The continuing education may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
- (I) The ESC or registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (6) ~~(4)~~ Each school board member shall complete continuing education ~~[every two years]~~ on evaluating student academic performance and setting individual campus goals for early childhood literacy and mathematics and college, career, and military readiness .
- (A) The purpose of the training on evaluating student academic performance is to provide research-based information to board members that is designed to support the oversight role of the board of trustees outlined in the TEC, §11.1515.
- (B) The purpose of the continuing education on setting individual campus goals for early childhood literacy and mathematics and college, career, and military readiness is to facilitate boards meeting the requirements of TEC, §11.185 and §11.186.
- (C) ~~(B)~~ A candidate for school board may complete the training up to one year before he or she ~~[the candidate]~~ is elected or appointed . A ~~[If a]~~ newly elected or appointed school board member who did not complete this training in the year preceding his or her ~~[the member's]~~ election or appointment ~~[, the member]~~ must complete the training within 120 calendar days after election or appointment. ~~[A returning board member shall complete the training by the second anniversary of the completion of the trustee's previous training.]~~
- (D) The continuing education shall be completed every two years.

- ~~(C)~~ An authorized provider for training on evaluating student academic performance is a provider who is registered pursuant to subsection (f) of this section and has demonstrated proficiency in the content required by subsection (b)(4)(E) of this section. Proficiency may be demonstrated by completing a TEA approved train the trainer course and evaluation on the topic, by being certified as a Lone Star Governance coach, through a review of the provider's qualifications and course design, or through other means as determined by the commissioner of education.
- ~~(E)~~ ~~(D)~~ The training [on evaluating student academic performance] shall be at least three hours in length.
- ~~(F)~~ ~~(E)~~ The continuing education [training] required by this subsection shall include, at a minimum [the following] :
- ~~(i)~~ instruction in school board behaviors correlated with ~~(to)~~ improved student outcomes with emphasis on : ~~inputs, outcomes, and collaborative student outcome goal setting;~~
 - ~~(I)~~ setting specific, quantifiable student outcome goals; and
 - ~~(II)~~ adopting plans to improve early literacy and numeracy and college, career, and military readiness for applicable student groups evaluated in the Closing the Gaps domain of the state accountability system established under TEC, Chapter 39;
 - ~~(ii)~~ instruction in progress monitoring practices to improve student outcomes ~~[with emphasis on progress monitoring practices, formative assessments, interim assessments, and summative assessments]~~ ; and
 - ~~(iii)~~ instruction in state accountability with emphasis on the Texas Essential Knowledge and Skills, state assessment instruments administered under the TEC, Chapter 39, and the state accountability ~~[rating]~~ system established under the TEC, Chapter 39 .
- ~~(G)~~ The continuing education shall be provided by an authorized provider as defined by subsection (d) of this section.
- ~~(H)~~ ~~(F)~~ If the training is attended by an entire school board and its superintendent, includes a review of local school district data on student achievement, and otherwise meets the requirements of subsection (b)(4) ~~[(b)(2)]~~ of this section, the training may serve to meet a school board member's obligation to complete ~~[receive]~~ training under subsection (b)(4) and (6) ~~[(b)(2) and (4)]~~ of this section, as long as the training complies with the Texas Open Meetings Act.
- ~~(7)~~ Each board member shall complete continuing education on identifying and reporting potential victims of sexual abuse, human trafficking, and other maltreatment of children in accordance with TEC, §11.159(c)(2).
- ~~(A)~~ A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.
 - ~~(B)~~ The training shall be completed every two years.
 - ~~(C)~~ The training shall be at least one hour in length.
 - ~~(D)~~ The training must familiarize board members with the requirements of TEC, §38.004 and §38.0041, and §61.1051 of this title (relating to Reporting Child Abuse or Neglect, Including Trafficking of a Child).
 - ~~(E)~~ The training required by this subsection shall include, at a minimum:

- (i) instruction in best practices of identifying potential victims of child abuse, human trafficking, and other maltreatment of children;
 - (ii) instruction in legal requirements to report potential victims of child abuse, human trafficking, and other maltreatment of children; and
 - (iii) instruction in resources and organizations that help support victims and prevent child abuse, human trafficking, and other maltreatment of children.
- (F) The training sessions shall be provided by a registered provider as defined by subsection (c) of this section.
- (G) This training may be completed online, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
- (H) The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (c) For the purposes of this section, a registered provider has demonstrated proficiency in the content required for a specific training. A private or professional organization, school district, government agency, college/university, or private consultant shall register with the TEA to provide the board member continuing education required in subsection (b)(3), (5), and (7) of this section.
- (1) The registration process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.
 - (2) An updated registration shall be required of a provider of continuing education every three years.
 - (3) A school district that provides continuing education exclusively for its own board members is not required to register.
 - (4) An ESC is not required to register under this subsection.
- (d) An authorized provider meets all the requirements of a registered provider and has demonstrated proficiency in the content required in subsection (b)(4) and (6) of this section. Proficiency may be demonstrated by completing a TEA-approved train-the-trainer course that includes evaluation on the topics and following a review of the provider's qualifications and course design, or through other means as determined by the commissioner.
- (1) A private or professional organization, school district, government agency, college/university, or private consultant may be authorized by TEA to provide the board member training required in subsection (b)(4) and (6) of this section.
 - (2) An ESC shall be authorized by TEA to provide the board member training required in subsection (b)(4) and (6) of this section.
 - (3) The authorization process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.
 - (4) An updated authorization shall be required of a provider of training every three years.
- (e) ~~(e)~~ No continuing education shall take place during a school board meeting unless that meeting is called expressly for the delivery of board member continuing education. However, continuing education may take place prior to or after a legally called board meeting in accordance with the provisions of the Texas Government Code, §551.001(4).
- (f) ~~(d)~~ An ESC board member continuing education program shall be open to any interested person, including a current or prospective board member. A district is not responsible for any costs associated with individuals who are not current board members.

(g) ~~(e)~~ A registration fee shall be determined by ESCs to cover the costs of providing continuing education programs offered by ESCs.

~~(f) — A private or professional organization, school district, government agency, college/university, or private consultant shall register with the TEA to provide the board member continuing education required in subsection (b)(1)(C) and (2)-(4) of this section.]~~

~~(1) — The registration process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.]~~

~~(2) — An updated registration shall be required of a provider of continuing education every three years.]~~

~~(3) — A school district that provides continuing education exclusively for its own board members is not required to register.]~~

~~(4) — An ESC is not required to register under this subsection.]~~

(h) ~~(g)~~ For each training described in this section, the ~~The~~ provider of continuing education shall provide verification of completion of board member continuing education to the individual participant and to the participant's school district. The verification must include the provider's authorization or registration number.

~~(h) — At least 50% of the continuing education required in subsection (b)(3) of this section shall be designed and delivered by persons not employed or affiliated with the board member's local school district. No more than one hour of the required continuing education that is delivered by the local district may utilize self-instructional materials.]~~

(i) To the extent possible, the entire board shall participate in continuing education programs together.

(j) At the last regular meeting of the board of trustees before an election of trustees, the current president of each local board of trustees shall announce the name of each board member who has completed the required continuing education, who has exceeded the required hours of continuing education, and who is deficient in meeting the required continuing education as of the anniversary of the date of each board member's election or appointment to the board or two-year anniversary of his or her previous training, as applicable . The announcement shall state that completing the required continuing education is a basic obligation and expectation of any sitting board member under SBOE rule. The minutes of the last regular board meeting before an election of trustees must reflect whether each trustee has met or is deficient in meeting the training required for the trustee as of the first anniversary of the date of the trustee's election or appointment or two-year anniversary of his or her previous training, as applicable . The president shall cause the minutes of the local board to reflect the announcement and, if the minutes reflect that a trustee is deficient in training as of the anniversary of his or her joining the board, the district shall post the minutes on the district's Internet website within 10 business days of the meeting and maintain the posting until the trustee meets the requirements.

(k) Annually, the SBOE shall commend those local board-superintendent teams that complete ~~receive~~ at least eight hours of the continuing education specified in subsection (b)(4) and (5) ~~(b)(2) and (3)~~ of this section as an entire board-superintendent team.

(l) Annually, the SBOE shall commend local board-superintendent teams that effectively implement the commissioner's trustee improvement and evaluation tool developed under the TEC, §11.182, or any other tool approved by the commissioner.

(m) This section will be implemented May 1, 2020. This section as it read prior to adoption by the SBOE at its January 2020 meeting controls continuing education for school board members until May 1, 2020.

§61.2. Nomination of Trustees for Military Reservation School Districts and Boys Ranch Independent School District.

(a) In nominating trustee candidates for military reservation school districts, the commanding officer of the military reservation shall do the following:

(1) submit a list to the commissioner of education with at least one nominee ~~three nominees~~ for each vacancy. A majority of the trustees appointed to the school board must be civilian, and all may be

civilian. When two or more vacancies occur simultaneously, a list of at least one nominee [~~three different nominees~~] for each vacancy shall be submitted. In cases when the commanding officer wishes to reappoint existing board members, a list of at least one nominee [~~three nominees~~] for each vacancy must still be submitted. Nominees not selected for existing vacancies may be resubmitted as candidates for subsequent vacancies. The commanding officer may rank in the order of preference the nominees submitted for each vacancy;

- (2) submit a statement that verifies that each of the nominees is qualified under the general school laws of Texas and lives or is employed on the military reservation;
 - (3) submit a copy of a current biographical vita (resume) for each nominee [~~of the nominees~~], with a signature by the nominee attesting truth to the contents of the biographical vita;
 - (4) submit a statement from each nominee that [~~of the nominees which~~] expresses the nominee's willingness to accept appointment and to serve in such a capacity with full adherence to the state-established standards on the duties and responsibilities of school board members;
 - (5) submit a signed statement that [~~which~~] expresses recognition of the powers of the board of trustees to govern and manage the operations of the military reservation school districts;
 - (6) submit a signed statement regarding the governance and management operations of the district that [~~which~~] expresses recognition that the role of the commanding officer of the military reservation is limited only to the duty defined by statute in the process for appointing members of the board of trustees; and
 - (7) submit a statement that the membership composition of the entire board of trustees is in full compliance with the provisions of the Texas Education Code (TEC), §11.352.
- (b) In nominating trustee candidates for the Boys Ranch Independent School District (ISD), the president and chief executive officer of the Cal Farley's Boys Ranch shall do the following:
- (1) submit a name to the commissioner for each vacancy. When two or more vacancies occur simultaneously, a name for each vacancy shall be submitted. In cases when the president and chief executive officer wishes to reappoint existing board members, the name of the existing board member for each vacancy must still be submitted;
 - (2) submit a statement that verifies that each of the nominees is qualified under the general school laws of Texas;
 - (3) submit a copy of a current biographical vita (resume) for each of the nominees, with a signature by the nominee attesting truth to the contents of the biographical vita;
 - (4) submit a statement from each of the nominees that [~~which~~] expresses the nominee's willingness to accept appointment and to serve in such a capacity with full adherence to the state-established standards on the duties and responsibilities of school board members;
 - (5) submit a signed statement that [~~which~~] expresses recognition of the powers of the board of trustees to govern and manage the operations of the Boys Ranch ISD;
 - (6) submit a signed statement regarding the governance and management operations of the district that [~~which~~] expresses recognition that the role of the superintendent is in full compliance with the provisions of the TEC, §11.201; and
 - (7) submit a statement that the membership composition of the entire board of trustees is in full compliance with the provisions of the TEC, §11.352.
- (c) A member of a board of trustees appointed under the TEC, §11.352, and this section will serve a term of two years. A member of the board of trustees, who during the period of the term of office resigns from office or experiences a change of status that disqualifies such member for appointment under the provisions of the TEC, shall become ineligible to serve at the time of the change of status. A board vacancy resulting from such resignation or disqualification shall be filled in accordance with the procedures established under the TEC, §11.352, and this section.

Minutes

State Board of Education Committees

January 28-30, 2020

**Report of the State Board of Education
Committee of the Full Board
January 28, 2020**

The State Board of Education Committee of the Full Board met at 9:15 a.m. on Tuesday, January 28, 2020, in the State Board of Education Room, #1-104, of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Keven Ellis, chair; Lawrence A. Allen, Jr.; Donna Bahorich; Barbara Cargill; Ruben Cortez, Jr.; Aicha Davis; Pat Hardy; Pam Little; Tom Maynard; Sue Melton-Malone; Ken Mercer; Georgina C. Pérez; Marisa B. Perez-Diaz; Matt Robinson; Marty Rowley

Public Testimony

The Committee of the Full Board heard public testimony on agenda item #3. Information regarding the individuals who presented public testimony is included in the discussion of that item.

The Committee of the Full Board considered items in the following order: Item number 1, 3, 4, 5, 2, 6, 7.

DISCUSSION ITEMS

1. Presentation by the Texas Teachers of the Year and Superintendent of the Year
(Board agenda page I-1)

The committee heard presentations about the importance of public education from Texas Secondary Teacher of the Year, Michelle Sandoval, from Parkland Middle School in the Ysleta Independent School District (ISD); Texas Elementary Teacher of the Year, Karen Sams, from David Crockett Elementary School in Weatherford ISD; and Texas Superintendent of the Year, Keith Bryant, from Lubbock-Cooper ISD.

2. Commissioner's Comments
(Board agenda page I-2)

Commissioner of Education Mike Morath presented a high-level overview of the Texas Education Agency's 2019 Annual Report and briefly highlighted each section of the report. He also explained that the agency filed a proposed amendment to a rule related to the annual charter school review and approval process. There was a discrepancy in the language that has created confusion and the agency intends to adjust the language to respond to public comments and reflect the intent that the rule raise the threshold for charter expansion.

3. Public Hearing on Proposed New African American Studies Course
(Board agenda page I-3)

Public testimony was provided by the following individuals:

NAME: Jamila Thomas
AFFILIATION: Self

NAME: Eliza Epstein
AFFILIATION: Self

NAME: Nalleli Hidalgo
AFFILIATION: Texas Environmental Justice Advocacy Services

NAME: Deyadira Arellano
AFFILIATION: Ethnic Studies Network of Texas and Texas Environmental Justice Advocacy Services

NAME: Brandon Johnson
AFFILIATION: Self

NAME: Mario Salas
AFFILIATION: Self

NAME: Philemon Brown
AFFILIATION: Self

NAME: Shalon Bond
AFFILIATION: Self

NAME: Stephanie Boyce
AFFILIATION: Self

ACTION ITEMS

4. One-Time Procedural Action to Correct Amendment to 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter B, State Adoption of Instructional Materials

(Board agenda page I-5)
[Official agenda item #3]

Kelly Callaway, senior director, instructional materials, asked that the board take a one-time action to amend an action taken at the November 15, 2019, meeting to reinstate the sentence "Samples of submitted prekindergarten materials must match the format of the products to be provided to schools upon ordering" in §66.28(d)(2) and remove the sentence "Samples of adopted prekindergarten materials must match the format of the products to be provided to schools upon ordering" from §66.28(d)(7).

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Mrs. Little, and carried unanimously to recommend that the State Board of Education amend the previously adopted motion from the November 15, 2019 minutes of the State Board of Education to reinstate the sentence "Samples of submitted prekindergarten materials must match the format of the products to be provided to schools upon ordering" in 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter B, State Adoption of Instructional Materials, §66.28(d)(2), and to remove the sentence "Samples of adopted prekindergarten materials must match the format of the products to be provided to schools upon ordering" from §66.28(d)(7).*

5. **Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.12, Foundation High School Program, and §74.13, Endorsements (First Reading and Filing Authorization)**
(Board agenda page I-9)
[Official agenda item #4]

Monica Martinez, associate commissioner for standards and support services, reviewed the proposed changes to the graduation rules and explained that the changes would align the rules with the requirements of House Bill (HB) 678, 86th Texas Legislature, 2019, and with revisions to career and technical education (CTE) programs of study.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Dr. Robinson, and carried unanimously to recommend that the State Board of Education approve for first reading and filing authorization proposed amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter B, Graduation Requirements, §74.11, High School Graduation Requirements; §74.12, Foundation High School Program; and §74.13, Endorsements.*

6. **Proposed Revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses (First Reading and Filing Authorization)**
(Board agenda page I-20)
[Official agenda item #5]

Shelly Ramos, senior director, curriculum standards and student support, explained the proposed changes to Subchapter D. Ms. Martinez gave a brief overview of changes to the proposed Ethnic Studies: African American Studies course that were recommended by staff.

MOTION: *It was moved by Mr. Maynard and seconded by Mrs. Baborich to recommend that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses.*

MOTION AND VOTE: *It was moved by Mr. Maynard, seconded by Mrs. Cargill, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(9)(A) to read:*

“compare the effects of revolutionary ideologies, such as life, liberty, and the pursuit of happiness, on political perspectives of African Americans ~~such as life, liberty, and the pursuit of happiness;~~”

MOTION AND VOTE: *It was moved by Mr. Maynard, seconded by Ms. Hardy, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(15)(C) to read:*

“examine the contributions of significant African American individuals to science, philosophy, mathematics, and technology, including Benjamin Banneker, Katherine Johnson, Henrietta Lacks, Mae Jemison, Dorothy Vaughan, George Washington Carver, Neil deGrasse Tyson, ~~Katherine Johnson,~~ and Mary Jackson.”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education amend §113.51(a)(1) to strike “multiple perspectives and” from the last sentence.*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(1)(A) to read:*

“identify the major eras, civilizations, and contributions of African ~~American~~ history that are foundational to humanity and predate American slavery;”

MOTION: *It was moved by Ms. Davis and seconded by Ms. Hardy to recommend that the State Board of Education amend §113.51(b)(2)(B) to read:*

“assess and discuss the impact of the Middle Passage on the development of African and African American slave experience over time culture;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried to amend the motion to read:*

“assess and discuss the impact of the Middle Passage on ~~the development of African and African American~~ culture;”

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education amend §113.51(b)(2)(B) as amended. The motion carried.*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education strike §113.51(b)(2)(D).*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(3) to read:*

“History. The student understands the rationalization ~~justifications~~ and ramifications for the continuation and growth of slavery and the anti-slavery movement in the United States from independence (1776) through the Emancipation Proclamation (1863). The student is expected to:”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(3)(A) to read:*

“identify and evaluate the economic, social, religious, and legal rationalization ~~justifications~~ used by Americans to continue and expand slavery after declaring independence from Great Britain;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(3)(B) to read:*

“describe the impact issues surrounding the passing and influence of the Three-Fifths Compromise and the Fugitive Slave Act ~~on African Americans in the United States;~~”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Perez-Diaz, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(3)(E) to read:*

“analyze the influence of significant individuals and groups prior to and during the abolitionist movement to determine their impact on ending slavery, including the work of the American Anti-Slavery Society, Underground Railroad, David Walker, Phillis Wheatley, Sojourner Truth, and Frederick Douglass, ~~Richard Allen, Harriet Tubman, Ellen Craft, and Anthony Burns.~~”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(4)(C) to read:*

“examine the opportunities as a result of the ~~compare divergent paths~~ and challenges faced by African American men and women from post-Reconstruction to the early 20th century, including Ida B. Wells, W.E.B. Du Bois, Booker T. Washington, the National Association for the Advancement of Colored People (NAACP), Freedmen’s Towns, and the Exodusters;”

MOTION: *It was moved by Ms. Davis and seconded by Ms. Perez-Diaz to recommend that the State Board of Education amend §113.51(b)(4)(H) to read:*

“evaluate the experiences of African American soldiers during and after ~~impact participation in World War I on the African American experience, including the Buffalo Soldiers.~~”

MOTION AND VOTE: *It was moved by Mrs. Bahorich and carried unanimously to amend the motion to read:*

“evaluate the experiences of African American soldiers, including the Buffalo Soldiers during and after World War I.”

MOTION AND VOTE: *It was moved by Mrs. Cargill and carried unanimously to amend the motion to read:*

“examine ~~evaluate~~ the experiences of African American soldiers, including the Buffalo Soldiers during and after World War I.”

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education amend §113.51(b)(4)(H) as amended. The motion carried.*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(5)(B) to strike “such as Juanita Craft.”*

MOTION AND VOTE: *It was moved by Ms. Davis and carried unanimously to recommend that the State Board of Education amend §113.51(b)(5)(D) to read:*

“explain the contributions of significant African American individuals and groups during World War II, including the Tuskegee Airmen, the 761st Tank Battalion, and Doris “Dorie” Dorie Miller;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Cortez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(7)(B) to read:*

“compare and contrast ~~identify and describe~~ the physical and human geographic factors in the North and South related to the Atlantic Slave Trade, and the plantation system, the expansion ~~institution~~ of slavery, and the Industrial Revolution;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mrs. Bahorich, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(8)(C) to read:*

“analyze the effects of the Industrial Revolution and the cotton gin on the economies of the ~~American South, the~~ United States; and the world;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Perez-Diaz, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(9)(C) to read:*

“analyze the construction, interpretation and implementation ~~impact~~ of the 13th, 14th, and 15th Amendments to the U.S. Constitution and the effects on African American men and women between 1877 and 1920;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Maynard, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(9)(E) to read:*

“analyze the causes and effects of government actions and legislation addressing racial and social injustices ~~legislative developments~~ from 1960 to the present day, such as the issues of ~~including~~ voting rights, civil rights, fair housing, education, employment, affirmative action, and health and nutrition;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mrs. Bahorich, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(10) to read:*

“Government. The student understands the impact of political interactions on the African American struggle for human rights ~~pursuit of full citizenship~~ over time. The student is expected to:”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mrs. Cargill, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(10)(C) to read:*

“identify and analyze the contributions of civic participation of African Americans in terms of leadership roles at local, state, and federal levels of government, including U.S. Supreme Court cases and strategic planning at various levels.”

MOTION: *It was moved by Ms. Davis and seconded by Ms. Pérez to recommend that the State Board of Education amend §113.51(b)(11) to read:*

“Citizenship. The student understands the importance of multiple and changing ~~different~~ points of view regarding citizenship and African Americans ~~in a constitutional republic~~. The student is expected to:”

MOTION AND VOTE: *It was moved by Mrs. Bahorich and carried to amend the motion to read:*

“Citizenship. The student understands the importance of multiple and changing points of view regarding citizenship and African Americans in a constitutional republic. The student is expected to:”

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Ms. Perez-Diaz, and carried to amend the motion to read:*

“Citizenship. The student understands the importance of multiple and changing points of view regarding citizenship of ~~and~~ African Americans in a constitutional republic. The student is expected to:”

MOTION AND VOTE: *It was moved by Mrs. Bahorich and carried to amend the motion to strike “in a constitutional republic.”*

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education amend §113.51(b)(11) as amended. The motion carried.*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Rowley, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(13)(A) to read:*

“identify and evaluate the influence of African oral traditions, visual art, literary art, theater, music, and dance on African American culture;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(13)(C) to read:*

“identify and evaluate the contributions of early African American literature writers, including the works of Phillis Wheatley and Jupiter Hammon;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(13)(D) to read:*

“explain the origins and characteristics of different musical genres and traditions of African Americans folk art, work songs, spirituals, and gospel music; and”

MOTION AND VOTE: *It was moved by Ms. Davis and carried unanimously to recommend that the State Board of Education amend §113.51(b)(14)(B) to read:*

“examine how various African American expressions of dance forms, such as including tap dance, step dance, hip hop, and modern dance, and the contributions of African American dancers, such as including Katherine Dunham, and Misty Copeland, Alvin Ailey, Bill “Bojangles” Robinson, and the Dance Theatre of Harlem have contributed to the shared identity of various groups;”

MOTION AND VOTE: *It was moved by Ms. Davis and carried unanimously to recommend that the State Board of Education amend §113.51(b)(14)(C) to add Jules Bledsoe to the list of individuals.*

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(14)(E) to read:*

“examine storytelling, literary, filmmaking, and visual arts contributions related to the self-identity made by African Americans such as Maya Angelou, bell hooks, John T. Biggers, Oscar Micheaux, Lorraine Hansberry, Amiri Baraka, August Wilson, Faith Ringgold, Sidney Poitier, Spike Lee, John Singleton, and Oprah Winfrey;”

MOTION AND VOTE: *It was moved by Ms. Davis, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(15)(C) to add Granville Woods to the list of individuals.*

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(2)(A) to read:*

“analyze the economic, political, and social reasons for focusing on the African diaspora ~~the slave trade on Africa~~, including the role of Africans, Europeans, and ~~American colonists~~ colonization in North, Central, and South America, the West Indies, and neighboring islands, and the interactions among enslaved Africans and Native Americans;”

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(3)(E) to read:*

“analyze the influence of significant individuals and groups prior to and during the abolitionist movement to determine their impact on ending slavery, including the work of the American Anti-Slavery Society, Underground Railroad, David Walker, ~~Phillis Wheatley~~, Sojourner Truth, Elijah P. Lovejoy, John Brown, and Frederick Douglass.”

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mr. Mercer, and carried unanimously to recommend that the State Board of Education add new §113.51(b)(3)(F) to read:*

“examine national and international abolition efforts, including the U.S. ban on the slave trade (1808) and the abolition of slavery in Mexico (1829) and Great Britain (1833) and the role that the Guerrero Decree played in the Texas Revolution.”

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Ms. Davis, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(4)(D) to read:*

“explain the circumstances surrounding increased violence and extremism such as the Colfax Massacre, the Ku Klux Klan (KKK), lynchings, ~~and~~ race riots, and the Camp Logan Mutiny (the Houston Riot of 1917);”

MOTION AND VOTE: *It was moved by Ms. Pérez, seconded by Mrs. Little, and carried unanimously to recommend that the State Board of Education amend §113.51(b)(5)(B) to read:*

“describe the continued struggle for civil rights in America during this time in history, including the notable works of the NAACP, National Urban League, Martin Luther King, Jr., Daisy Bates and the Little Rock Nine, Jackie Robinson, and local leaders;”

MOTION: *It was moved by Ms. Pérez to recommend that the State Board of Education add new §113.51(b)(5)(C) to read:*

“describe the interactions between the Afro Latino/African American/Mexican American examples of solidarity during the struggle for civil rights;”

MOTION AND VOTE: *It was moved by Mr. Rowley and carried unanimously to recommend that the State Board of Education amend §113.51(b)(5)(C) to read:*

“describe the interactions of the people of the diaspora relative to ~~between the Afro Latino/African American/Mexican American examples of solidarity during~~ the struggle for civil rights;”

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education amend §113.51(b)(5)(C) as amended. The motion carried.*

MOTION AND VOTE: *It was moved by Ms. Pérez and carried to recommend that the State Board of Education add new §113.51(b)(8)(J) to read:*

“examine the contributions of African American and Black American business entrepreneurship such as Black Wall Street, black inventors, the Black experience in business, and the economic contributions of individuals such as Madam C.J. Walker and Fannie Lou Hamer.”

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 113, Texas Essential Knowledge and Skills for Social Studies, Subchapter C, High School, and Subchapter D, Other Social Studies Courses, as amended. The motion carried unanimously.*

(Mr. Allen, Ms. Hardy, and Dr. Robinson were absent for the vote.)

7. **Proposed Revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education**
(First Reading and Filing Authorization)

(Board agenda page I-43)

[Official agenda item #6]

Ms. Ramos explained that the proposed revisions would fulfill requirements of HB 963, 86th Texas Legislature, 2019, which requires the SBOE to consolidate technology applications and career and technical education (CTE) courses and eliminate duplicative courses. Additionally, Ms. Ramos stated that the proposed revisions would add a new subchapter for energy courses to align with revisions to the CTE programs of study.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Mrs. Little, and carried to recommend that the State Board of Education approve for first reading and filing authorization proposed revisions to 19 TAC Chapter 126, Texas Essential Knowledge and Skills for Technology Applications, Subchapter C, High School, and Subchapter D, Other Technology Applications Courses, and Chapter 130, Texas Essential Knowledge and Skills for Career and Technical Education, Subchapter A, Agriculture, Food, and Natural Resources; Subchapter C, Arts, Audio/Video Technology, and Communications; Subchapter K, Information Technology; Subchapter O, Science, Technology, Engineering, and Mathematics; and Subchapter Q, Energy.*

(Mr. Allen, Ms. Hardy, and Dr. Robinson were absent for the vote.)

Dr. Ellis adjourned the meeting at 5:35 p.m.

**Report of the State Board of Education
Committee of the Full Board
January 29, 2020**

The State Board of Education Committee of the Full Board met at 1:08 p.m. on Wednesday, January 29, 2020, in the State Board of Education Room, #1-104, of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Keven Ellis, chair; Lawrence A. Allen, Jr.; Donna Bahorich; Barbara Cargill; Aicha Davis; Pat Hardy; Pam Little; Tom Maynard; Sue Melton-Malone; Ken Mercer; Georgina C. Pérez; Marisa B. Perez-Diaz; Matt Robinson; Marty Rowley

Absent: Ruben Cortez, Jr.

Public Testimony

The Committee of the Full Board heard public testimony on agenda items #1, #2 and #3. Information regarding the individuals who presented public testimony is included in the discussion of that item.

ACTION ITEMS

- 1. Amendments to *Proclamation 2021* of the State Board of Education Advertising for Bids on Instructional Materials**
(Board agenda page I-138)
[Official agenda item #7]

Public testimony was provided by the following individuals:

NAME: Jennifer Burchfiel
AFFILIATION: Dallas Independent School District (ISD)

NAME: Keila Carrillo
AFFILIATION: Dallas ISD

Kelly Callaway, senior director, instructional materials, explained that the item provided an opportunity for the State Board of Education (SBOE) to amend *Proclamation 2021* to reflect revisions to 19 Texas Administrative Code (TAC) Chapter 66, State Adoption of Distribution of Instructional Materials, Subchapter B, State Adoption of Instructional Materials, adopted by the SBOE in November 2019. *Proclamation 2021* calls for instructional materials for prekindergarten.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Ms. Perez-Diaz, and carried unanimously to recommend that the State Board of Education approve proposed amendments to Proclamation 2021 of the State Board of Education Advertising for Bids on Instructional Materials.*

2. Update on Texas Essential Knowledge and Skills (TEKS) Review
(Board agenda page I-139)
[Official agenda item #8]

Public testimony was provided by the following individuals:

NAME: Molly Clayton
AFFILIATION: Texas Campaign to Prevent Teen Pregnancy

NAME: Karen Johnson
AFFILIATION: Self

NAME: Ann Mulvihill
AFFILIATION: Metroplex Area Science Supervisors

NAME: Jennifer Goss
AFFILIATION: Self

NAME: Linda Cook
AFFILIATION: Self

NAME: Terry Ward
AFFILIATION: Texas Science Education Leadership Association

NAME: Sandra West
AFFILIATION: Self

NAME: Meredith Bell
AFFILIATION: Self

NAME: Evan Whitfield
AFFILIATION: Coppell ISD

Monica Martinez, associate commissioner, standards and support services, provided an update on the review process for the health education and physical education TEKS. Ms. Martinez shared upcoming activities related to the review. She also provided an update on the review and revision of the science TEKS and provided an overview of the science content advisor consensus recommendations as well as preliminary results from the science TEKS survey.

MOTION AND VOTE: *It was moved by Mrs. Cargill, seconded by Mr. Rowley, and carried to recommend that the State Board of Education direct the science TEKS review work groups to strongly consider maintaining the language in Biology student expectations 7.B, 4.A, and 6.A as well as 3.A.*

MOTION AND VOTE: *It was moved by Mrs. Cargill, seconded by Mr. Rowley, and carried to recommend that the State Board of Education direct the science TEKS review work groups to standardize the language of student expectation 3.A in Biology, Chemistry, IPC, and Physics in all other high school science courses.*

MOTION: *It was moved by Mr. Rowley and seconded by Ms. Perez-Diaz to recommend that the State Board of Education direct the science TEKS review work groups to consider how the K-12*

Framework and the Next Generation Science Standards might be incorporated, integrated, or used as a resource in the existing science TEKS that they are reviewing.

MOTION AND VOTE: *It was moved by Dr. Robinson, seconded by Mr. Mercer, and carried unanimously to amend the motion to read:*

“direct the science TEKS review work groups to consider how the K-12 Framework and the Next Generation Science Standards will be ~~incorporated, integrated, or~~ used as a resource in the existing science TEKS that they are reviewing.”

MOTION AND VOTE: *It was moved by Mrs. Little, seconded by Mrs. Cargill, and carried unanimously to amend the motion to read:*

“direct the science TEKS review work groups to consider how the K-12 Framework and the Next Generation Science Standards will be used as a resource to inform recommendations for revision of the in the existing science TEKS that they are reviewing.”

VOTE: *A vote was taken on the original motion to recommend that the State Board of Education direct the science TEKS review work groups to consider how the K-12 Framework and the Next Generation Science Standards will be used as a resource to inform recommendations for revision of the science TEKS. The motion carried unanimously.*

3. **Proposed New 19 TAC Chapter 61, School Districts, Subchapter B, Special Purpose School Districts, §61.101, Applicability of State Law for Special Purpose School Districts (First Reading and Filing Authorization)**
(Board agenda page I-142)
[Official agenda item #9]

Ms. Martinez explained that this item provided an opportunity for the committee to further discuss rules regarding The University of Texas (UT) at Austin High School and Texas Tech University (TTU) K-12 special purpose school districts. Dr. Ellis stated his intent to postpone action on the item.

Public testimony was provided by the following individuals:

NAME: Beth Cooper
AFFILIATION: UT Austin High School

NAME: Justin Louder
AFFILIATION: TTU K-12

Dr. Ellis stated his intent to appoint an ad hoc committee to review outstanding issues. The committee asked that TEA staff, representatives of the universities, and the ad hoc committee work together to prepare proposed rule text for consideration in April.

DISCUSSION ITEMS

4. Discussion of *Proclamation 2022* of the State Board of Education Advertising for Bids on Instructional Materials

(Board agenda page I-146)

Ms. Callaway requested that committee members review the draft proclamation before the April meeting and decide if the courses included in the draft are the courses the board wishes to include in the proclamation.

5. Discussion of Character Traits Instruction

(Board agenda page I-151)

Ms. Martinez provided an overview of recent legislation that requires the State Board of Education (SBOE) to integrate, as appropriate, positive character traits into the essential knowledge and skills adopted for kindergarten through grade 12. She outlined where in the standards character traits are currently addressed and provided two options for the board to consider to address the remaining character traits. The board asked that staff create a new section in the administrative code to address this new requirement.

6. Discussion of Perkins Reauthorization and State Plan

(Board agenda page I-152)

Heather Justice, director, college, career, and military preparation, provided an overview of the draft Texas Perkins V four-year career and technical education state plan. She explained steps that were taken to develop the draft and stated that the plan will be submitted to the SBOE for approval at the April board meeting prior to submission to the U.S. Department of Education in spring 2020.

7. Discussion of Pending Litigation

(Board agenda page I-154)

The committee did not discuss pending litigation; therefore, no executive session was held.

Dr. Ellis adjourned the meeting at 7:12 p.m.

**Report of the State Board of Education
Committee on Instruction
January 30, 2020**

The State Board of Education Committee on Instruction met at 9:12 a.m. on Thursday, January 30, 2020, in Room #1-100 of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Sue Melton-Malone, chair; Pam Little, vice chair; Aicha Davis; Georgina C. Pérez; Marty Rowley

Public Testimony

The Committee on Instruction received no presentations of public testimony.

ACTION ITEMS

1. **Proposed Amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit (Second Reading and Final Adoption)**
(Board agenda page II-1)
[Official agenda item #10]

Shelly Ramos, senior director, curriculum standards and student support, explained that the proposed amendment would update the current rule to allow a district to award credit proportionately for successful completion of half of a course regardless of the time duration of the course. Ms. Ramos further explained that one public comment was received on this proposal, but that no changes were recommended.

MOTION AND VOTE: *It was moved by Mrs. Little, seconded by Ms. Davis, and carried unanimously to recommend that the State Board of Education approve for second reading and final adoption the proposed amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit; and*

Make an affirmative finding that immediate adoption of proposed amendment to 19 TAC Chapter 74, Curriculum Requirements, Subchapter C, Other Provisions, §74.26, Award of Credit, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register.

2. **Proposed Amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies (One Credit), Adopted 2013**

(Second Reading and Final Adoption)

(Board agenda page II-6)

[Official agenda item #11]

Ms. Ramos explained that the proposed amendments would revise the Texas Essential Knowledge and Skills (TEKS) for music to align with current International Baccalaureate (IB) course offerings.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies (One Credit), Adopted 2013; and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 117, Texas Essential Knowledge and Skills for Fine Arts, Subchapter C, High School, §117.312, Music, Level III (One Credit), Adopted 2013; §117.313, Music, Level IV (One Credit), Adopted 2013; and §117.314, Music Studies (One Credit), Adopted 2013, is necessary and shall have an effective date of August 1, 2020.

3. **Proposed Repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32**

(First Reading and Filing Authorization)

(Board agenda page II-11)

[Official agenda item #12]

Ms. Ramos explained that with the implementation of the revised TEKS for English I-IV and ESOL I-II, the former TEKS must be repealed.

MOTION AND VOTE: *It was moved by Mrs Little, seconded by Ms. Pérez, and carried unanimously to recommend that the State Board of Education suspend the board operating procedures in accordance with §5.2(a) to allow consideration at first reading and filing authorization; and*

Approve for first reading and filing authorization the proposed repeal of 19 TAC Chapter 110, Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C, High School, §§110.30-110.34, and Subchapter D, Other High School English Language Arts and Reading Courses, §110.85, and Chapter 128, Texas Essential Knowledge and Skills for Spanish Language Arts and Reading and English as a Second Language, Subchapter C, High School, §§128.30-128.32.

4. **Adoption of Review of 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter A, General Provisions, Subchapter B, State Adoption of Instructional**

Materials, and Subchapter C, Local Operations
(Adoption of Review)

(Board agenda page II-14)
[Official agenda item #13]

Kelly Callaway, senior director, instructional material, explained that this item allows the board to adopt the review of Chapter 66, State Adoption and Distribution of Instructional Materials.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Mrs. Little, and carried unanimously to recommend that the State Board of Education adopt the review of 19 TAC Chapter 66, State Adoption and Distribution of Instructional Materials, Subchapter A, General Provisions, Subchapter B, State Adoption of Instructional Materials, and Subchapter C, Local Operations.*

5. Approval of Substitution of Instructional Materials for Origo Education

(Board agenda page II-41)
[Official agenda item #14]

Ms. Callaway explained that Origo Education has not provided the information needed for approval of substituted content and gave an overview of actions that have taken place since the Instruction Materials Division was made aware of the content changes.

The committee requested that staff research actions the committee can consider and prepare an action item regarding the issue for the April agenda.

6. Proposed Approval of Innovative Courses

(Board agenda page II-42)
[Official agenda item #15]

Ms. Ramos explained that there were eight innovative courses recommended for approval that do not fall within any of the subject areas of the foundation or enrichment curriculum: Advanced Placement Seminar, Advanced Placement Research, Gifted and Talented Interdisciplinary Studies/Mentor Seminar I-IV, Logic I, and Logic II. All courses have been previously approved.

MOTION AND VOTE: *It was moved by Mr. Rowley, seconded by Mrs. Little, and carried unanimously to recommend that the State Board of Education approve for a period of five years the following innovative courses that do not fall within any of the subject areas of the foundation or enrichment curriculum: Advanced Placement Seminar, Advanced Placement Research, Gifted and Talented Interdisciplinary Studies/Mentor Seminar I-IV, Logic I, and Logic II.*

DISCUSSION ITEM

7. **Discussion of Proposed Amendments to 19 TAC Chapter 74, Curriculum Requirements, Subchapter A, Required Curriculum, §74.1, Essential Knowledge and Skills, and §74.3, Description of a Required Secondary Curriculum**
(Board agenda page II-46)

Ms. Ramos provided an overview of recommendations to update rules for the required curriculum to align with recent legislation and other board rules. She explained that with the consolidation of high school technology applications courses into career and technical education (CTE), the required secondary curriculum would need to be revised. Monica Martinez, associate commissioner for standards and support services, provided background information on the requirement that districts offer technology applications courses and asked the committee how to address technology applications in the rules. The committee indicated that districts should no longer be required to offer specific technology applications courses since they will be included in CTE.

The meeting of the Committee on Instruction adjourned at 10:03 a.m.

**Report of the State Board of Education
Committee on School Finance/Permanent School Fund
January 30, 2020**

The State Board of Education Committee on School Finance/Permanent School Fund met at 9:03 a.m. on Thursday, January 30, 2020, in Room #1-104 of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Tom Maynard, chair; Donna Bahorich; Patricia Hardy; Ken Mercer

Absent: Lawrence A. Allen, Jr., vice chair

Public Testimony

The Committee on School Finance/Permanent School Fund received no presentations of public testimony.

ACTION ITEM

- 1. Proposed Repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds (First Reading and Filing Authorization)**
(Board agenda page III-1)
[Official agenda item #16]

David Marx, director of financial compliance, explained that the proposed repeal reflects changes implemented by House Bill (HB) 3, 86th Texas Legislature, 2019.

MOTION AND VOTE: *It was moved by Mr. Mercer, seconded by Ms. Hardy, and carried unanimously to recommend that the State Board of Education approve for first reading and filing authorization the proposed repeal of 19 TAC Chapter 105, Foundation School Program, Subchapter B, Use of State Funds.*

DISCUSSION ITEM

- 2. Discussion of Proposed Amendment to 19 TAC Chapter 109, Budgeting, Accounting, and Auditing, Subchapter B, Texas Education Agency Audit Functions, §109.23, School District Independent Audits and Agreed-Upon Procedures**
(Board agenda page III-5)

Mr. Marx explained that the item proposes for discussion an amendment to eliminate the requirement for out-of-state certified public accountancy firms to be licensed in Texas, reflecting changes made by HB 1520, 86th Texas Legislature, 2019.

- 3. Review of Permanent School Fund Securities Transactions and the Investment Portfolio**
(Board agenda page III-8)

Catherine Civileto, deputy executive administrator, provided a summary on the status of the Permanent School Fund (PSF) portfolio. Reports presented to the committee were for the reporting period October and November 2019 unless otherwise noted. Ms. Civileto's report included the current fair market value of the Fund, the asset allocation mix as of November 30, 2019, PSF transactions occurring in the reporting period, revenues and expenditures for the fiscal period of September 1 to November 30, 2019, the activity in the securities lending program for the fiscal period beginning September 1, 2019 through August 31, 2020, the status of transfers from the General Land Office as of November 30, 2019, as per approved resolutions, current status of the Bond Guarantee Program and the available capacity in the program, broker commissions on both the internal and external equity portfolios for the period beginning January 1, 2019 through November 30, 2019, fixed income rating changes for the fiscal period September 1, 2019 through November 30, 2019, and short-term cash investments.

CONSENT ITEM

4. Ratification of the Purchases and Sales of the Investment Portfolio of the Permanent School Fund for the Months of October and November 2019

(Board agenda page III-9)

[Consent agenda item #(1)]

MOTION AND VOTE: *Based on the information provided by staff and the recommendation of the executive administrator and chief investment officer and the commissioner of education, the committee recommended by unanimous consent that the State Board of Education ratify the purchases and sales for the months of October and November 2019, in the amount of \$756,881,353 and \$783,201,264 respectively (Attachment A).*

DISCUSSION ITEMS

5. Annual Reporting Requirement of the Internally Managed Permanent School Fund Investment Portfolio

(Board agenda page III-10)

Holland Timmins, executive administrator and chief investment officer, provided the required attestation regarding compliance with 19 TAC Chapter 33 rules for the internally managed investment portfolios in the matters of permissible and restricted investments, trading and brokerage policy, and proxy voting policy.

6. Review of the Study of the Permanent School Fund Distributions as defined in House Bill 4388, 86th Legislature, 2019

(Board agenda page III-11)

Andrea Winkler, director of operational support, strategic initiatives division, provided an update on the study required by House Bill 4388. She reviewed the legislation requiring the Texas Education Agency to conduct a study on the distributions from the PSF and stated that the agency is seeking to issue a Request for Qualifications (RFQ) for an outside consultant to conduct the study.

7. Third Quarter 2019 Permanent School Fund Performance Report
(Board agenda page III-12)

Mike Maher, vice president of BNY Mellon Global and Risk Solutions, presented the third quarter of 2019 PSF performance report. Mr. Maher began with an overview of the U.S and foreign capital markets. He then reviewed the performance of the Fund for the third quarter of 2019. He stated that the PSF returned 0.62% net of fees for the third quarter underperforming the target benchmark by eight basis point. Mr. Maher attributed most of the underperformance to Emerging Market Debt and Risk Parity.

Mr. Maher reviewed the third quarter 2019 performance of the PSF by asset class, stating that the total domestic large cap equity composite outperformed its benchmark for the quarter by four basis points. Mr. Maher stated that Small/Midcap Equity portfolio outperformed its benchmark by nine basis points. He added that international equities returned 2.14% for the quarter, outperforming its benchmark by nine basis points for the period. The fixed income portfolio returned 2.28% for the quarter, outperforming its benchmark by one basis point. Mr. Maher stated that the Absolute Return composite returned -0.04% for the quarter, outperforming its benchmark, the HFRI Fund of Funds Composite Index, by 71 basis points. Mr. Maher added that the Real Estate composite returned 1.52% for the quarter, outperforming its benchmark by 10 basis points. Mr. Maher added that Total Risk Parity Strategies returned 1.43% in the third quarter of 2019, underperforming its benchmark by 53 basis points. He further stated that the Real Return Asset class returned -0.26% for the quarter, underperforming its benchmark by four basis points. He added that Emerging Market Debt returned -1.90% for the quarter, underperforming its benchmark by 111 basis points. Mr. Maher stated that private equity returned 3.37% for the quarter, underperforming its benchmark by two basis points. Finally, he stated that the total emerging market equity composite returned -4.29% for the third quarter 2019, beating its benchmark by four basis points.

ACTION ITEM

8. Proposed Amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules

(Second Reading and Final Adoption)

(Board agenda page III-13)

[Official agenda item #17]

Carlos Veintemillas, deputy chief investment officer and director of fixed income, stated the proposed amendments would reorganize references to the PSF distribution policy, include references to new authority and duties assigned to the SBOE by the 86th Texas Legislature, 2019, and address permissible investments.

MOTION AND VOTE: *By unanimous consent, the committee recommended that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules; and*

Make an affirmative finding that immediate adoption of proposed amendments to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register.

DISCUSSION ITEMS

9. Discussion of Proposed Amendment to 19 TAC Chapter 33, Statement of Investment Objectives, Policies, and Guidelines of the Texas Permanent School Fund, Subchapter A, State Board of Education Rules, §33.25, Permissible and Restricted Investments and General Guidelines for Investment Managers

(Board agenda page III-31)

Mr. Veintemillas provided the committee information related to non-investment grade fixed-income bonds.

10. Review of the Private Equity Asset Class for the Permanent School Fund

(Board agenda page III-32)

The PSF private equity consultant, Neuberger Berman, was represented by Brien Smith, chief operating officer and managing director, and Kaci Boyer, senior vice president. PSF staff was represented by John Grubenman, director of private markets, and Erin Wedepohl, portfolio manager. Mr. Smith, Ms. Boyer, Mr. Grubenman and Ms. Wedepohl provided an update on the performance and progress of the PSF private equity program.

11. Report of the Permanent School Fund Administrator and Chief Investment Officer
(Board agenda page III-33)

Mr. Timmins informed the committee that Fitch Ratings has affirmed its 'AAA' rating of the Texas PSF's bond guarantee program. He updated the committee on the RFQ for legal counsel, PSF intern process, the PSF annual report and the quarterly report to the School Land Board.

The meeting of the Committee on School Finance/Permanent School

**TEXAS PERMANENT SCHOOL FUND
SUMMARY OF TRANSACTIONS FOR APPROVAL
(Including External Manager's Trades)
For October 1, 2019 through November 30, 2019**

Purchases/Capital Calls:

Long Term Fixed Income	\$ 232,973,579
Public Market Equities	202,966,460
Alternative Investments	<u>320,941,314</u>
TOTAL	<u>\$ 756,881,353</u>

Sales/Distributions:

Long Term Fixed Income	\$ 325,099,633
Public Market Equities	272,530,215
Alternative Investments	<u>185,571,416</u>
TOTAL	<u>\$ 783,201,264</u>

General Land Office Contributions:

FY 2019 Cumulative November 2018	FY 2020 Cumulative November 2019
\$63,750,000	\$2,500,000

Based on the above information provided by staff including a report that deposits to the Permanent School Fund from the General Land Office were \$63,750,000 through November 2018 for fiscal year 2019 versus \$2,500,000 through November 2019 for fiscal year 2020, and the recommendation of the Executive Administrator and Chief Investment Officer and the Commissioner of Education; it is moved by unanimous consent that the Committee on School Finance/Permanent School Fund ratify for the months of October 2019 and November 2019 Permanent School Fund portfolio purchases of \$756,881,353 and sales of \$783,201,264.

**Report of the State Board of Education
Committee on School Initiatives
January 30, 2020**

The State Board of Education Committee on School Initiatives met at 9:02 a.m. on Thursday, January 30, 2020, in Room #1-111 of the William B. Travis Building, 1701 N. Congress Avenue, Austin, Texas. Attendance was noted as follows:

Present: Barbara Cargill, chair; Marisa B. Perez-Diaz, vice chair; Keven Ellis; Matt Robinson

Absent: Ruben Cortez, Jr.

Non-Committee Members Present: Georgina C. Pérez

Public Testimony

The Committee on School Initiatives heard public testimony on agenda items #3 and #4. Information regarding the individuals who presented public testimony is included in the discussion of that item.

CONSENT ITEMS

- 1. Recommendation for Appointments to the Boys Ranch Independent School District Board of Trustees**
(Board agenda page IV-1)
[Consent agenda item #(2)]

Jason Hewitt, associate commissioner, governance, explained that there are two existing vacancies on the board of trustees of the Boys Ranch Independent School District. The vacancies are due to the expiration of the terms of Mr. George Owen and Mr. Mark Strother. The Boys Ranch CEO has requested that Mr. George Owen and Mr. Mark Strother be reappointed to fill the vacancies.

MOTION AND VOTE: *It was moved by Ms. Perez-Diaz, seconded by Dr. Ellis, and carried unanimously to recommend that the State Board of Education approve the reappointments of Mr. George Owen and Mr. Mark Strother to serve a two-year term of office, from January 31, 2020 to January 31, 2022, on the Boys Ranch Independent School District Board of Trustees.*

2. Recommendation for Appointments to the Randolph Field Independent School District Board of Trustees

(Board agenda page IV-27)
[Consent agenda item #(3)]

Mr. Hewitt explained that there are three existing vacancies on the board of trustees of the Randolph Field Independent School District due to the expiration of the terms of Ms. Vanessa Bowden, Mr. Jimmy Cornelius, and Mr. William Morrison. Colonel Jeffrey Carter has provided three nominees for the vacancies and has recommended the reappointment of Ms. Vanessa Bowden, Mr. Jimmy Cornelius, and Mr. William Morrison.

MOTION AND VOTE: *It was moved by Ms. Perez-Diaz, seconded by Dr. Ellis, and carried unanimously to recommend that the State Board of Education approve the reappointment of Ms. Vanessa Bowden, Mr. Jimmy Cornelius, and Mr. William Morrison to serve a term of office, from January 31, 2020 to January 31, 2022, on the Randolph Field Independent School District Board of Trustees.*

ACTION ITEM

3. Proposed Amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship (Second Reading and Final Adoption)

(Board agenda page IV-78)
[Official agenda item #18]

Public testimony was provided by the following individuals:

NAME: Karen Marcucci
AFFILIATION: Self

NAME: Phil Gore
AFFILIATION: Texas Association of School Boards

NAME: Susan Whisenant
AFFILIATION: Texas Association of School Boards

Drew Howard, senior director, board support, introduced the item.

MOTION: *It was moved by Ms. Perez-Diaz and seconded by Dr. Ellis to recommend that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship; and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register.

MOTION AND VOTE: *It was moved by Dr. Ellis and seconded by Ms. Perez-Diaz to recommend that the State Board of Education amend proposed new §61.1(b)(4)(F) to read as follows:*

“The team-building session shall be provided by an ESC or a registered provider as described in subsection (c) of this section.”

The motion failed.

MOTION AND VOTE: *It was moved by Ms. Perez-Diaz and seconded by Dr. Ellis to substitute the text of 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship, originally provided to the committee with the text provided by staff at the meeting.*

The motion passed unanimously.

MOTION AND VOTE: *It was moved by Ms. Perez-Diaz, seconded by Dr. Ellis, and carried to recommend that the State Board of Education approve for second reading and final adoption proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship; as substituted (Attachment A), and*

Make an affirmative finding that immediate adoption of the proposed amendments to 19 TAC Chapter 61, School Districts, Subchapter A, Board of Trustees Relationship, is necessary and shall have an effective date of 20 days after filing as adopted with the Texas Register.

DISCUSSION ITEMS

4. Open-Enrollment Charter School Updates on the Generation 25 and Generation 26 Applications (Board agenda page IV-90)

Public testimony was provided by the following individuals:

NAME: MerryLynn Gerstenschlager
AFFILIATION: Self

NAME: Carrie Griffith
AFFILIATION: Texas State Teachers Association

NAME: Peyton Wolcott
AFFILIATION: Self

NAME: Ellen Williams
AFFILIATION: Texas Association of School Administrators and Texas Association of School Boards

NAME: Patty Quinzi
AFFILIATION: Self

Heather Mauzé, director, charter school administration, provided an update on the Generation 25 application process and timeline. In addition, she discussed the process and timeline related to the Generation 26 application.

5. **Statutorily-Required Rule Review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters**
(Board agenda page IV-92)

Ms. Mauzé presented the review of 19 TAC Chapter 100, Charters, Subchapter A, Open-Enrollment Charter Schools, and Subchapter B, Home-Rule School District Charters, for discussion pursuant to Texas Government Code, §2001.039, which establishes a four-year rule review cycle for all state agency rules, including State Board of Education (SBOE) rules.

ACTION ITEM

6. **Review of Proposed Amendments to 19 TAC Chapter 249, Disciplinary Proceedings, Sanctions, and Contested Cases, Subchapter B, Enforcement Actions and Guidelines**
(Board agenda page IV-96)
[Official agenda item #19]

Laura Moriaty, director, SBEC enforcement, explained that the proposed amendments would implement House Bill 3, Senate Bills 1230, 1476, and 37, 86th Texas Legislature, 2019, by reflecting new reporting requirements for superintendents, principals, and directors of public schools and private school administrative officers; adding individuals listed on the registry of persons ineligible to work in public schools to the people who must be fired or refused employment by a certified educator; and removing the reference to student loan default as a ground for discipline by the SBEC. The proposed amendments would also make technical changes to improve the readability of provisions and to align citations.

MOTION AND VOTE: *It was moved by Ms. Perez-Diaz, seconded by Dr. Ellis, and carried unanimously to recommend that the State Board of Education take no action on the proposed amendments to 19 TAC Chapter 249, Disciplinary Proceedings, Sanctions, and Contested Cases, Subchapter B, Enforcement Actions and Guidelines.*

The meeting of the Committee on School Initiatives adjourned at 11:32 a.m.

SUBSTITUTE TEXT

ATTACHMENT
Text of Proposed Amendments to 19 TAC

Chapter 61. School Districts

Subchapter A. Board of Trustees Relationship

§61.1. Continuing Education for School Board Members.

- (a) Under the Texas Education Code (TEC), §11.159, the State Board of Education (SBOE) shall adopt a framework for governance leadership to be used in structuring continuing education for school board members. The framework shall be posted to the Texas Education Agency (TEA) website and shall be distributed annually by the president of each board of trustees to all current board members and the superintendent.
- (b) The continuing education required under the TEC, §11.159, applies to each member of an independent school district board of trustees. ~~[The continuing education requirement consists of orientation sessions, an annual team building session with the local board and the superintendent, and specified hours of continuing education based on identified needs. The superintendent's participation in team building sessions as part of the continuing education for board members shall represent one component of the superintendent's ongoing professional development.]~~
- (1) Each school board member of an independent school district shall complete ~~[receive]~~ a local district orientation ~~[and an orientation to the TEC]~~ .
- (A) The purpose of the local orientation is to familiarize new board members with local board policies and procedures and district goals and priorities.
- (B) A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.
- (C) The orientation shall be at least three hours in length.
- (D) The orientation shall address local district practices in the following, in addition to topics chosen by the local district:
- (i) curriculum and instruction;
- (ii) business and finance operations;
- (iii) district operations;
- (iv) superintendent evaluation; and
- (v) board member roles and responsibilities.
- (E) Each board member should be made aware of the continuing education requirements of this section and those of the following:
- (i) open meetings act in Texas Government Code, §551.005;
- (ii) public information act in Texas Government Code, §552.012; and
- (iii) cybersecurity in Texas Government Code, §2054.5191.
- (F) The orientation shall be open to any board member who chooses to attend.
- ~~[(A) Each new board member shall participate in a local district orientation session within one year before or 120 days after the board member's election or appointment. The purpose of the local orientation is to familiarize new board members with local board policies and procedures and district goals and priorities. The local district orientation shall be at least three hours in length for each new board member. Any sitting board member may attend~~

SUBSTITUTE TEXT

~~or participate in the local district orientation. The local district orientation shall address local district practices in the following, in addition to topics chosen by the local district:~~

~~[(i) — curriculum and instruction;]~~

~~[(ii) — business and finance operations;]~~

~~[(iii) — district operations;]~~

~~[(iv) — superintendent evaluation; and]~~

~~[(v) — board member roles and responsibilities.]~~

~~[(B) — A sitting board member shall receive a basic orientation to the TEC and relevant legal obligations. The orientation shall have special but not exclusive emphasis on statutory provisions related to governing Texas school districts. The orientation shall be delivered by regional education service centers (ESCs) and shall be no less than three hours in length. Topics shall include, but not be limited to, the TEC, Chapter 26 (Parental Rights and Responsibilities), and the TEC, §28.004 (Local School Health Advisory Council and Health Education Instruction). A newly elected or appointed board member of an independent school district shall receive the orientation to the TEC within the first 120 days of service. The orientation to the TEC shall be open to any sitting board member who chooses to attend.]~~

~~[(C) — After each session of the Texas Legislature, including each regular session and called session related to education, each school board member shall receive an update from an ESC or any registered provider to the basic orientation to the TEC. The update session shall be of sufficient length to familiarize board members with major changes in the code and other relevant legal developments related to school governance. A board member who has attended an ESC basic orientation session that incorporates the most recent legislative changes is not required to attend an update.]~~

~~(2) Each school board member of an independent school district shall complete a basic orientation to the TEC and relevant legal obligations.~~

~~(A) The orientation shall have special, but not exclusive, emphasis on statutory provisions related to governing Texas school districts.~~

~~(B) A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.~~

~~(C) The orientation shall be at least three hours in length.~~

~~(D) Topics shall include, but not be limited to, the TEC, Chapter 26 (Parental Rights and Responsibilities), and the TEC, §28.004 (Local School Health Advisory Council and Health Education Instruction).~~

~~(E) The orientation shall be provided by a regional education service center (ESC).~~

~~(F) The orientation shall be open to any board member who chooses to attend.~~

~~(G) The continuing education may be fulfilled through online instruction, provided that the training incorporates interactive activities that assess learning and provide feedback to the learner and offers an opportunity for interaction with the instructor.~~

~~(H) The ESC shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.~~

~~(3) After each session of the Texas Legislature, including each regular session and called session related to education, each school board member shall complete an update to the basic orientation to the TEC.~~

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- (A) The update session shall be of sufficient length to familiarize board members with major changes in statute and other relevant legal developments related to school governance.
 - (B) The update shall be provided by an ESC or a registered provider, as defined by subsection (c) of this section.
 - (C) A board member who has attended an ESC basic orientation session described in paragraph (2) of this subsection that incorporated the most recent legislative changes is not required to attend an update.
 - (D) The continuing education may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
 - (E) The ESC or registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (4) The entire board shall participate with their superintendent in a team-building session.
- (A) The purpose of the team-building session is to enhance the effectiveness of the board-superintendent team and to assess the continuing education needs of the board-superintendent team.
 - (B) The session shall be held annually.
 - (C) The session shall be at least three hours in length.
 - (D) The session shall include a review of the roles, rights, and responsibilities of a local board as outlined in the framework for governance leadership described in subsection (a) of this section.
 - (E) The assessment of needs shall be based on the framework for governance leadership described in subsection (a) of this section and shall be used to plan continuing education activities for the year for the governance leadership team.
 - (F) The team-building session shall be provided by an authorized provider as described in subsection (d) of this section.
 - (G) The superintendent's participation in team-building sessions as part of the continuing education for board members shall represent one component of the superintendent's ongoing professional development.
- ~~[(2) The entire board, including all board members, shall annually participate with their superintendent in a team building session facilitated by the ESC or any registered provider. The team building session shall be at least three hours in length. The purpose of the team building session is to enhance the effectiveness of the board-superintendent team and to assess the continuing education needs of the board-superintendent team. The session shall include a review of the roles, rights, and responsibilities of a local board as outlined in the framework for governance leadership. The assessment of needs shall be based on the framework for governance leadership and shall be used to plan continuing education activities for the year for the governance leadership team.]~~
- (5) [(3)] In addition to the continuing education requirements in paragraphs (1) through (4) [and (2)] of this subsection, each board member shall complete [receive] additional continuing education [on an annual basis in fulfillment of assessed needs and] based on the framework for governance leadership described in subsection (a) of this section . [The continuing education sessions may be provided by ESCs or other registered providers.]
- (A) The purpose of continuing education is to address the continuing education needs referenced in paragraph (4) of this subsection.
 - (B) The continuing education shall be completed annually.

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- (C) ~~(A)~~ In a board member's first year of service, he or she shall complete ~~[receive]~~ at least ten hours of continuing education in fulfillment of assessed needs. ~~[Up to five of the required ten hours may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor. The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (g) of this section.]~~
- (D) ~~(B)~~ Following a board member's first year of service, he or she shall complete ~~[receive]~~ at least five hours of continuing education annually in fulfillment of assessed needs. ~~[A board member may fulfill the five hours of continuing education through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor. The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (g) of this section.]~~
- (E) ~~(C)~~ A board president shall complete ~~[receive]~~ continuing education related to leadership duties of a board president as some portion of the annual requirement.
- (F) At least 50% of the continuing education shall be designed and delivered by persons not employed or affiliated with the board member's local school district. No more than one hour of the required continuing education that is delivered by the local district may utilize self-instructional materials.
- (G) The continuing education shall be provided by an ESC or a registered provider, as defined by subsection (c) of this section.
- (H) The continuing education may be fulfilled through online instruction, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
- (I) The ESC or registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (6) ~~(4)~~ Each school board member shall complete continuing education ~~[every two years]~~ on evaluating student academic performance and setting individual campus goals for early childhood literacy and mathematics and college, career, and military readiness .
- (A) The purpose of the training on evaluating student academic performance is to provide research-based information to board members that is designed to support the oversight role of the board of trustees outlined in the TEC, §11.1515.
- (B) The purpose of the continuing education on setting individual campus goals for early childhood literacy and mathematics and college, career, and military readiness is to facilitate boards meeting the requirements of TEC, §11.185 and §11.186.
- (C) ~~(B)~~ A candidate for school board may complete the training up to one year before he or she ~~[the candidate]~~ is elected or appointed . A ~~[If a]~~ newly elected or appointed school board member who did not complete this training in the year preceding his or her ~~[the member's]~~ election or appointment ~~[, the member]~~ must complete the training within 120 calendar days after election or appointment. ~~[A returning board member shall complete the training by the second anniversary of the completion of the trustee's previous training.]~~
- (D) The continuing education shall be completed every two years.

SUBSTITUTE TEXT

- ~~(C) — An authorized provider for training on evaluating student academic performance is a provider who is registered pursuant to subsection (f) of this section and has demonstrated proficiency in the content required by subsection (b)(4)(E) of this section. Proficiency may be demonstrated by completing a TEA approved train the trainer course and evaluation on the topic, by being certified as a Lone Star Governance coach, through a review of the provider's qualifications and course design, or through other means as determined by the commissioner of education.~~
- (E) ~~(D)~~ The training ~~[on evaluating student academic performance]~~ shall be at least three hours in length.
- (F) ~~(E)~~ The continuing education ~~[training]~~ required by this subsection shall include, at a minimum ~~[, the following]~~ :
- (i) instruction in school board behaviors correlated with ~~[to]~~ improved student outcomes with emphasis on : ~~[inputs, outcomes, and collaborative student outcome goal setting:]~~
 - (I) ~~setting specific, quantifiable student outcome goals; and~~
 - (II) ~~adopting plans to improve early literacy and numeracy and college, career, and military readiness for applicable student groups evaluated in the Closing the Gaps domain of the state accountability system established under TEC, Chapter 39;~~
 - (ii) instruction in progress monitoring ~~practices~~ to improve student outcomes ~~[with emphasis on progress monitoring practices, formative assessments, interim assessments, and summative assessments]~~ ; and
 - (iii) instruction in state accountability with emphasis on the Texas Essential Knowledge and Skills, state assessment instruments administered under the TEC, Chapter 39, and the state accountability ~~[rating]~~ system ~~established under the TEC, Chapter 39~~ .
- (G) ~~The continuing education shall be provided by an authorized provider as defined by subsection (d) of this section.~~
- (H) ~~(F)~~ If the training is attended by an entire school board and its superintendent, includes a review of local school district data on student achievement, and otherwise meets the requirements of subsection (b)(4) ~~[(b)(2)]~~ of this section, the training may serve to meet a school board member's obligation to ~~complete~~ ~~[receive]~~ training under subsection (b)(4) and (6) ~~[(b)(2) and (4)]~~ of this section, as long as the training complies with the Texas Open Meetings Act.
- (7) ~~Each board member shall complete continuing education on identifying and reporting potential victims of sexual abuse, human trafficking, and other maltreatment of children in accordance with TEC, §11.159(c)(2).~~
- (A) ~~A candidate for school board may complete the training up to one year before he or she is elected or appointed. A newly elected or appointed school board member who did not complete this training in the year preceding his or her election or appointment must complete the training within 120 calendar days after election or appointment.~~
 - (B) ~~The training shall be completed every two years.~~
 - (C) ~~The training shall be at least one hour in length.~~
 - (D) ~~The training must familiarize board members with the requirements of TEC, §38.004 and §38.0041, and §61.1051 of this title (relating to Reporting Child Abuse or Neglect, Including Trafficking of a Child).~~
 - (E) ~~The training required by this subsection shall include, at a minimum:~~

SUBSTITUTE TEXT

- (i) instruction in best practices of identifying potential victims of child abuse, human trafficking, and other maltreatment of children;
 - (ii) instruction in legal requirements to report potential victims of child abuse, human trafficking, and other maltreatment of children; and
 - (iii) instruction in resources and organizations that help support victims and prevent child abuse, human trafficking, and other maltreatment of children.
 - (F) The training sessions shall be provided by a registered provider as defined by subsection (c) of this section.
 - (G) This training may be completed online, provided that the training is designed and offered by a registered provider, incorporates interactive activities that assess learning and provide feedback to the learner, and offers an opportunity for interaction with the instructor.
 - (H) The registered provider shall determine the clock hours of training credit to be awarded for successful completion of an online course and shall provide verification of completion as required in subsection (h) of this section.
- (c) For the purposes of this section, a registered provider has demonstrated proficiency in the content required for a specific training. A private or professional organization, school district, government agency, college/university, or private consultant shall register with the TEA to provide the board member continuing education required in subsection (b)(3), (5), and (7) of this section.
- (1) The registration process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.
 - (2) An updated registration shall be required of a provider of continuing education every three years.
 - (3) A school district that provides continuing education exclusively for its own board members is not required to register.
 - (4) An ESC is not required to register under this subsection.
- (d) An authorized provider meets all the requirements of a registered provider and has demonstrated proficiency in the content required in subsection (b)(4) and (6) of this section. Proficiency may be demonstrated by completing a TEA-approved train-the-trainer course that includes evaluation on the topics and following a review of the provider's qualifications and course design, or through other means as determined by the commissioner.
- (1) A private or professional organization, school district, government agency, college/university, or private consultant may be authorized by TEA to provide the board member training required in subsection (b)(4) and (6) of this section.
 - (2) An ESC shall be authorized by TEA to provide the board member training required in subsection (b)(4) and (6) of this section.
 - (3) The authorization process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.
 - (4) An updated authorization shall be required of a provider of training every three years.
- (e) ~~(e)~~ No continuing education shall take place during a school board meeting unless that meeting is called expressly for the delivery of board member continuing education. However, continuing education may take place prior to or after a legally called board meeting in accordance with the provisions of the Texas Government Code, §551.001(4).
- (f) ~~(d)~~ An ESC board member continuing education program shall be open to any interested person, including a current or prospective board member. A district is not responsible for any costs associated with individuals who are not current board members.

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- (g) ~~(e)~~ A registration fee shall be determined by ESCs to cover the costs of providing continuing education programs offered by ESCs.
- ~~[(f) — A private or professional organization, school district, government agency, college/university, or private consultant shall register with the TEA to provide the board member continuing education required in subsection (b)(1)(C) and (2)-(4) of this section.]~~
- ~~[(1) — The registration process shall include documentation of the provider's training and/or expertise in the activities and areas covered in the framework for governance leadership.]~~
- ~~[(2) — An updated registration shall be required of a provider of continuing education every three years.]~~
- ~~[(3) — A school district that provides continuing education exclusively for its own board members is not required to register.]~~
- ~~[(4) — An ESC is not required to register under this subsection.]~~
- (h) ~~(g)~~ For each training described in this section, the ~~[The]~~ provider of continuing education shall provide verification of completion of board member continuing education to the individual participant and to the participant's school district. The verification must include the provider's authorization or registration number.
- ~~[(h) — At least 50% of the continuing education required in subsection (b)(3) of this section shall be designed and delivered by persons not employed or affiliated with the board member's local school district. No more than one hour of the required continuing education that is delivered by the local district may utilize self-instructional materials.]~~
- (i) To the extent possible, the entire board shall participate in continuing education programs together.
- (j) At the last regular meeting of the board of trustees before an election of trustees, the current president of each local board of trustees shall announce the name of each board member who has completed the required continuing education, who has exceeded the required hours of continuing education, and who is deficient in meeting the required continuing education as of the anniversary of the date of each board member's election or appointment to the board or two-year anniversary of his or her previous training, as applicable . The announcement shall state that completing the required continuing education is a basic obligation and expectation of any sitting board member under SBOE rule. The minutes of the last regular board meeting before an election of trustees must reflect whether each trustee has met or is deficient in meeting the training required for the trustee as of the first anniversary of the date of the trustee's election or appointment or two-year anniversary of his or her previous training, as applicable . The president shall cause the minutes of the local board to reflect the announcement and, if the minutes reflect that a trustee is deficient in training as of the anniversary of his or her joining the board, the district shall post the minutes on the district's Internet website within 10 business days of the meeting and maintain the posting until the trustee meets the requirements.
- (k) Annually, the SBOE shall commend those local board-superintendent teams that complete [receive] at least eight hours of the continuing education specified in subsection (b)(4) and (5) [(b)(2) and (3)] of this section as an entire board-superintendent team.
- (l) Annually, the SBOE shall commend local board-superintendent teams that effectively implement the commissioner's trustee improvement and evaluation tool developed under the TEC, §11.182, or any other tool approved by the commissioner.

§61.2. Nomination of Trustees for Military Reservation School Districts and Boys Ranch Independent School District.

- (a) In nominating trustee candidates for military reservation school districts, the commanding officer of the military reservation shall do the following:
- (1) submit a list to the commissioner of education with at least one nominee [three nominees] for each vacancy. A majority of the trustees appointed to the school board must be civilian, and all may be civilian. When two or more vacancies occur simultaneously, a list of at least one nominee [three different nominees] for each vacancy shall be submitted. In cases when the commanding officer

SUBSTITUTE TEXT

wishes to reappoint existing board members, a list of at least one nominee ~~[three nominees]~~ for each vacancy must still be submitted. Nominees not selected for existing vacancies may be resubmitted as candidates for subsequent vacancies. The commanding officer may rank in the order of preference the nominees submitted for each vacancy;

- (2) submit a statement that verifies that each of the nominees is qualified under the general school laws of Texas and lives or is employed on the military reservation;
 - (3) submit a copy of a current biographical vita (resume) for each nominee ~~[of the nominees]~~, with a signature by the nominee attesting truth to the contents of the biographical vita;
 - (4) submit a statement from each nominee ~~that [of the nominees which]~~ expresses the nominee's willingness to accept appointment and to serve in such a capacity with full adherence to the state-established standards on the duties and responsibilities of school board members;
 - (5) submit a signed statement that ~~[which]~~ expresses recognition of the powers of the board of trustees to govern and manage the operations of the military reservation school districts;
 - (6) submit a signed statement regarding the governance and management operations of the district that ~~[which]~~ expresses recognition that the role of the commanding officer of the military reservation is limited only to the duty defined by statute in the process for appointing members of the board of trustees; and
 - (7) submit a statement that the membership composition of the entire board of trustees is in full compliance with the provisions of the Texas Education Code (TEC), §11.352.
- (b) In nominating trustee candidates for the Boys Ranch Independent School District (ISD), the president and chief executive officer of the Cal Farley's Boys Ranch shall do the following:
- (1) submit a name to the commissioner for each vacancy. When two or more vacancies occur simultaneously, a name for each vacancy shall be submitted. In cases when the president and chief executive officer wishes to reappoint existing board members, the name of the existing board member for each vacancy must still be submitted;
 - (2) submit a statement that verifies that each of the nominees is qualified under the general school laws of Texas;
 - (3) submit a copy of a current biographical vita (resume) for each of the nominees, with a signature by the nominee attesting truth to the contents of the biographical vita;
 - (4) submit a statement from each of the nominees that ~~[which]~~ expresses the nominee's willingness to accept appointment and to serve in such a capacity with full adherence to the state-established standards on the duties and responsibilities of school board members;
 - (5) submit a signed statement that ~~[which]~~ expresses recognition of the powers of the board of trustees to govern and manage the operations of the Boys Ranch ISD;
 - (6) submit a signed statement regarding the governance and management operations of the district that ~~[which]~~ expresses recognition that the role of the superintendent is in full compliance with the provisions of the TEC, §11.201; and
 - (7) submit a statement that the membership composition of the entire board of trustees is in full compliance with the provisions of the TEC, §11.352.
- (c) A member of a board of trustees appointed under the TEC, §11.352, and this section will serve a term of two years. A member of the board of trustees, who during the period of the term of office resigns from office or experiences a change of status that disqualifies such member for appointment under the provisions of the TEC, shall become ineligible to serve at the time of the change of status. A board vacancy resulting from such resignation or disqualification shall be filled in accordance with the procedures established under the TEC, §11.352, and this section.