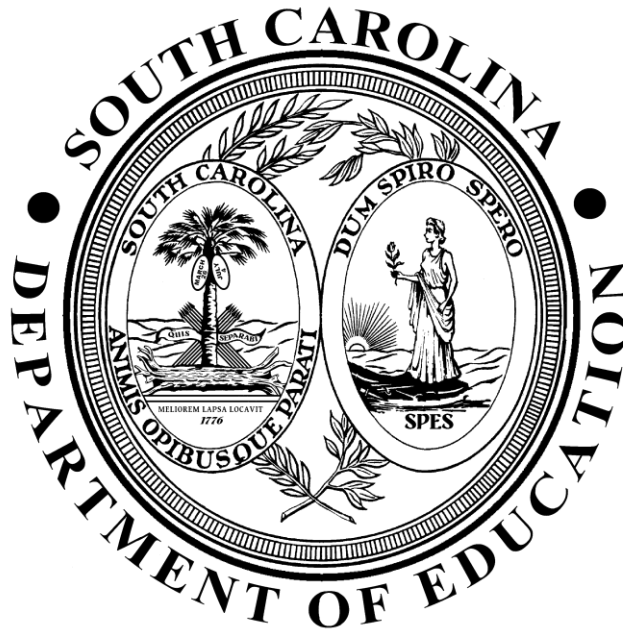


STATE OF SOUTH CAROLINA
DEPARTMENT OF EDUCATION

MOLLY M. SPEARMAN
STATE SUPERINTENDENT OF EDUCATION



2017-18 CATE Student Reporting Procedures Guide

Office of Career and Technology Education

October 2017
School Year 2017–18

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Preface

This student reporting procedures guide is the Office of Career and Technology Education's (OCTE) official guide for PowerSchool data entry and reporting. Data from schools are collected annually to meet state and federal requirements: the career center report card performance measures and high school report card career and technology education (CATE) student performance indicators under the South Carolina Education Accountability Act of 1998 and the eight core indicators of performance under the Carl D. Perkins Career and Technical Education Act of 2006 (Perkins IV).

It is critical that data reported to the South Carolina Department of Education (SCDE) be complete and accurate. State and school district funding are affected by the data submitted. School districts, high schools, and career centers must collaborate and communicate to review data at the local level before submitting data to the SCDE. Your efforts in ensuring that your school's and district's data are of the highest quality possible are appreciated.

CATE Data Reporting Deadlines

**Student Placement Follow-up Report
April 16, 2018**

**End-of-the-Year Report
Fourth Quarterly Data Collection (QDC 4)**

NOTICE

The activity/course codes specified in this document are also listed in two other SCDE documents related to course sequencing and educator credentials: *South Carolina Department of Education Activity Coding System for the Student Information System* and *Required Credentials for Professional Staff Members in the Instructional Programs of South Carolina's Public Schools*. Therefore, when course titles change, titles/codes are deactivated, or new titles/codes are created, those changes will be made not only in this document but in these two other SCDE documents as well.

This document is also available online at: <http://ed.sc.gov/instruction/career-and-technology-education/performance-accountability/cate-data-collection-and-reporting>.

Audience

The intended audience for CATE training includes career center, school, and district staff responsible for entering, correcting, and assuring accuracy of the CATE data.

Accessing the PowerSchool CATE Page

In this section you will learn how to navigate to the State/Province – SC page in PowerSchool, select CATE, and enter the appropriate data.

1. Begin this task by logging into PowerSchool. Once on the PowerSchool home page, select one or more students.
2. Click on State/Province – SC in the student menu to retrieve links to the SC PowerSchool pages; then click on the CATE link.
3. The OCTE requires that you populate the following fields on the CATE custom page:

The screenshot shows the 'SC Career & Technology Education Data Entry' form. At the top, it displays the user 'Tetterly, Anna P' with ID '10 987654321012' and the school 'THS1'. Below this is a navigation bar with tabs: 'Contacts', 'Chronic Absenteeism', 'CATE' (selected), 'Early Childhood', 'SC Student Information', 'Precode', 'Students Not Tested', 'Transport', and 'Work-Based Learning'. The form is divided into several sections. The first section contains dropdown menus for 'Single Parent', 'Displaced Homemaker', 'Exceptions', and 'Diploma Earned'. The second section has dropdowns for 'CATE Concentrator', 'CIP Code', 'Custom/Cross-Cluster CIP Code (Approval Required)', 'Completer', and 'Completion Year'. The third section is a table with 10 rows for 'Certification 1' through 'Certification 10'. Each row has four dropdown menus: 'Certification Administered', 'Certification Administered', 'Certification Passed', and 'Certification Year'. Below this table are two dropdowns for 'CTSO Membership 1' and 'CTSO Membership 2'. The final section contains text input fields for 'CATE Placement Code', 'Placement Employer', 'Placement Phone', 'Placement Job Title', 'Placement Supervisor Name', 'Placement Start Date', 'Placement Higher Ed Name', 'Placement Higher Ed Program', 'Placement Military Branch', and 'Placement Military Training'. A 'Submit' button is located at the bottom right of the form.

Field Descriptions

Single Parent

The term “single parent” refers to a student: either a pregnant female student who is unmarried or a male or female student who is unmarried or legally separated from a spouse and has a minor child or children of whom he or she has either full custody or joint custody.

- ▶ **Data Entry** (dropdown box)

Blank = [default]

Y = Yes

N = No

Displaced Homemaker

The term “displaced homemaker” refers to an individual who has worked primarily without remuneration to care for a home and family and for that reason has diminished marketable skills, who has been dependent on the income of another family member but is no longer supported by that income, or who is a parent whose youngest dependent child will become ineligible to receive assistance under Part A of Title IV of the Social Security Act within two years after the date on which the parent applies for assistance under this title and who is unemployed or underemployed and is experiencing difficulty in obtaining or upgrading employment.

- ▶ **Data Entry** (dropdown box)

Blank = [default]

Y = Yes

N = No

Exceptions

Data are to be entered on an annual basis for all students for Perkins accountability indicators and report card measures.

Enter **I** if the student has an Individualized Education Program (IEP) indicating:

1. The student will **not** complete the requirements needed to obtain a South Carolina High School Diploma.

and/or

2. All of the core standards for a specified CATE course/program will **not** be taught (i.e., mastery of only a portion of the core standards in a program is appropriate for the student).

Use the exception code **I** *exclusively* for students whose IEPs indicate one or both of the above conditions. Many students with IEPs **do** receive the instruction necessary to complete the core CATE course standards and the requirements for a South Carolina High School Diploma, and these students **should not be coded as I**.

Enter **W** if the student withdrew from the CATE program or from the school during the school year.

► **Data Entry** (dropdown box)

Blank = [default]

I = IEP

W = Withdrawn

Diploma Earned (View Only)

Data should be entered in this field for **all** twelfth-grade students to indicate whether each student met the criteria for receiving a South Carolina High School Diploma or district non-diploma award. Data entry into this field can only be made on the South Carolina Student Information page in PowerSchool (State/Province – SC page). Once the field has been populated on the South Carolina Student Information page, the code selected is automatically populated for the field on the CATE page in “View Only” mode.

The data for each student will be used to assess the school’s and district’s performance for the Perkins accountability indicators and the career center report card measure for high school graduation.

► **Data Entry** (dropdown box)

Blank = [default]

F – State of SC Diploma

H – State of SC Certificate*

N – District non-diploma document

Z – SC High School Diploma – Adult Ed

X – Did not meet requirements to graduate

* The H code will remain visible (grayed out) in the dropdown for historical reference for students who received state certificates prior to 2014-15.

South Carolina Student Information

Hastly, Victoria Marie 12 640341001189 A THS State ID: 6713253032 Entry Date: 08/18/2015 Homeroom: Robinson, Crystal

Contacts CATE Early Childhood **SC Student Information** Precode Students Not Tested Transport Work-Based Learning

English Prof 9 - English Speaker II Primary Language (blank) - English

Birth Country Select One Language for Oral Communication (blank) - English

U.S. School Entry Date MM/DD/YYYY Language for Written Communication (blank) - English

1st Lang Spoken (blank) - English Home Lang (blank) - English

Birth Place

Instructional Setting (blank) - Regular Ed - Full Yr True Grade (blank) - Select One

Medicaid No Medicaid Consent Date MM/DD/YYYY 504 Plan

Comprehensive Health PE Compliance

Ninth Grade Code 13 - 2012-2013 Diploma Type (for Transcript) N - District Award Document

Diploma Ordered Award Ordered

Diploma Earned Award Earned

Diploma Order Number Scholarship Ordered

Graduation Date MM/DD/YYYY Graduated School Number and Name 0 -

Note: For any twelfth-grade student whose Diploma Earned field is left blank and who meets all graduation requirements during the summer and receives a South Carolina High School Diploma prior to the next school year, the school administrator may change the entry code to the appropriate code of F – State of SC Diploma and send a notification letter to the Office of Career and Technology Education by September 1. The notification should include the student’s name, State ID, and a request to update the Diploma Earned field.

CATE Concentrator

A **CATE Concentrator** is a secondary student with an assigned Classification of Instructional Programs (CIP) code who has earned 3 Carnegie units of credit in a state-recognized CATE program. A state-recognized CATE program must be composed of an approved sequence of career and technology education courses leading to a career goal and must include the minimum number of Carnegie units of credit required for the program.

- ▶ **Data Entry** (dropdown box)

- Blank = [default]

- Y = Yes

- N = No

CIP Code

The CIP codes designate the specific CATE programs and are used for federal reporting and for assessing the federal Perkins accountability indicators. Every student identified as a CATE Concentrator must be assigned a CIP code approved by the OCTE.

- ▶ **Data Entry** (dropdown box) : six-digit CIP code

Guidelines for assigning CIP Codes for CATE Concentrators

- ❖ **Only** assign a CIP code to designate the **state-recognized CATE program** in which a CATE Concentrator (defined above) earned *at least* 3 units. The local CATE program represented by the CIP code on the CATE page must offer a **sequence of approved courses** that provides the opportunity for students to complete the number of units required for the program. (See **CATE Clusters, Programs, and Courses** in Appendix C, pages 59-106.
- ❖ If a student is a CATE Concentrator in **two state-recognized CATE programs**, enter the CIP code/CATE program on the basis of the student’s post-graduation plans.
- ❖ **Do not** use the CIP Code field for any purpose other than to designate a state-recognized CATE program that offers students the approved sequence of CATE courses required to complete the number of units for the program.

Completer

A **Completer** is a CATE concentrator who has earned **all** of the required units in a state-recognized CATE program identified by the assigned CIP code.

- ▶ **Data Entry** (dropdown box)

Blank = [default]

Y = Yes

N = No

Note: A CATE concentrator pursuing a 3-unit CATE program would be designated a **Completer** when the 3rd unit is earned.

A CATE concentrator pursuing a CATE program offering 4 units would be designated a **Completer** when the 4th unit is earned.

A CATE concentrator pursuing a CATE program offering 8 units would be designated a **Completer** when the 8th unit is earned.

Completion Year

The **Completion Year** field will indicate the semester and the year in which the student completed the required units in a state-recognized CATE program. For school year 2017-18 the entry would be **FA17** if student completed in the fall of 2017 or **SP18** if the student completed in the spring of 2018.

- ▶ **Data Entry** (dropdown box): appropriate semester and year

Remote School Number

The **Remote School Number** field specifies the location where the CATE program is offered. An entry should be made in this field **only** if the program is offered at a location other than the student's high school. This entry will identify the other high school or the career center that offers the particular program.

- ▶ **Data Entry** (dropdown box): seven-digit school identification number (SIDN, sometimes referred to as the BEDS code)

Note: Leave this field blank if the program is offered at the student's home high school.

Example: Bethany Adams is a student at ABC High School (school SIDN – 0102003) and attends DEF Career and Technology Center (school SIDN – 0102995) where she is concentrating in the Culinary Arts program.

On the CATE Page the student would be designated as a **CATE Concentrator** and assigned the **CIP Code** 520905, the **Remote School Number** field would be an entry of 0102995.

Certification Administered 1 – Certification Administered 10

NEW

Certification 1 – Certification 10 (Deactivated)

The collection of certification data has changed for the 2017-18 school year. As a result, the **Certification** fields have been deactivated and will no longer be used to collect certification data. Certification data will now be collected using the **Certification Administered** and **Certification Passed** fields and up to 10 administrations can be entered for each student.

The new **Certification Administered** fields should be used to identify national and state certification and credential examinations administered to students regardless of the outcome (i.e., Passed or Failed). Multiple attempts of the same exam should be recorded in the **Certification Administered** fields. For example, if a student takes the ServSafe® Manager exam but does not pass and takes the exam a second time and passes the exam, data should be entered for both attempts.

- ▶ **Data Entry** (dropdown box): appropriate certification(s) administered for CATE students

Note: Perkins funds may not be used to pay for the American Red Cross-Babysitting and First Aid/CPR/AED exams.

Certification Passed 1 – Certification Passed 10

NEW

The **Certification Passed** fields indicate the passage of the respective certification administered.

- ▶ **Data Entry** (dropdown box)

Blank = [default]

Y = Yes

N = No

Certifications and Descriptions

Note: Web addresses are provided both for your information and for the documentation of much of the text that follows here. These URLs were operational as of the writing of this document. The South Carolina Department of Education is not responsible for changes made to Web addresses or content after this manual is published.

01 – CompTIA A+

CompTIA A+ is an international industry credential that validates the knowledge of computer service technicians. Earning CompTIA A+ certification proves that a candidate has a broad base knowledge and competency in core hardware and operating system technologies including installation, configuration, diagnosing, preventive maintenance, and basic networking.

[[CompTIA Marketplace](#)]

02 – Academy of Info. Technology

The Academy of Information Technology (AOIT) curriculum introduces students to the broad career opportunities in today's digital workforce and equips them with the personal, analytical, technical, and communications skills they need. [[NAF](#)]

03 – ARI – Industry Competency Exams (ICE)

The Air-Conditioning and Refrigeration Institute (ARI) certification programs are industry developed, driven, and managed for entry-level technicians who install, service, and maintain HVACR equipment. [[AHRI](#)]

[04—*discontinued*]

05 – ASE – Auto Collision Repair

The National Institute for Automotive Service Excellence (ASE) is responsible for the Automotive Technician Training Certification Program. The purpose of this certified program is to improve the quality of training offered for students at the high school level. There are four areas in which these students can obtain ASE certification in auto collision repair: Structural Analysis and Damage Repair, Mechanical and Electrical Components, Painting and Refinishing, and Non-Structural Analysis and Damage Repair. [[ASE](#)]

06 – ASE – Auto Technology

The ASE is responsible for the Automotive Technician Training Certification Program. The purpose of this certified program is to improve the quality of training offered for students at the high school level. There are nine areas in which these students can obtain ASE certification in auto technology: Brakes, Suspension & Steering, Electrical/Electronic Systems, Engine Performance, Engine Repair, Automatic Transmission/Transaxles, Manual Drivetrains, Heating & Air Conditioning and Maintenance & Light Repair. [[NATEF](#)]

07 – AWS

The American Welding Society (AWS) certifies the skills of engineers, inspectors, technicians, and welders. The AWS offers various certification programs to meet a variety of needs, providing students with specialized preparation to expand their knowledge base and to work with diverse codes, standards, and specifications industry wide. [[AWS](#)]

08 – Academy of Finance

The National Academy Foundation's Academy of Finance (AOF) introduces students to the broad range of career opportunities in the financial services industry and gives them new choices for their future. [[NAF](#)]

09 – Academy of Hospitality and Tourism

The Academy of Hospitality and Tourism (AOHT) provides public high school students with the requisite knowledge and skills for a successful career in one of the world's largest service industries through a curriculum that provides an in-depth look at all aspects of from hotel management to sports, entertainment, and event management, and includes the study of geography, economics, and world cultures. [[NAF](#)]

10 – Electronics Technician

The Electronics Technicians Association (ETA) International is a not-for-profit worldwide professional association for electronics technicians. The ETA offers two levels of basic ETA certification: (1) certification as a Student Electronics Technician (SET) for high school students and (2) certification as a Certified Electronics Technician, associate (CETa) for individuals who have less than two years' experience or trade school training as electronics technicians. All technicians must pass the associate-level requirements before they can qualify to sit for the full (Journeyman) CET certification. [ETA-I]

[11—*discontinued*]

12 – Certified Nurse Aide

The South Carolina Department of Health and Human Services (SCDHHS) has contracted with Pearson VUE to develop, score, and report the results of the National Nurse Aide Assessment Program (NNAAP™) Examination for the South Carolina Nurse Aide Registry. The exam is a measure of nurse aide-related knowledge, skills, and abilities. It is made up of both a written examination and a skills evaluation. All new nurse aide candidates applying to take the NNAAP™ Examination in South Carolina must have successfully completed a state-approved nurse aide training program. [CNA] [PVUE]

[13—*discontinued*]

14 – Cisco Certified Network Associate

Certification as a Cisco Certified Network Associate (CCNA) indicates that an individual has a foundation in and apprentice knowledge of networking. CCNA certified professionals can install, configure, and operate LAN, WAN, and dial access services for small networks (100 nodes or fewer), including but not limited to use of these protocols: IP, IGRP, Serial, Frame Relay, IP RIP, VLANs, RIP, Ethernet, and Access Lists. [CISCO]

15 – Emergency Medical Technician

In South Carolina, there are three levels of Emergency Medical Technician (EMT) Certification: Basic, Intermediate, and Paramedic. To be *initially* certified as an EMT at any level *for the first time in this state*, the candidate must successfully complete the appropriate South Carolina-approved EMT training program and pass the appropriate level National Registry examination. This certification is available for high school seniors who have completed a South Carolina Department of Health and Environmental Control (DHEC) approved EMT program. [EMT] [NREMT]

[16—*discontinued*]

17 – EPA Section 608

Environmental Protection Agency (EPA) Section 608 technician certification is required in order for an individual to service building air conditioning and refrigeration systems and to purchase refrigerants. There are four types of EPA-Approved Section 608 certification, each involving a knowledge of EPA regulations relating to refrigerant recovery. [ACCA]

18 – First Responder

The American Red Cross offers the course *First Aid—Responding to Emergencies with Adult, Child, and Infant CPR/AED* to provide the citizen responder with the knowledge and skills necessary to help sustain life and minimize the consequences of injury or sudden illness until advanced medical help arrives. This program is designed primarily for use in high schools, colleges, universities, and other settings that require a curriculum of greater length than the American Red Cross FA/CPR/AED Program. In order to receive certification, students must participate in all skill sessions and scenarios, demonstrate competency in all required skills, and correctly answer at least 80 percent of the questions in the appropriate sections on the written exam. [\[ARC\]](#)

Training is also offered and administered by the DHEC Office of Emergency Medical Services (EMS) under a grant from the South Carolina Department of Public Safety and the National Highway Traffic Safety Administration. Actual course instruction is provided by South Carolina's four EMS Regional Offices. The comprehensive training program includes the revised Department of Transportation's 40-hour First Responder course, along with an additional 4-hour South Carolina EMS-imposed oxygen administration training course. This curriculum provides the student with vital training that will permit the rendering of lifesaving techniques at roadside until EMS arrives. [\[NHTSA\]](#)

19 – IC 3 (Internet and Computer Core Certification)

The Internet and Computing Core Certification (IC³) program ensures that students have the knowledge and skills required for basic use of computer hardware, software, networks, and the Internet. IC³ is a gateway to advancement in education, employment, or other certification programs. [\[CERTIPORT\]](#)

[20—discontinued]

[21—discontinued]

[22—discontinued]

[23—discontinued]

24 – National Health Science Assessment

The National Health Science Assessment/Certificate Program is an entry-level certification that verifies student mastery of the knowledge and skills that provide the foundation for all health careers (National Healthcare Foundation Standards). It is recommended that in addition to the online assessment, the student will complete a portfolio. This skill assessment was developed by the National Consortium for Health Science Education, the health science career cluster advisory group. Students seeking this certification should have mastered the National Healthcare Foundation Standards delivered through South Carolina secondary schools' health science education curriculum. [\[NHSA\]](#)

25 – NCCER – A/C Ref. Technology

26 – NCCER – Carpentry

27 – NCCER – Electricity

28 – NCCER – Mechatronics

- 29 – NCCER – Masonry**
- 30 – NCCER – Plumbing**
- 31 – NCCER – Welding Technology**
- [56 – NCCER – Core]**

[58 – NCCER – NCCT National Construction Career Test]

The National Center for Construction Education and Research (NCCER) is a not-for-profit education foundation that was created in 1995 to address the severe workforce shortage facing the industry and to develop a standardized training process and curricula. Among its services, the NCCER develops curricula and conducts programs of education and training for secondary, post-secondary and adult education. In addition, it provides assessments to evaluate the journey-level knowledge and skills of experienced craftspeople as part of the National Craft Assessment and Certification Program (NCACP). NCCER also provides academic assessments and credentialing for high school career and technical education students as part of the standardized industry approved curricula and National Construction Career Tests (NCCT). [\[NCCER\]](#)

32 – CompTIA Network+

CompTIA Network+ certification is an international industry credential that validates the knowledge of networking professionals. [\[COMPTIA\]](#)

33 – NIMS

A National Institute for Metalworking Skills (NIMS) credential is recognition that an individual's competencies have been validated against a set of industry-written skill standards. The credential is awarded on the basis of performance tests and related theory exams. Because the performance requirements and exams are the same nationwide, the credential is portable. [\[NIMS\]](#)

34 – Outdoor Power Equipment

The Outdoor Power Equipment Technician Certification Program, conducted by the Equipment and Engine Training Council (EETC), offers technicians industry-sanctioned certification on the basis of tests given year-round across the United States. Tests are offered in 2-cycle engines, 4-cycle engines, drivelines/hydraulics/hydrostatics, electrical systems, compact diesel engines, and generators. [\[EETC\]](#)

35 – Pharmacy Technician

Two organizations, the Pharmacy Technician Certification Board (PTCB) and the Institute for the Certification of Pharmacy Technicians (ExCPT exam), administer national certification examinations. Certification is voluntary in most states, but is required by some states and employers. Some technicians are hired without formal training under the condition that they obtain certification within a specified period of time. To be eligible for either exam, candidates must have a high school diploma or GED, no felony convictions of any kind within five years of applying, and no drug or pharmacy related felony convictions at any point. Employers, often pharmacists, know that individuals who pass the exam have a standardized body of knowledge and skills. [\[PTCB\]](#)

[36—*discontinued*]

37 – ProStart

The ProStart program, offered in participating high schools through the South Carolina Restaurant and Lodging Association, is supported as an industry-driven curriculum designed by the Educational Foundation of the National Restaurant Association to teach, test, and award industry-recognized certificates to students meeting high standards in hospitality education. The National ProStart[®] Certificate of Achievement is awarded to students who have successfully completed the ProStart[®] program (by meeting all the requirements). [[SCPROSTART](#)]

[38—*discontinued*]

39 – South Carolina Cosmetology License

The South Carolina Board of Cosmetology is responsible for licensing and regulating the profession of cosmetology in the State of South Carolina. The Board has contracted with Professional Credential Services (PCS) to provide administrative examination services. The Board, through PCS, will exclusively use the National-Interstate Council of State Boards of Cosmetology (NIC) examinations. [[PCSHQ](#)]

40 – American Red Cross-Babysitting

Designed for students ages 11 and older, this online training provides the knowledge and skills necessary to safely and responsibly care for infants and children up to the age of 10, as well as to manage a babysitting business. [[ARC](#)]

[41—*discontinued*]

[42—*discontinued*]

43 – Front Desk Representative (HSC)

The Front Desk Representative is a part of the Hospitality Skills Certification (HSC) programs. The HSC programs for hospitality employees brings the professional clout of the Educational Institute's (EI) certification programs to the people who are on the front-line with guests. EI offers designations for those who work in food and beverage, guest service, and housekeeping positions. HSC programs support skill and knowledge training integrated with performance assessment, recognition and achievement. To successfully earn a HSC designation, a candidate/employee must complete the following requirements: Be currently employed in the hospitality industry or be a student in a workforce development program or in a hospitality management program at an accredited school; Achieve a score of 70 percent or better on a written exam; Receive an "Acceptable" rating on 70 percent of the outlined tasks on the skills validation form.

[[AHLEI](#)]

44 – First Aid/CPR/AED

The American Heart Association and the American Red Cross offer a variety of training courses for the workplace and healthcare professionals. Courses are designed to teach the skills of CPR for victims of all ages, use of an automated external defibrillator, relief of choking, and first aid skills. Courses are intended for participants who provide healthcare to family, patients, or co-workers in a wide variety of settings and can be tailored to the needs of specific groups and individuals. [\[AHA\]](#) [\[ARC\]](#)

45 – CompTIA DHTI+

Custom Electronic Design Installation Association (CEDIA) certifications demonstrate your skills as a home technology professional and establish you as a credible partner to potential clients. [\[CEDIA\]](#)

46 – HVAC Excellence

The HVAC Excellence Student Outcome Assessment Program identifies high school students who have successfully attained the knowledge for entry-level positions in the HVACR industry. The Heating, Electrical, Air Conditioning Technology (HEAT) exam is designed to measure the students' retained knowledge of heating, electrical, and air conditioning theory and application. Students who pass the examination are awarded a certificate of achievement. [\[HVACE\]](#)

47 – Oracle

The Oracle Academy provides schools and school districts with the tools required to prepare students for twenty-first-century careers in technology. The program includes such courses as Database Programming with Structured Query Language (SQL), in which students gain an understanding of relational databases through the powerful SQL. The SQL commands, functions, and operators supported by Oracle as extensions to standard SQL are emphasized. The Database Programming with SQL portion of the Academy curriculum is designed to help prepare students to pass the Oracle Certified Professional (OCP) exam, "Introduction to Oracle9i SQL Exam." As part of the Academy, many students will want to take the OCP exam because it is the industry standard for proficiency with SQL. [\[ORACLE\]](#)

[48—*discontinued*]

49 – ServSafe® Food Handler

ServSafe Food Handler certification is available to South Carolina high school students. Recognized by the food service industry nationwide, this certification offers a number of benefits to the students by educating them in food safety and sanitation and improving their marketability in the workforce. The program covers five key areas: basic food safety, personal hygiene, cross-contamination and allergens, time and temperature, and cleaning and sanitation. [\[SERVSAFE\]](#)

[50—*discontinued*]

51 – Electrocardiographic (EKG) Technician

The American Society of Phlebotomy Technicians (ASPT) provides training and certification in all areas of healthcare in which phlebotomists are now involved. As do all individuals who earn ASPT certification, those who hold ASPT certification as EKG Technicians must complete 6 hours of continuing education yearly in order to maintain that credential. [\[ASPT\]](#)

52 – Phlebotomist

The American Society of Phlebotomy Technicians (ASPT) provides training and certification in all areas of healthcare in which phlebotomists are now involved. As do all individuals who earn ASPT certification, those who hold ASPT certification as EKG Technicians must complete 6 hours of continuing education yearly in order to maintain that credential. [\[ASPT\]](#)

[53—discontinued]

54 – ADDA – Certified Apprentice Drafter

The American Design Drafting Association (ADDA) Certification Program offers curriculum certification to schools as a means of quality assurance that benefits both education and industry. Curriculum certification through ADDA meets or exceeds the requirements set forth in most state and federal guidelines to receive funding for drafting and design programs. ADDA also offers professional certification to individuals through its Drafter Certification Program, which is open to all individuals, regardless of experience and formal education. [\[ADDA\]](#)

55 – South Carolina Nail Technician License

The South Carolina Board of Cosmetology is responsible for licensing and regulating the profession of nail technology in the State of South Carolina. The Board has contracted with Professional Credential Services (PCS) to provide administrative examination services. The Board, through PCS, will exclusively use the National-Interstate Council of State Boards of Cosmetology (NIC) examinations. [\[PCSHQ\]](#)

56 – NCCER – Core

[see entries 25–31, above]

[57 – discontinued]

58 – NCCER – NCCT National Construction Career Test

[see entries 25–31, above]

59 – South Carolina Early Childhood Credential

The SC Early Childhood Credential is awarded to those who complete the three-hour introductory course in early childhood, ECD 101-Introduction to Early Childhood, with a grade of “C” or higher at one of the sixteen technical/community colleges in the state. This course includes the basic information and competencies a person would need to work with young children in a group setting. Individuals may enroll at their local technical/community colleges to take the course. [\[SCCCCD\]](#)

60 – Cisco Certified Entry Networking Technician

Cisco Certified Entry Networking Technician (CCENT) certification validates the ability to install, operate and troubleshoot a small enterprise branch network, including basic network security. With a CCENT certification, a network professional demonstrates the skills required for entry-level network support positions, the starting point for many successful careers in networking. The curriculum covers networking fundamentals, WAN technologies, basic security and wireless concepts, routing and switching fundamentals, and configuring simple networks. CCENT is the first step toward achieving CCNA, which covers medium size enterprise branch networks with more complex connections. [\[CCENT\]](#)

[61—*discontinued*]

[62—*discontinued*]

63 – OSHA

Under the Occupational Safety and Health Administration (OSHA) Act, OSHA's role is to promote safe and healthful working conditions for America's men and women by setting and enforcing standards and providing training, outreach and education. The quality education and training programs are designed to prevent work-related injuries, illnesses and deaths by providing the knowledge and tools that workers and employers need to identify and correct workplace safety and health hazards. [\[OSHA\]](#)

64 – Certified Associate in Project Management (CAPM)

Certified Associate in Project Management (CAPM) is a credential offered by the Project Management Institute (PMI) as a professional-level certification aimed at industry professionals. This certification entails that professionals have learned theories, tools, and techniques used to ensure project success: task organization and sequencing; schedule development; critical path methods, milestone, PERT, and Gantt charts; reverse planning methods; and cost, performance, and client considerations. [\[PMI\]](#)

65 – Adobe Certified Expert

Adobe Certified Expert (ACE) is a professional-level certification aimed at industry professionals who have attained a deep level of mastery in using Adobe technology. An individual with the ACE certification is a qualified professional in fields such as web design, digital media, or rich Internet application development. [\[ACE\]](#)

66 – Broad Field Family and Consumer Sciences Assessment/Certification

Broad Field Family and Consumer Sciences Assessment/Certification is an end-of-program assessment at a knowledge and skill level associated with early career employment opportunities and rigorous education programs that prepare for this level of the career ladder. Assessment and certification competency topics include interpersonal relationships, life span and human development, family well-being, career connections, family and consumer resources, and nutrition and wellness. [\[AAFCS\]](#)

67 – Early Childhood Education Assessment/Certification

The Early Childhood Education Assessment/Certification is an end-of-program assessment that addresses a skill set necessary for success in early childhood education, which is one of the fastest growing programs that is reporting employment growth. Assessment and certification competency topics include career paths, developmentally appropriate practices, curriculum and instruction, learning environment, positive relationships with children, professional practices and standards, and family and community involvement. [\[AAFCS\]](#)

68 – Personal and Family Finance Assessment/Certification

The Personal and Family Finance Assessment/Certification is an end-of-program assessment that addresses competencies necessary for success in managing personal and family financial matters in daily life (a necessary skill set to maximize success in all career areas) while also foundational specifically to careers in personal and family finance. Assessment and certification competency topics include financial responsibility and decision making, income and careers, planning and money management, credit and debt, risk management and insurance, and saving and investing. [\[AAFCS\]](#)

69 – Culinary Arts Assessment/Certification

The Culinary Arts Assessment/Certification is an end-of-program assessment that addresses a skill set necessary for success in the culinary industry. Assessment and certification competency topics include safety, health, and environmental, management, leadership, and teamwork; ethics and leadership responsibilities, employability and career development, technical skills-customer service Front of House (FOH), technical skills Back of House (BOH), and preparation techniques (BOH). [\[AAFCS\]](#)

70 – Education Fundamentals Assessment/Certification

The Education Fundamentals Assessment/Certification is an end-of-program assessment that facilitates employment in early career ladder positions and promotes continuing education at the post-secondary level. Assessment and Certification Competency topics include the teaching profession; the learner and the learning process; planning instruction; learning environment; and, assessment and instructional strategies. [\[AAFCS\]](#)

71 – Family and Community Services Assessment/Certification

The Family and Community Services Assessment/Certification is an end-of-program assessment that facilitates employment in early career ladder positions and promotes continuing education at the post-secondary level. Assessment and certification competencies topics include careers and volunteer opportunities, factors related to family and community services, professional and ethical behaviors, conditions affecting individuals and families, and services for individuals and families. [\[AAFCS\]](#)

72 – Fashion, Textiles, and Apparel Assessment/Certification

The Fashion, Textiles, and Apparel Assessment/Certification is an end-of-program assessment that addresses a skill set necessary for success in the fashion industry. It is anticipated that this assessment and certification will be targeted for individuals preparing for careers related to fashion, textiles, and apparel. Assessment and certification competency topics include career paths; textile fiber products and materials; design skills, fashion, textile, and apparel production; fashion merchandising; customer service; and operational procedures. [\[AAFCS\]](#)

73 – Interior Design Fundamentals Assessment/Certification

The Interior Design Fundamentals Assessment/Certification is an end-of-program assessment that addresses competencies and a skill set necessary to document a pre-professional's basic knowledge of interior design. It is anticipated that this assessment and certification will promote further education at the post-secondary level and continued training and professional development for those who want to pursue interior design careers. Assessment and certification topics include career paths; design fundamentals; factors influencing design, design communication and skills development; interior design application and analysis, and professional practice. [AAFCS]

74 – Nutrition, Food, and Wellness Assessment/Certification

The Nutrition, Food and Wellness Assessment/Certification is an end-of-program assessment that addresses competencies and a skill set necessary for success as a pre-professional in careers with a substantial focus on nutrition. There are usage applications in a broad range of education, community-based, staff development, and human resource settings. Assessment and certification topics include wellness, food handling, food safety, science and technology, nutrition principles, and careers. [AAFCS]

75 – Housing and Furnishings Assessment/Certification

The Housing and Furnishings Assessment/Certification is an end-of-program assessment that addresses competencies and skills necessary for success as a pre-professional in housing and furnishing careers. It will facilitate employment in early career ladder positions and promote continuing education at the post-secondary level in career areas. Assessment and certification topics include careers in housing and furnishings, knowledge of housing and furnishings processes, residential housing, furnishings, and design concepts, professional communication and marketing, and professional practices. [AAFCS]

76 – Food Science Fundamentals Assessment/Certification

The Food Science Fundamentals Assessment/Certification is an end-of-program assessment that addresses competencies and a skill set necessary for success as a pre-professional in a career with a substantial focus on food science. It will facilitate employment in early career ladder positions and promote continuing education at the post-secondary level in career areas involving food science, food safety, food quality, food technology, or food preservation and packaging. Assessment and certification competencies include careers, food protection, nutritional composition of foods, food processing, preservation and packaging; and food technology. [AAFCS]

77 – S/P2 – Auto Collision Repair

S/P2 is the industry standard of awareness in environmental and safety throughout the United States. The purpose of this certified program is to improve the quality of safety and pollution prevention training for students at the high school level. There are two areas in which students can obtain S/P2 national certification in automotive collision repair: Collision Safety and Collision Pollution Prevention. [S/P2]

78 – S/P2 – Auto Technology

S/P2 is the industry standard of awareness in environmental and safety throughout the United States. The purpose of this certified program is to improve the quality of safety and pollution prevention training for students at the high school level. There are two areas in which students can obtain S/P2 national certification in automotive technology: Mechanical Safety and Mechanical Pollution Prevention. [\[S/P2\]](#)

[79—*discontinued*]

80 – Adobe Certified Associate - Visual Communication with Adobe Photoshop

Adobe Certified Associate is an entry-level certification aimed at validating communication skills using a particular digital medium. The Visual Communication with Adobe® Photoshop® exam validates entry-level skills in communication corresponding to Adobe Photoshop software. Photoshop is the industry standard for the utmost creative control in image editing and compositing. One can apply filters nondestructively, manage and correct color more easily, convert color images to rich black-and-white with one click, and retouch images with more powerful cloning and healing tools. [\[CERTIPORT\]](#)

81 – Adobe Certified Associate-Web Communication with Adobe Dreamweaver

Adobe Certified Associate is an entry-level certification aimed at validating communication skills using a particular digital medium. The Web Communication with Adobe® Dreamweaver® exam validates entry-level skills in communication corresponding to Adobe Dreamweaver software. Dreamweaver is the industry leading web development tool, enabling users to efficiently design, develop and maintain standards-based web sites and applications. With Dreamweaver, one can go from start to finish, creating and maintaining basic web sites to advanced applications that support best practices and the latest technologies. [\[CERTIPORT\]](#)

82 – Adobe Certified Associate - Rich Media Communication with Adobe Flash

Adobe Certified Associate is an entry-level certification aimed at validating communication skills using a particular digital medium. The Rich Media Communication with Adobe Flash® Professional exam validates entry-level skills in communication corresponding to Adobe Flash Professional software. Flash is the industry standard for creating and delivering effective, rich interactive content across desktops and devices. Flash enables users to integrate animation, video, text, audio, and graphics into engaging user experiences that span a wide variety of digital devices, from desktops to mobile phones. [\[CERTIPORT\]](#)

83 – Adobe Certified Associate-Video Communication with Adobe Premiere Pro

Adobe Certified Associate is an entry-level certification aimed at validating communication skills using a particular digital medium. The Video Communication with Adobe Premiere® Pro exam validates entry-level skills in communication corresponding to Adobe Premiere Pro software. [\[CERTIPORT\]](#)

84 – Microsoft Technology Associate (MTA) Certification

The Microsoft Technology Associate (MTA) certification is an entry-level certification designed to help individuals take the first step toward a career as an IT professional or developer by demonstrating knowledge and basic understanding of key technology concepts. An MTA certification is based on 80 percent knowledge and 20 percent skills. The MTA offers three IT certifications, three development certifications, and one database certification. The IT section includes tests in Networking Fundamentals, Security Fundamentals, and Windows Server Administration Fundamentals. The development certification offers tests in Software Development Fundamentals, Windows Development Fundamentals, and Web Development Fundamentals. The database certification covers Database Administration Fundamentals. [\[MICROSOFT\]](#)

85 – Microsoft Digital Literacy Certification

The goal of Microsoft Digital Literacy is to teach and assess basic computer concepts and skills so that students can use computer technology in everyday life to develop new social and economic opportunities for themselves, their families, and their communities. Whether you are entirely new to computing or have some experience, this curriculum will help you develop a fundamental understanding of computers. From using the Internet to sending e-mail or creating a résumé, the Digital Literacy Curriculum helps develop the essential skills one needs to begin computing by focusing on computer basics, Internet and the World Wide Web, productivity, computer security and digital lifestyles. [\[MICROSOFT\]](#)

- 86 – MOS Office 2010 - Word 2010**
- 87 – MOS Office 2010 - Word 2010 Expert**
- 88 – MOS Office 2010 - Excel 2010**
- 89 – MOS Office 2010 - Excel 2010 Expert**
- 90 – MOS Office 2010 - PowerPoint 2010**
- 91 – MOS Office 2010 - Outlook 2010**
- 92 – MOS Office 2010 - Access 2010**

A Microsoft Office Specialist (MOS) certification helps validate proficiency in using Microsoft Office 2010 and meets the demand for the most up-to-date skills on the latest Microsoft technologies. Candidates who pass a certification exam show that they can meet globally recognized performance standards. Candidates must pass one certification exam in order to earn MOS certification. [\[MICROSOFT\]](#)

- 93 – MOS Office 2007/Vista - Word 2007**
- 94 – MOS Office 2007/Vista - Word 2007 Expert**
- 95 – MOS Office 2007/Vista - Excel 2007**
- 96 – MOS Office 2007/Vista - Excel 2007 Expert**
- 97 – MOS Office 2007/Vista - PowerPoint 2007**
- 98 – Office 2007/Vista - Outlook 2007**
- 99 – MOS Office 2007/Vista – Access 2007**

MOS certifications, which focus on demonstrating skills in using the 2007 Microsoft Office System and the Windows Vista operating system, are still very much in demand. Candidates who pass certification exams show that they can meet globally recognized performance standards. A candidate must pass one certification exam in order to earn MOS certification. [\[MICROSOFT\]](#)

- 100 – MOS Office 2016 – Word 2016**
- 101 – MOS Office 2016 – Word 2016 Expert**
- 102 – MOS Office 2016 – Excel 2016**
- 103 – MOS Office 2016 – Excel 2016 Expert**
- 104 – MOS Office 2016 – PowerPoint 2016**
- 105 – MOS Office 2016 – Access 2016**
- 106 – MOS Office 2016 – Outlook 2016**

A MOS certification helps validate proficiency in using Microsoft Office 2016 and meets the demand for the most up-to-date skills on the latest Microsoft technologies. Candidates who pass a certification exam show that they can meet globally recognized performance standards. Candidates must pass one certification exam in order to earn MOS certification. [\[MICROSOFT\]](#)

- A0 – MOS Office 2003/XP/2000: Word 2003**
- A1 – MOS Office 2003/XP/2000: Word 2003 Expert**
- A2 – MOS Office 2003/XP/2000: Excel 2003**
- A3 – MOS Office 2003/XP/2000: Excel 2003 Expert**
- A4 – MOS Office 2003/XP/2000: PowerPoint 2003**
- A5 – MOS Office 2003/XP/2000: Access 2003**
- A6 – MOS Office 2003/XP/2000: Outlook 2003**

(MOS) certification continues to offer tracks for Microsoft Office 2003, Microsoft Office XP, and Microsoft Office 2000. To earn a MOS certification, one must pass one or more certification exams. MOS certification exams help provide a valid and reliable measure of technical proficiency and expertise. These MOS certification exams evaluate a candidate's overall comprehension of Microsoft Office or Office Project programs, as well as his or her ability to use advanced features and integrate Microsoft Office programs with other software. [\[MICROSOFT\]](#)

A7 – CompTIA IT Fundamentals

The CompTIA IT Fundamentals exam is designed to help you learn more about the world of IT. It's ideal if you're considering a career in IT or if you work in an allied field that requires a broad understanding of IT. CompTIA IT Fundamentals can also be a stepping stone to more advanced certifications such as CompTIA A+, and, with specialized experience, CompTIA Network+ and CompTIA Security+. [\[COMPTIAIT\]](#)

A8 – Secondary Culinary Graduate

Students are able to obtain a Secondary Culinary Graduate certification if they graduate from an American Culinary Federation Education Foundation (ACFEF) Secondary Certified program, pass a national competency written exam with a cut score of 70 percent, or pass with an overall average of 70 percent of the written and performance exams. [\[ACFEF\]](#)

A9 – Certified Junior Culinarian

Students are able to obtain a Certified Junior Culinarian (CJC) certification if they graduate from an ACFEF Secondary Certified program and pass a national competency exam with a score of 70 percent or higher on the written exam and 75 percent or higher on the practical exam. [\[ACFEF\]](#)

A10 – W!SE – Financial Literacy Certification Program (FLCP)

The W!se Financial Literacy Certification Program (FLCP) addresses the urgent need for financial literacy and education. The program provides high school students with access to financial education and the opportunity to become certified financially literate. [\[WISE\]](#)

A11 – ETC Certification Course

The ETC program is designed and produced by the National Academies of Emergency Dispatch (NAED). The course (40 hours minimum) is designed to train new employees unfamiliar with emergency communication centers, emergency telecommunication technology, interpersonal communication, legal issues, and job stress factors. The program takes an integrated teaching approach that features comprehensive content, multimedia presentations, and hands-on training. The course covers the following topics: Roles and Responsibilities of the Emergency Telecommunicator, Emergency Telecommunication Technologies, Telecommunication Essentials, Interpersonal Communication, Caller Management, Police Call Classification, Fire Call Classification, Medical Call Classification, Man-Made and Natural Catastrophic Events, Radio Broadcast Procedures, Legal Aspects of Public Safety Communication, Quality Improvement and Stress Management. [\[NAEMD\]](#)

A12 – PrintED®-GAERF®

PrintED®, administered by the Graphic Arts Education and Research Foundation (GAERF®), is a national accreditation program, based on industry standards, for graphic communications courses of study at the secondary and postsecondary levels. To provide students with a credential that validates their mastery of the PrintED competencies, GAERF and SkillsUSA have partnered to offer online PrintED/SkillsUSA Skill Connect Assessments. The following five examinations test technical skills and knowledge with interactive questions enriched by animation, videos, drawings, and photographs: Advertising & Design, Digital File Preparation/Digital File Output, Graphic Communications, Offset Press Operations/Binding & Finishing, and Screen Printing Technology. [\[GAERF\]](#)

A13 – Teen Babysitting Class

This two-day class is ideal for teens between the ages of 12 and 15 who will practice baby care with life-like dolls and learn how to diaper, bathe and dress infants. Participants learn infant and child CPR through the American Heart Association and learn basic first aid safety. [\[THSK\]](#)

A14 – Skills, Tasks, and Results Training (START) Certification

The American Hotel & Lodging Educational Institute has developed a hospitality program to introduce high school students to the opportunities available in the hospitality and tourism industry, the Hospitality and Tourism Management Program focuses on educating students on the career pathways and skills needed to build a long-term career in this fast paced and exciting industry. [\[AHLEI\]](#)

A15 – ServSafe® Manager

Managers need to know food safety and the critical importance of its role, and they need to learn how to share food safety knowledge with every employee. The program blends the *latest FDA Food Code*, food safety research and years of food sanitation training experience. Managers learn to implement essential food safety practices and create a culture of food safety. All content and materials are based on actual job tasks identified by foodservice industry experts.

[SERVSAFE]

[A16—*discontinued*]

A17 – ParaPro Assessment

The ParaPro Assessment measures the skills and knowledge in reading, writing and math possessed by prospective and practicing paraprofessionals. It also measures their ability to apply those skills and knowledge when assisting in classroom instruction. It was designed to satisfy the requirements of the federally legislated No Child Left Behind Act. [ETS]

A18 – TestOut PC Pro Certification

The TestOut PC Pro Certification is the first exam of TestOut Pro Certifications—certifications that measure not just what you know, but what you can do. The TestOut PC Pro Certification measures your ability to install, manage, repair, and troubleshoot PC hardware and Windows operating system software.

- The certification focuses on validating job skills. It will include the following areas of focus: Audio, CPU, Expansion slots, External devices, (USB, Firewire, parallel, keyboard/mouse, serial), Memory, Motherboard, Networking, Power supply, Printing, Security, Storage, System Management, Video.
- The TestOut PC Pro Certification exam is a culminating exam and students should have completed an entire course of study for PC hardware and software (equivalent to both TestOut A+ courses). [TESTOUT]

A19 – TestOut Network Pro Certification

The TestOut Network Pro Certification is the second exam in the TestOut Pro Certification exam product line. The TestOut Network Pro Certification Exam measures your ability to perform real-world tasks using the Windows operating system and common networking hardware. The certification focuses on validating job skills. It will include the following areas of focus: Cables and Connectors, Wired Networking, Wireless Networking, Network Connection, Configuration, Network Services, Network Security, Network Management Network, and Troubleshooting.

[TESTOUT]

[A20—*discontinued*]

A21 – Network Computer Technician Certification – NCT

Network Computer Technicians, who are certified, are expected to obtain knowledge of computer electronics basic concepts, Internet and networking technology applicable to various areas of the computer industry. Once the NCT has acquired these skills, abilities and knowledge, he or she will be able to enter employment in any part of the computer industry.

With minimal training in areas unique to the specific products, the NCT should become a profitable and efficient part of the computer industry workforce. NCTs are not required to pass the Associate, or basic electronics, technician examination. Journeyman NCTs may pass the Associate exam and, by doing so, become a C.E.T. (showing the NCT specialty area.) [\[ETAI\]](#)

A22 – Network Systems Technician Certification – NST

Network Systems Technicians, who are certified, are considered a network professional, who are expected to obtain knowledge of computer network basic concepts, which are applicable to all the various specialty areas of the computer industry. Once the NST has acquired these skills and knowledge, the technician will be able to enter employment in any part of the computer networking industry. With minimal training in areas unique to the specific products, the NST should become a productive member of computer industry workforce. Candidates who are interested in taking the NST exam are not required to pass the Associate, or basic electronics, exam. However, potential NST's must have already acquired one of the following: 1) The Computer Service Technician (CST); 2) The Network Computer Technician Certification (NCT); or 3) The A+ as a prerequisite to sitting for the NST examination. [\[ETAI\]](#)

A23 – Computer Service Technician Certificate - CST

This program prepares students for careers diagnosing and repairing common computer related malfunctions and installing PC equipment and peripheral systems. Because communication skills are essential for computer technicians and support specialists, it also focuses on enhancing teamwork and written and verbal communication skills. Successful completion prepares the student for the Comp TIA A+ certification exam. [\[ETAI\]](#)

A24 – Wireless Network Technician Certification - WNT

The Wireless Network Technician Certification is a program to obtain knowledge of the operation and maintenance of wireless networking concepts, RF and IR propagation and modulation technologies, which are applicable to all the various specialty areas of the wireless networking industry. Once the WNT has acquired these skills and knowledge, the technician will be able to enter employment in any part of the networking industry. With minimal training in areas unique to the specific products, the WNT should become a productive member of computer industry workforce. [\[ETAI\]](#)

A25 – EPA Auto Body Regulation Training Certification

Many paints used in auto body refinishing work contain compounds that pose health risks to anyone who breathes the air when these fumes are present. To reduce this risk and to reduce air pollution of metals such as chrome, lead, cadmium, manganese, and nickel compounds, as well as methylene chloride fumes from auto body refinishing work, Environmental Protection Agency (EPA) regulations require auto body shops and refinishing businesses to follow steps to prevent these metals from getting in to the air during spray painting. Training is one of the required steps, and certificates issued upon completion of training are valid for five years. [\[ECFR\]](#)

A26 – South Carolina Registered Barber License

The South Carolina Board of Barber Examiners is responsible for licensing and regulating the profession of barbering in the State of South Carolina. The Board has contracted with Professional Credential Services (PCS) to provide administrative examination services.

The Board, through PCS, will exclusively use the National-Interstate Council of State Boards of Cosmetology (NIC) examinations. [\[PCSHQ\]](#)

A27 – South Carolina Hair Braiding Registration

The South Carolina Board of Barber Examiners is responsible for licensing and regulating the profession or hair braiding in the State of South Carolina. Individuals wishing to practice hair braiding are required to hold a hair braiding registration. [\[LLRSC\]](#)

A28 – South Carolina Esthetician

The South Carolina Board of Cosmetology (the Board) is responsible for licensing and regulating the profession of cosmetology in the State of South Carolina. The Board has contracted with Professional Credential Services (PCS) to provide administrative examination services. The Board, through PCS, will exclusively use the National- Interstate Council of State Boards of Cosmetology (NIC) examinations. [\[PCSHQ\]](#)

A29 – Emergency Telecommunicator Certification

Emergency Telecommunicator Certification is available to those who successfully complete the National Academies of Emergency Dispatch emergency communicator course (40 hours minimum). The program is designed to train new employees unfamiliar with emergency communications centers, emergency telecommunication technology, interpersonal communication, legal issues, and job stress factors. [\[ETC\]](#)

A30 – Financial Literacy

EverFi- Financial Literacy™ covers complex financial concepts covering more than 600 topics, including credit scores, budgeting, insurance, credit cards, student loans, mortgages, taxes, stocks, savings, 401k's and other critical concepts. EverFi tracks individual student progress and knowledge gain and provides students who successfully complete the course with certification in financial literacy. [\[EVERFI\]](#)

A31 – Digital Literacy

Ignition Digital Literacy and Responsibility™ informs students in grades 7– 9 on how technology works, while also placing them in virtual environments to tackle issues including privacy, security, cyber bullying, digital relationships, and the viral nature of the web. [\[EVERFI\]](#)

A32 – MOS: Microsoft Office Word 2013

A33 – MOS: Microsoft Office Excel 2013

A34 – MOS: Microsoft Office PowerPoint 2013

A35 – MOS: Microsoft Office Outlook 2013

A36 – MOS: Microsoft Office Access 2013

A37 – MOS: Microsoft Office SharePoint 2013

A38 – MOS: Microsoft Office OneNote 2013

Office 2013 meets the demand for the most up-to-date skills on the latest Microsoft technologies. Candidates who pass a certification exam show that they can meet globally recognized performance standards. Candidates must pass one certification exam in order to earn MOS certification. [\[MICROSOFT\]](#)

A39 – Adobe Certified Associate–Print & Digital Media Publication with Adobe InDesign

The Print & Digital Media Publication with Adobe InDesign® exam validates entry-level skills in print and digital media publication corresponding to Adobe InDesign software. [\[ACA\]](#)
[\[CERTIPORT\]](#)

A40 – Adobe Certified Associate - Graphic Design & Illustration with Adobe Illustrator

The Graphic Design & Illustration with Adobe Illustrator® exam validates entry-level skills in graphic design and illustration corresponding to Adobe Illustrator software.[\[ACA\]](#)
[\[CERTIPORT\]](#)

A41 – TestOut Security Pro Certification

The TestOut Security Pro Certification is the third exam in the TestOut Pro Certification exam product line. The TestOut Security Pro Certification Exam measures your ability to implement and configure security on an array of common devices, including a Microsoft Server, Cisco Network Security Appliance, Cisco Small Business switch, wireless Access Point, workstations (Windows and Linux) and an iPad iOS. [\[TESTOUT\]](#)

A42 – South Carolina Master Hair Care License

The South Carolina Board of Barber Examiners is responsible for licensing and regulating the profession of barbering in the State of South Carolina. The Board has contracted with Professional Credential Services (PCS) to provide administrative examination services. The Board, through PCS, will exclusively use the National-Interstate Council of State Boards of Cosmetology (NIC) examinations. [\[PCSHQ\]](#)

A43 – ACF Retail Commercial Baking Assessment

The American Culinary Federation Education Foundation validates this assessment as a proper display of student's comprehension of standards and curriculum for Baking and Pastry. [\[ACFRCBCB\]](#)

A44 – CSWA- SolidWorks Associate Certification

This certification can be used as a benchmark to measure the student knowledge and competency with SolidWorks software. [\[DSSW\]](#)

A45 – RCA-Basic Principles for Construction

A46 – RCA-Electrical Principles

A47 – RCA-House Wiring

A48 – RCA-Electrical Wiring

Residential Construction Academy (RCA)

Delmar, Cengage Learning, and the Home Builders Institute (HBI), the workforce development arm of the National Association of Home Builders (NAHB), offer industry-developed certification protocols for instructors and students using educational materials from the (RCA) Series. Designed with input from educators and industry, the material supports skill standards developed by NAHB and industry experts. Courses offer students the basics of electrical study, and a tenet of the series is that students learn by doing. A student earns a certificate for the successful completion of each course, which, in turn, can lead to an entry-level position doing electrical work and/or to further studies at the technical college level. [\[RCA\]](#)

A49 – Cooking and Baking Exam

The National Restaurant Association has created exams that measure knowledge on general procedures, core principles, technical skills, and the how's and why's of cooking and baking. The certificate exams attest that students have met the learning objectives and have full knowledge of the principles and practices of the culinary arts. Because the exams evaluate the student's grasp of generally accepted principles of cooking and baking, they can be used as a capstone for any culinary program. [\[NRASERVSAFE\]](#)

A50 – Heads Up: Concussion in Youth Sports

The NFHS has teamed up with the Centers for Disease Control and Prevention (CDC) to educate coaches, officials, parents and students. Each state's requirements for concussion management are included as part of the course. This is a free on-line course that will help you understand a concussion and the potential consequences of this injury; recognize concussion signs and symptoms and how to respond; learn about steps for returning to activity (play and school) after a concussion; and focus on prevention and preparedness to help keep athletes safe season-to-season. [\[CDC\]](#)

A51 – Paid Feeding Assistants

South Carolina nursing facilities employ Paid Feeding Assistants (PFAs) in an effort to provide more residents with help in eating and drinking and to reduce the incidence of unplanned weight loss and dehydration. PFAs must successfully complete an eight-hour state-approved feeding assistant training program and work under the supervision of a registered nurse or licensed practical nurse. The SC Department of Health and Human Services (HHS) is responsible for developing and implementing policies for the PFA program. [\[PFA\]](#)

A52 – CompTIA Security+ Certification

CompTIA Security+ is an international, vendor-neutral certification that demonstrates competency in: network security; compliance and operational security; threats and vulnerabilities; application, data and host security; access control and identity management; and cryptography. CompTIA Security+ not only ensures that candidates will apply knowledge of security concepts, tools, and procedures to react to security incidents; it ensures that security personnel are anticipating security risks and guarding against them. [\[COMPTIA\]](#)

A53 – Systems Security Certified Practitioner - SSCP from (ISC)²®

The SSCP is ideal for those working in or towards positions such as: security; network security engineering; systems analyst; information systems auditor; application programmer; security administrator; systems administrator; network administrator; database administrator; business unit representative; security architect; security consultant/specialist; information assurance technician. The SSCP credential ensures that candidates continuously monitor systems to safeguard against security threats while having the knowledge to apply security concepts, tools and procedures to react to security incidents. The SSCP credential demonstrates competency in the following CBK® domains: Access Controls; Cryptography; Malicious Code and Activity; Monitoring and Analysis; Networks and Communications; Risk, Response and Recovery; and Security Operations and Administration. [\[ISC2\]](#)

A54 – Autodesk User Certification for Maya

Career and technical education programs across the United States equip students with marketable 2D and 3D design skills by teaching them to use state-of-the-art Autodesk® design software. Autodesk Certified User (ACU) certification confirms students have the skills necessary to continue their design careers—whether they attend college, enter the workforce or work toward additional levels of industry certification after graduation. [\[CERTIPORT\]](#) [\[ADMC\]](#)

A55 – Autodesk Inventor Certified User Exam

In collaboration with Certiport, Project Lead the Way students who have completed the Introduction to Engineering Design course can take the Autodesk Inventor Certified User exam for certification.

- For PLTW schools only, each exam voucher is \$49.00.
- The voucher is valid for 12 months and includes a retake opportunity.
- The 45 minute exam can be administered online at your school.
- Passing students receive a digital certificate from Autodesk.
- A free study guide, created by Autodesk, is available.
- Practice test are available with exam and learning modes.

For details, call Certiport at 1-888-999-9830 or email at autodeskinfo@certiport.com
[\[CERTIPORT\]](#)

A56 – Microsoft Certified Solutions Associate (MCSA)

Microsoft Certified Solutions Associate (MCSA) is a certification program intended for people who seek entry-level jobs in an Information Technology (IT) environment. MCSA is a prerequisite for more advanced Microsoft certifications. The MCSA credential supplants the now defunct Microsoft Certified Systems Administrator certification. Students can select any of the following specialty areas:

- Windows Server 2008
- Windows Server 2012
- SQL Server 2012
- Windows 7
- Windows 8

As they advance in the Microsoft Certified Professional (MCP) program, professionals can gain any or all of the following certifications:

- Microsoft Certified Systems Engineer (MCSE)
- Microsoft Certified Solutions Developer (MCSD)
- Microsoft Certified Product Specialist (MCPS)
- Microsoft Certified Trainer (MCT)

[MCSA]

A57 – TestOut Windows Server Pro: Install and Configure (Part 1)

LabSim for Windows Server Pro, TestOut's course for entry-level Server 2012 administration, will give you the knowledge you need to pass Microsoft's 70-410 exam, plus the hands-on experience that you will need to pass TestOut's Windows Server Pro: Install and Configure Certification exam (beta). Throughout this interactive course you will be able to practice your ability to design, implement, configure, and manage a Windows network that incorporates Windows Server 2012. New labs include:

- Using Hyper-V to create and manage virtual machines
- Configuring Network Interface Controller (NIC) teaming
- Creating storage pools
- Configure printer pooling using a Print Management Console
- Installing and configuring a Dynamic Host Configuration Protocol (DHCP) server

[TESTOUT]

A58 – TestOut Windows Server Pro: Manage and Administer (Part 2)

TestOut's newest release for the MCSA certification track will take your Windows Server skills to the next level and prepare you for Microsoft's 70-411 exam as well as TestOut's Windows Server Pro: Manage and Administer Certification exam (anticipated beta release in Q3 of 2014). Windows Server Pro: Manage and Administer will give you experience with:

- Maintaining a multi-site network
- True-to-life Domain Name Servers (DNS) functionality
- Active Directory Administrative Center
- File Server Resource Manager
- Managing group policies
- System Health Validator policies

[TESTOUT]

A59 – TestOut Windows Server Pro: Advance Services (Part 3)

Windows Server Pro: Advanced Services, the capstone course to our Microsoft Certified Solutions Associate (MCSA) certification track, simulates a network of over forty servers in seven locations. The advanced lab simulations in this course will allow you to practice complex tasks that you would be expected to perform on servers at a mid-size business. You will gain experience using:

- Server Manager
- iSCSI Initiator
- DHCP Manager-Advanced Services
- DNS - Advanced Services
- Failover Cluster Manager
- Hyper-V Manager
- AD-RMS

[TESTOUT]

A60 – Heat Illness Prevention

Exertional heat stroke is the leading cause of preventable death in high school athletics. Exertional heat stroke also results in thousands of emergency room visits and hospitalizations throughout the nation each year. This free course, brought to you by EAS Sports Nutrition, a division of Abbott Labs, is designed to give you the critical information you need to minimize the risk of exertional heat stroke among your athletes. The course presents seven fundamentals, which when followed, will minimize heat related illnesses of the students who participate.

[NFHSL]

A61 – Certified Guestroom Attendant

The Certified Guestroom Attendant credential recognizes the skills, knowledge and responsibilities needed to keep guest rooms clean, safe and maintained at a lodging property. The certification is supported by the Skills, Tasks, and Results Training (START) for Guestroom Attendant. The online program presents concise instructions for training new or prospective employees on how to perform key tasks correctly, along with the general hospitality knowledge, and soft skills needed in the hospitality industry. Students must pass the 30 multiple-choice questions certification exam with a score of 70 percent. [AHLEI]

A62 – Certified Restaurant Server

Skills, Tasks, and Results Training (START) for Individual Positions offers flexible and concise instructions on how to perform key tasks, along with the general hospitality knowledge, and soft skills needed to succeed as a food service professional in a front-line position at a dining facility. Successful candidates who complete the START program and pass the 30 multiple-choice Restaurant Server certification exam with a score of 70 percent or higher will receive a certificate.

[AHLEI]

A63 – Certified Maintenance Employee (HSC)

The START Program for Individual Positions offers flexible and concise instructions on how to perform key tasks, along with the general hospitality knowledge, and soft skills needed to succeed in a front-line position at a lodging property. The START study guide for Maintenance Employee is intended for trainees learning in a classroom setting. The guide is divided into three sections for the trainee:

- Knowledge that all hospitality employees need
- Knowledge specific to the Maintenance position
- Common tasks broken down into a step-by-step method

[AHLEI]

A64 – Advanced Child Care Training

The American Red Cross Advanced Child Care Training Online course teaches the knowledge and skills necessary to responsibly care for children and infants in and outside of the home. This includes training in leadership, child behavior and discipline, professionalism, safety, and basic childcare (bottle feeding, holding, etc.). Learners will be engaged in virtual environments in which world-class animated characters respond specifically to choices made. Throughout, learning is supported through additional activities and informative videos. Note: This program is not intended as certification for state licensed child-care providers and does not meet all state requirements for such certification. [\[ARC\]](#)

A65 – The Child Development Associate Credential

The Child Development Associate (CDA) Credential™ is based on a core set of competency standards, which guide early care professionals as they work toward becoming qualified teachers of young children. The Council works to ensure that the nationally-transferable CDA is a credible and valid credential, recognized by the profession as a vital part of professional development. [\[CDA\]](#)

A66 – Certified Patient Care Technician (CPCT)

The Certified Patient Care Technician/Assistant assists doctors, nurses and other healthcare professionals in providing direct patient care in a variety of healthcare environments. While similar to a Nurse Aid, a Patient Care Technician is nationally certified instead of state licensed. Patient Care Technicians can also conduct blood draws as well as EKG's. To build upon your Nurse Aid curriculum, we recommend adding content in Phlebotomy and EKG to ensure your students success on the exam. The exam is 150 multiple choice questions. [\[NHANOW\]](#)

A67 – Medical Billing and Coding Specialist

Medical Billing and Coding Specialists (MBC) are the health care professionals in charge of processing patient data such as treatment records and related insurance information. The healthcare industry depends on skilled, qualified medical insurance billers and coders to accurately record, register and track each patient's account. Medical Billing and Coding Specialists are largely responsible for making sure medical office revenue cycles run smoothly. Upon successful completion of the MBC Program, students qualify to sit for the national certification exam through NCCT Inc. Certified as a National Certified Insurance Coding Specialist (NCICS). [\[NCCTINC\]](#)

A68 – Community Emergency Response Team

Community Emergency Response Team (CERT) educates individuals about disaster preparedness for hazards that may impact their area and trains them in basic disaster response skills, such as fire safety, light search and rescue, team organization, and disaster medical operations. Using training learned in the classroom and during exercises, CERT volunteers can assist others in their community following a disaster when professional responders are not immediately available to help.

CERT volunteers are also encouraged to support emergency response agencies by taking an active role in emergency preparedness projects. Teen CERT training teaches you readiness and response skills. Hands-on practice and realistic exercises prepare you for the unexpected in your community.

Newly learned leadership skills empower you to safely respond to an emergency and assist victims without endangering yourself or others. You'll be equipped with skills that last a lifetime. [\[FEMA\]](#)

A69 – NFPA 1001 Firefighter I and Firefighter II Certification

Students enrolled in an academy recognized high school, career center, technical school program and members of out-of-state fire departments or brigades are eligible for certification only when it is offered as a part of the South Carolina Fire Academy (SCFA) in-state delivery system. This is done through the review of student records and must be completed as part of the registration process. Exceptions will be considered on a case-by-case basis and approved by the Training and Development Director or his designee. Requests by applicants from other International Fire Service Accreditation Congress (IFSAC) states or Pro Board states will be considered only if that state's entity is not accredited to the level requested. [\[SCFA\]](#)

A70 – The National Incident Management System Certifications

Training Program defines the National Incident Management System (NIMS) training program as it relates to the NIMS components of Preparedness, Communications and Information Management, Resource Management, and Command and Management. It specifies the National Integration Center (NIC) and stakeholder responsibilities and activities for developing, maintaining and sustaining NIMS training. The NIMS Training Program outlines responsibilities and activities that are consistent with the National Training Program, as mandated by the Post-Katrina Emergency Management Reform Act of 2006. This program integrates with Federal Emergency Management Agency (FEMA) training offered through the Emergency Management Institute (EMI) and United States Fire Administration (USFA). [\[FEMA\]](#)

A71 – S/P2 - Culinary Arts

S/P2 is the industry standards of awareness for comprehensive safety. The purpose of the certified program is to reduce the number of accidents in the classroom and in the workplace. Students can earn national certifications in S/P2 Culinary Food Safety, S/P2 Culinary Workplace Safety, Land That Job: Interview Skills for Culinary Students, Ethics in the Culinary Industry (Coming Soon). [\[S/P2\]](#)

A72 – S/P2 – Cosmetology

S/P2 is the industry standards of awareness for comprehensive safety. The purpose of this certified program is to reduce the number of accidents in the classroom and in the workplace. Students can earn national certifications in S/P2 Cosmetology, Land That Job: Interview Skills for Cosmetology Students, Ethics and YOU in the Cosmetology Industry. [\[S/P2\]](#)

A73 – Certified Medical Administrative Assistant

As a Certified Medical Administrative Assistant, CMAA (also called a Medical Office Secretary or Medical Office Assistant), you'll keep healthcare offices running efficiently and effectively. Medical assistants are often the first to greet and help patients, and can help set the stage for a patient's experience. Operate computer systems to accomplish office tasks, answer calls, schedule appointments, greet patients and maintain files.

Student instruction may take place during their senior year in high school but students cannot sit for this exam until they have graduated. For certification information please contact National Healthcareer Association or go to this link: [\[NHANOW\]](#)

A74 – Certified Billing and Coding Specialist

Billing and Coding Specialists have an expansive range of opportunities for employment. The skills learned through the NHA CBCS certification are essential to hospitals, physician offices, surgery centers, nursing homes, dental offices, home healthcare agencies, mental health facilities and even insurance companies and consulting firms. Students will learn to gather/review essential patient information, verify required documentation before patient information is released, prevent fraud/abuse by auditing billing, support coding and billing process, assign codes for diagnoses and procedures, and submit claims for reimbursement. Student instruction may take place during the student's senior year in high school but students may not sit for the exam until they have graduated. For certification information please contact National Healthcareer Association or go to this link: [\[NHANOW\]](#)

A75 – Certified Electronic Health Records Specialist

The security, completeness and accuracy of patient data are critical. In the healthcare industry, Electronic Health Records Specialists serve an important role, which is why most employers require a certification. The Certified Electronic Health Records Specialist (CEHRS) is a nationally-recognized credential that can set you apart. As an Electronic Health Records Specialist, you may perform some or all of the following tasks: audit patient records for compliance, abstract clinical information for reports, perform basic coding to submit reimbursement claims, process Release of Information (ROI) requests for medical records, review patient records to ensure completion and accuracy, collect patient demographic and insurance information, and discuss patient information with physicians and insurance professionals. Student instruction may take place during the student's senior year in high school but students may not sit for the exam until they have graduated. For certification information please contact National Healthcareer Association or go to this link: [\[NHANOW\]](#)

A76 – Career Safe OSHA 10-Hour General Industry (Healthcare) Credential:

This training is for entry level workers and employers on the recognition, avoidance, abatement, and prevention of safety and health hazards in workplaces in the healthcare industry. Students that complete the course will receive an industry recognized credential card from OSHA. [\[CSOSHA\]](#)

A77 – Business Office Technology

The Business Office Technology Certification endorsed by Express Employment Professionals provides students with a solid understanding of current and emerging technologies in today's workplace. In addition, the certification addresses major topics such as computers, operating systems and networking, telecommunications, business documents, web and business ethics and the Microsoft® Office Suite. The certification consists of 15 modules and a 100-question final certification exam. [\[ICEV\]](#)

A78 – Career Preparedness

The Career Preparedness Certification endorsed by Express Employment Professionals equips students with the skills necessary to thrive in a post-secondary or workplace environment. In addition, the certification addresses major topics such as higher learning, the job seeking process, financial literacy, workplace etiquette and the Microsoft® Office Suite. The certification consists of 23 modules and a 100-question final certification exam. [\[ICEV\]](#)

A79 – Food Safety and Science Certification

Endorsed by the American Meat Science Association, this certification provides students with an in-depth knowledge of food safety procedures and standards in the food industry. In addition, concepts such as chemical properties and processes, food handling and storage, food borne illnesses and principles of Hazard Analysis and Critical Control Points (HACCP) are covered. The certification is offered by iCEV Multimedia and consists of 18 modules and a 100 question final certification. [\[ICEV\]](#)

A80 – Plant Science Certification

Endorsed by Bayer CropScience, this certification provides students with a solid understanding of plant science, including plant processes, nutrition, genetics and evaluation. In addition, the certification addresses major topics in the plant science industry, including water resources and measurement, crop production, fertilizer and pesticide safety, pests and diseases, and scientific classification. The certification is offered through iCEV Multimedia and consists of 22 modules and a 100-question final certification exam. [\[ICEV\]](#)

A81 – Fundamentals of Animal Science Certification

Endorsed by Elanco, this certification provides students with a solid understanding of animal science, including the history and practices of the livestock industry as well as common terms and terminology and livestock management practices. In addition, the certification addresses major topics in the animal science industry, including genetics, reproduction, nutrition and health management. The certification is offered through iCEV Multimedia and consists of 18 modules and a 100-question final certification exam. [\[ICEV\]](#)

A82 – Principles of Floral Design Certification

Endorsed by Benz School of Floral Design, this certification requires students to display a thorough understanding of the principles, elements, geometry, and basic techniques used in floral design. In addition, students will become associated with the origins and history of floral design as well as be able to identify flowers and floral materials, design and create arrangements and understand the elements used in critiquing and appraising floral designs. The certification is offered through iCEV Multimedia. [\[ICEV\]](#)

A83 – Meat Evaluation Certification

Endorsed by the American Meat Science Association, this certification requires students to define the major factors utilized in carcass grading and evaluation. They are asked to display a thorough understanding of meat carcass quality grading, meat handling and food safety as well as the slaughter and fabrication process. The certification is offered through iCEV Multimedia and consists of 12 modules and a 100-question final certification exam. [\[ICEV\]](#)

A84 – Livestock Selection & Evaluation Certification

Endorsed by the National Collegiate Livestock Coaches Association, this certification requires students to identify and analyze livestock breeds and their external anatomy. They will also be expected to show understanding of selection criteria and major factors considered in livestock evaluation. The certification is offered through iCEV Multimedia. [\[ICEV\]](#)

A85 – The Southwest Airlines Professional Communications Certification

This certification focuses on teaching students the communication essentials to thrive in any workplace environment. Verbal and non-verbal communication skills are explored and discussed throughout the certification, and how those skills are utilized for a positive, successful experience in the workplace is analyzed. In addition to communication skills, other career-related concepts such as leadership styles, presentation strategies, conflict management, collaboration and English applications are covered in the certification lessons. The certification is offered by iCEV Multimedia and consists of 15 modules and a 100-question final certification exam. [\[ICEV\]](#)

A86 – The Veterinary Medical Applications Certification

Endorsed by Elanco, this certification provides students with a solid understanding of veterinary science and veterinary medical applications. In addition, the certification features demonstrations and materials from practicing veterinarians working with both small and large animals. The certification is offered by iCEV Multimedia and consists of 22 modules and a 100-question final certification exam. [\[ICEV\]](#)

A87 – Principles of Small Engine Technology Certification

Endorsed by the Equipment & Engine Training Council, this certification provides students with an in-depth knowledge of small engine technology and equips students with the fundamental skills necessary to pursue a career within this industry. Students seeking to earn this certification will have access to video demonstrations from industry professionals and specialists working within the field. The certification is offered by iCEV Multimedia and consists of 11 modules and a 100-question final certification exam. [\[ICEV\]](#)

A88 – Java Foundations Certified Junior Associate

The Oracle Academy course engages students with little programming experience. Students are introduced to object-oriented concepts, terminology, and syntax, and the steps required to create basic Java programs using hands-on, engaging activities. Students will learn the concepts of Java programming, design object-oriented applications with Java and create Java programs using hands-on, engaging activities. After taking the Java Foundations course students will be prepared to take the 1Z0-811: Java Foundations Exam which leads to the Oracle Java Foundation Certified Junior Associate certification. [\[ORACLE\]](#)

A89 – Database Foundations Certified Junior Associate

The Oracle Academy course introduces students to basic relational database concepts. The course teaches students relational database terminology, as well as data modeling concepts, building Entity Relationship Diagrams (ERDs), and mapping ERDs. Oracle SQL Developer Data Modeler is utilized to build ERDs and the Structured Query Language (SQL) is used to interact with a relational database and manipulate data within the database.

Oracle Application Express is utilized to provide practical, hands-on, engaging activities. Leveraging project-based learning techniques, students will create and work with projects which challenge them to design, implement, and demonstrate a database solution for a business or organization. After taking the Database Foundations course students will be prepared to take the 1Z0-006: Oracle Database Foundations Exam which leads to the Database Foundations Certified Junior Associate Certification. [\[ORACLE\]](#)

A90 – Oracle Certified Associate, Java SE8 Programmer

The Oracle Academy course of study builds on the skills gained by students in the Java Foundations class and helps to advance Java programming skills. Students will design object-oriented applications with Java and will create Java programs using hands-on, engaging activities. After taking the Java Programming course students will be prepared to take the 1Z0-803: Oracle Java SE8 Programming 1 Exam which leads to the Oracle Certified Associate, Java SE 8 Programmer Certification. [\[ORACLE\]](#)

A91 – Database Design & Programming with SQL

The Oracle Academy course engages students to analyze complex business scenarios and create a data model—a conceptual representation of an organization’s information. Participants implement their database design by creating a physical database using SQL. Basic SQL syntax and the rules for constructing valid SQL statements are reviewed. This course culminates with a project that challenges students to design, implement, and demonstrate a database solution for a business or organization. After taking the Database Design & Programming with SQL course students will be prepared to take the 1Z0-071: Oracle Database Exam which leads to the Oracle Database Certified Associate Certification. [\[ORACLE\]](#)

A92 – Programming with PL/SQL

The Oracle Academy course introduces students to PL/SQL, Oracle’s procedural extension language for SQL and the Oracle relational database. Participants explore the differences between SQL and Procedural Language (PL) PL/SQL. They also examine the characteristics of PL/SQL and how it is used to extend and automate SQL to administer the Oracle database. This course culminates with a project that challenges students to program, implement, and demonstrate a database solution for a business or organization. After taking the Programming with PL/SQL course students will be prepared to take the 1Z0-144: Oracle Database Programming with PL/SQL Exam which leads to the Oracle Database PL/SQL Developer Certified Associate Certification. [\[ORACLE\]](#)

A93 – Healthcare Providers Basic Life Support (BLS)

Basic Life Support (BLS) training reinforces healthcare professionals' understanding of the importance of early CPR and defibrillation, basic steps of performing CPR, relieving choking, and using an AED; and the role of each link in the Chain of Survival. BLS - Instructor-Led Training. The BLS Instructor-led course teaches both single-rescuer and team basic life support skills for application in both prehospital and in-facility environments, with a focus on High-Quality CPR and team dynamics. The BLS Course trains participants to promptly recognize several life-threatening emergencies, give high-quality chest compressions, deliver appropriate ventilations and provide early use of an Automated External Defibrillator (AED). In the Instructor-led course, students participate in simulated clinical scenarios and learning stations. Students work with an American Heart Association (AHA) BLS Instructor to complete BLS skills practice and skills testing. Students also complete a written exam. [\[BLS\]](#)

A94 – Microburst EmployABILITY Soft Skills Certification

Employers require their workforce to demonstrate soft skills in order to be an effective team member in the business/industry environment. Based on over 30 years of soft skills training in the global private business sector, the Microburst Learning Soft Skills certification program cultivates students' soft skills by directly reengineering it from the business world to the world of education. The blended learning approach includes on-line pre-assessments with individualized evaluation reports, highly interactive online lessons, program instructor certification, comprehensive instructor guides with flexible classroom activities to meet a variety of schedules and class sizes, post-assessments, and student certification. With completion of all on-line modules, along with face-to-face classroom instruction and group activities, each completer receives the Employer's Choice Certification. The EmployABILITY Soft Skills certificate program is supported and promoted by SC Future Makers, STEM Premier, SC Manufacturing Alliance, SC Chamber of Commerce, Mechanical Contractor's Association of South Carolina and the SCDE. This soft skills certification is in alignment with the Profile of the SC Graduate. [MICROBURST]

Certification Year 1 – Certification Year 10

The **Certification Year** fields indicate the semester and year in which the student received national and state certifications and credentials. For school year 2017-18 the entry would be **FA17** if the certification or credential was received in the fall of 2017 or **SP18** if the student received the certification or credential in the spring of 2018.

- ▶ **Data Entry** (dropdown box): appropriate semester and year

Note: The **Certification Year** fields replace the Certification Date fields. The Certification Date fields will remain visible (grayed out) on the page in "View Only" mode.

CTSO Membership 1 – CTSO Membership 2

NEW

Members of Career and Technical Student Organizations (CTSOs) have opportunities to enhance their professional, leadership, and technical skills through intra/co-curricular programs and services. The **CTSO Membership** fields should be used to identify the CTSO in which the student holds membership.

- ▶ **Data Entry** (dropdown box)

Blank = [default]

01 – BPA

02 – DECA

03 – FBLA

04 – FCCLA

05 – FFA

06 – Educators Rising

07 – HOSA

08 – SkillsUSA

09 – TSA

CATE Placement Code

School districts and career centers are required by South Carolina law (S.C. Code Ann. § 59-53-1960) and by State Board of Education Regulation 43-234 to survey their CATE completers ten months after graduation to determine their placement status with regard to employment, postsecondary education, or military service. A record of the responses to this survey must be maintained by the districts/career centers for a period of three years. The survey records should contain sufficient information to allow for the verification of all reported placements.

In order to be available for placement, students must be program completers and must have graduated.

- ▶ **Data Entry** (dropdown box): appropriate CATE placement code

- A** – Employed, Related
- B** – Employed, Unrelated
- C** – Continuing Education or Postsecondary Education
- D** – Military
- E** – Unemployed or Not Seeking Employment
- F** – Not Available for Placement (Status Unknown, Deceased, Incarcerated, or Medical Disability)
- G** – Still in High School

Placement Information Necessary for Verification

- ▶ For students placed in **employment (placement code A or B)**

Placement Employer

Entry: name of the company (35-character limit) where the student was placed after graduation

Placement Phone

Entry: phone number (15-character limit) of the student's employer

Placement Job Title

Entry: title of the job (25-character limit) in which the student was placed after graduation

Placement Supervisor Name

Entry: name of the supervisor (25-character limit) within the company where the student was placed after graduation

Placement Start Date

Entry: student's start date for placement in employment after graduation

- For students placed in **higher education (placement code C)**

Placement Higher Ed Name

Entry: name of the postsecondary institution (25-character limit) the student attended after graduation

Placement Higher Ed Program

Entry: name of the program (25-character limit) at the postsecondary institution to which the student was admitted

- For students placed in **military (placement code D)**

Placement Military Branch

Entry: name of the military branch (30-character limit) in which the student enlisted after graduation

Placement Military Training

Entry: name of the type of military training (25-character limit) the student received from the military branch in which he or she enlisted after graduation

Placement data are used to assess the placement indicator required by Perkins IV and the career center report card measure for placement. As mandated in Section 59-53-1960 of the Code of Laws of South Carolina, to continue existing work force preparation programs, other than career and technology agriculture, fifty percent of the graduates available for placement must be placed during the prior three years in the area for which training was provided. The placement data reported each school year is compiled with the data reported for the previous two years to obtain the average placement rate over the three-year period.

Students must be advised prior to enrollment in a work force preparation program of the possible discontinuation of the program and of the employment outlook for program graduates. Students enrolling in CATE programs that are not preparatory for employment must be clearly advised of this fact by the school district.

Data Extracted from Other PowerSchool Pages

(For Reporting Purposes)

Individuals with Disabilities

The data for this special population will be extracted from the **Instructional Setting** field located on the South Carolina Additional Student Information Page. The **Instructional Setting** field indicates that the student is currently receiving special education services and has an Individualized Education Program (IEP) in effect.

English Proficient

The data for this special population will be extracted from the **English Prof** field located on the Additional Student Information Page. The **English Prof** field indicates the student's proficiency level in English.

Migrant

The data for this special population will be extracted from the **Migrant** field located on the Additional Student Information Page. Migrant status is based upon the following definition:

A migratory student is a student who is, or whose parent, spouse, or guardian is, a migratory agricultural worker, including a migratory dairy worker, or a migratory fisher, and who, in the preceding 36 months, in order to obtain, or accompany such parent or spouse in order to obtain temporary or seasonal employment in agricultural or fishing work: has moved from one school district to another; or in a State that is comprised of a single school district, has moved from one administrative area to another within such district; or resides in a school district of more than 15,000 square miles, and migrates a distance of 20 miles or more to a temporary residence to engage in a fishing activity.

Diploma Earned

The **Diploma Earned** field indicates if the student received a state diploma and is located on the South Carolina Student Information page.

PowerSchool Scheduling Sections Page

District Where Taught and School Where Taught

All sections of each particular CATE course taught at a location other than the student's home high school (e.g., career center) must have the other school's seven-digit school identification number (SIDN, sometimes referred to as the BEDS code). Accurate SIDN numbers will allow the career center or other school to be identified as teaching the particular course(s).

- **Data Entry:** **first four digits** of the seven-digit center SIDN in **District Where Taught** and the **last three digits** of the center SIDN in **School Where Taught**

Example: Chloe Charles is a student at Motteville High School (school SIDN – 0102003) and attends Granby Oats Career and Technology Center (school SIDN – 0102995) where she is enrolled in SAS Programming 1 taught by teacher Beverly Mitchell.

On the Sections Page for the SAS Programming (532700CW) course taught by Beverly Mitchell the **District Where Taught** field would have the entry of **0102** and the **School Where Taught** field would have the entry of **995** which would identify that the courses are taught at the career and technology center and not at the high school.

PowerSchool

Welcome, Shawn Larrimore | Help | Sign Out

School: Test High School Term: 16-17 Year

Start Page > School Setup > 102101HW Introduction to Engineering Design > Edit Section

Edit Section

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School Where Taught (Enter School ID If Taught At Different School. Otherwise, Leave Blank.)																																									

Section Number*

Grade Level

Current Enrollment

Maximum Enrollment

District Where Taught
(Enter District ID If Taught At Different District. Otherwise, Leave Blank.)

School Where Taught
(Enter School ID If Taught At Different School. Otherwise, Leave Blank.)

Data Collection and Submission Notes

- ❖ Ensure that the appropriate **CIP Code** has been selected from the drop-down box. A listing of CIP Codes can be found in Appendix C.
- ❖ Ensure that the **Concentrator** field is correctly coded.
- ❖ Ensure that the **Completer** field is correctly coded.
- ❖ Ensure that the **Diploma Earned** field has been completed for all twelfth-grade students on the Student Supplemental Page.
- ❖ Ensure that the correct placement code has been entered in the **CATE Placement** field for each prior-year completer when doing student placement follow-up.
- ❖ Ensure that the seven-digit school identification number (SIDN) is correctly entered in the **Remote** field to identify location of the CATE program (if applicable).
- ❖ Ensure that all sections of each CATE course taught at a location other than the student's home high school have the first four digits of SIDN entered in the **District Where Taught** and the last three digits of the SIDN entered in the **School Where Taught** field. Accurate SIDN numbers will allow the other location to be identified as teaching the particular course(s). Also, make sure each CATE course has been assigned an approved course code from the listing in Appendix C.
- ❖ **GED** – Districts have an opportunity to submit by September 1 a listing of high school-aged students who have completed the requirements to receive a GED credential.

The district technology contact responsible for submitting PowerSchool data to the SCDE plays an important role in the data-collection process. The following are basic instructions with regard to the collection and reporting of CATE data:

- A. Verify final grades before running the SWEET query to submit data to the SCDE.
- B. Perform a data record check while you are submitting the data to the SCDE through SWEET query to ensure that your datasets are complete. If “0” records are transmitted, the SCDE has received no data.
- C. Use only **uppercase** letters for academic and unit tags. Though the PowerSchool system is not case sensitive, other systems utilized by SCDE offices to analyze the data received *are* case sensitive. **Your failure to use uppercase letters for academic and unit tags may result in inaccurate data.**
- D. Submit your CATE data on or before the deadlines:

Placement Follow-up Report April 16, 2018

End-of-the-Year Report Fourth Quarterly Data Collection (QDC 4)

Please be reminded that the queries for submitting data to the SCDE will not be available after these dates.

PowerSchool Searches

The following searches have been created by the Office of Research and Data Analysis, PowerSchool Administration staff to assist you in verifying the accuracy of your data using the Quick Export function: **Start Page > Special Functions > Importing & Exporting > Quick Export**.

You may copy/paste the following data export layouts to verify PS CATE data or you may select individual fields via the “Fields” link to list the data you wish to export. Please remember to use **ONLY** approved course codes and CIP codes.

PowerSchool Export Layouts to Aid in the Validation of CATE Data

Start Page > Special Functions > Importing & Exporting > Quick Export

Quick Export

Export the 1664 selected students

SC_CATE_CIPCode
SC_CATE_ConcIntrInd
SC_CATE_CompleterInd
SC_CATE_YrCompleted
SC_CATE_RemoteSchCode
SC_DiplomaEarnCode

Data Export Layout

Field Delimiter: Tab

Record Delimiter: CR

☐ "Surround Fields" ☒ Column titles on 1st row

☐ Export DCID

Fields

Submit

To work with subsets of the Student database, please use selection criteria on the student start page.

Functions

Attendance
Daily Bulletin
Enrollment Summary
Master Schedule
Dashboard
Special Functions
Teacher Schedules

Reports

System Reports
ReportWorks

Start Page

Students Staff Parents District Search

SC_CATE_ConcIntrInd=Y

Advanced View Field List View Function List [?]

A B C D E F G H I J K L M N O P Q R S T U V W X Y Z

PK3 PK4 K 1 2 3 4 5 6 7 8 9 10 11 12 M F All Stored Searches Stored Selections Multi Select

Inactive Students Transferred Out Graduated Students Pre-Enrolled (All Years)

The resulting data file may be saved, copied/pasted into or opened by Microsoft Excel for better viewing and sorting.

1. CIP Code Export Layout

Save the exported file “student.export.text” as “all files” and use the Excel wizard to set up the column headings, etc. in order to review/verify the records.

Quick Export

The screenshot shows the 'Quick Export' interface. At the top, it says 'Export the 1 selected students'. Below this is a list of fields: SchoolID, Last_Name, First_Name, Middle_Name, Grade_Level, SC_CATE_CIPcode, and SC_CATE_ConcetrInd. To the right of the list are two dropdown menus: 'Field Delimiter' set to 'Tab' and 'Record Delimiter' set to 'CR'. Below these are two checkboxes: 'Surround Fields' (unchecked) and 'Export DCID' (unchecked). A checked checkbox 'Column titles on 1st row' is also present. At the bottom right is a 'Submit' button. Below the main form is a confirmation dialog box that says 'Do you want to open or save student.export.text from 10.86.53.36?' with 'Open', 'Save', and 'Cancel' buttons.

2. Graduation Export (Initial filter “grade_level=12”)

SchoolID
Last_Name
First_Name
Middle_Name
Grade_Level
SC_DiplomaEarnCode
SC_Diploma_Type

3. Program Completers Export (Initial filter “SC_CATE_CompleterInd=Y”)

SchoolID
Last_Name
First_Name
Middle_Name
Grade_Level
SC_CATE_CIPcode
SC_CATE_CompleterInd
SC_CATE_YrCompleted
SC_CATE_RemoteSchCode
SC_Diploma_Type

4. **CATE Placement Export**
(Initial filter “Grade_Level=12”; “SC_CATE_CompleterInd=Y”)
SchoolID
Last_Name
First_Name
Middle_Name
Grade_Level
SC_CATE_CIPcode
SC_CATE_CompleterInd
SC_CATE_YrCompleted
SC_CATE_RemoteSchCode
SC_DiplomaEarnCode
SC_Diploma_Type
SC_CATE_PlaceLevelCode

5. **Special Populations Export**
SchoolID
Last_Name
First_Name
Middle_Name
Grade_Level
SC_CATE_CIPcode
SC_CATE_SingleParentInd
SC_CATE_DisplHomeMakerInd
SC_Engl_Prof
SC_Migrant
LunchStatus

PowerSchool DDE Tool

The DDE tool can be used to export data from multiple tables.

CATE Teacher/Course List Export

The screenshot shows the PowerSchool Direct Database Export (DDE) interface. The top navigation bar includes the PowerSchool logo, user information (Welcome, Shawn Larrymore), and links for Help and Sign Out. The breadcrumb trail indicates the path: Start Page > System Administrator > Page and Data Management > Direct Database Export (DDE). The left sidebar contains a menu with categories: Functions (Attendance, Daily Bulletin, Enrollment Summary, Master Schedule, Dashboard, Special Functions, Teacher Schedules), Reports (System Reports, ReportWorks), and People (Student Search, Staff Search, Parent Search, Enroll New Student, New Staff Entry, New Parent Entry). The main content area is titled 'Direct Database Export (DDE)'. It features a 'Current Table' dropdown menu set to 'Sections (3)', a 'Current Records in Selection' field showing 0, and a 'Search Sections' section with two search criteria fields. A button 'Select all 10885 records in this table' is located on the right. At the bottom, there are two buttons: 'Search all 10885 records in this table' and 'Search within the current 0 records only'.

1. Begin with the SECTIONS table [03]. The initial “search sections” criteria is: TermID >=XXXX (designated numeric 4-digit TermID)

TermID	Year Designation
1900	2009-2010
2000	2010-2011
2100	2011-2012
2200	2012-2013
2300	2013-2014
2400	2014-2015
2500	2015-2016
2600	2016-2017

2. Secondary “search sections” criteria are, for example,:
 - a. Course_Number >= 49990000
 - b. Course_Number <= 6999ZZZZ
3. Search within the current # records only
 - a. SchoolID
 - b. Teacher
 - c. [05]LastFirst
 - d. Course_Number
 - e. [02]Course_Name

Course/Teacher Location Export

Begin with the SECTIONS table [03]. The initial “search sections” criteria is: TermID >= XXXX (designated numeric 4-digit TermID).

TermID	Year Designation
1900	2009-2010
2000	2010-2011
2100	2011-2012
2200	2012-2013
2300	2013-2014
2400	2014-2015
2500	2015-2016
2600	2016-2017

Multiple Courses Export

Utilizing DDE, begin with the STORED GRADES table [31] for each of the following six (6) Course_Number criteria.

1. Search StoredGrades Criteria:

TermID >=XXXX
Course_Number=5100@

Export Records layout:

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level
[31]Course_Number
[31]Course_Name
[31]EarnedCrHours
[31]Teacher_Name

TermID	Year Designation
1800	2008-2009
1900	2009-2010
2000	2010-2011
2100	2011-2012
2200	2012-2013
2300	2013-2014
2400	2014-2015
2500	2015-2016

2. Search StoredGrades Criteria:

TermID >= XXXX
Course_Number=5030@

Export Records layout:

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level
[31]Course_Number

[31]Course_Name
[31]EarnedCrHours
[31]Teacher_Name

3. **Search StoredGrades Criteria:**

TermID >= XXXX
Course_Number=5122@

Export Records layout:

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level
[31]Course_Number
[31]Course_Name
[31]EarnedCrHours
[31]Teacher Name

4. **Search StoredGrades Criteria:**

TermID >= XXXX
Course_Number=5400@

Export Records layout:

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level
[31]Course_Number
[31]Course_Name
[31]EarnedCrHours
[31]Teacher_Name

TermID	Year Designation
1800	2008-2009
1900	2009-2010
2000	2010-2011
2100	2011-2012
2200	2012-2013
2300	2013-2014
2400	2014-2015
2500	2015-2016

5. **Search StoredGrades Criteria:**

TermID >= XXXX
Course_Number=5031@

Export Records layout:

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level

[31]Course_Number
[31]Course_Name
[31]EarnedCrHours
[[31]Teacher_Name

6. Search StoredGrades Criteria:

TermID >= XXXX
Course_Number=5033@

Export Records layout

[01]SchoolID
[01]Last_Name
[01]First_Name
[01]Middle_Name
[01]Grade_Level
[31]Course_Number
[31]Course_Name
[31]EarnedCrHours
[31]Teacher_Name

OCTE Contact Information

Area (Administration Team)	Contact
▸ Administration Team Lead ▸ Report Card Ratings and Measures ▸ Perkins Accountability Indicators	N. Maria Swygert 803-734-8456 nmswyger@ed.sc.gov
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› Arts, Audio-Video Technology and Communications › Education and Training › Hospitality and Tourism › Human Services/Family and Consumer Sciences › Science, Technology, Engineering and Mathematics	<i>Vacant</i>
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Appendix A

Perkins Accountability Indicators

Key Terms

The federal Perkins Act requires each state to establish accountability indicators. The following are explanations of the terms used in South Carolina's state plan to define the populations measured and descriptions of the accountability indicators:

- ❖ **Participant:** A participant is a secondary student enrolled in a state-approved CATE course.
- ❖ **Concentrator:** A concentrator is a secondary student with an assigned CIP (Classification of Instructional Programs) code who has earned 3 Carnegie units of credit in a state-recognized CATE program. CIP codes designate specific CATE programs and are used for federal reporting and assessing the Perkins accountability indicators for CATE programs. A state-recognized CATE program must be comprised of an approved sequence of career and technology education courses leading to a career goal and must include a minimum of 3 Carnegie units of credit.
- ❖ **Completer:** A completer is a concentrator who has earned all of the required units in a state-recognized CATE program identified by the assigned CIP code.

Measurement Definitions

1S1 ACADEMIC ATTAINMENT – READING/LANGUAGE ARTS

► Formula

Numerator = total number of 12th-grade concentrators who scored proficient or advanced on the English language arts assessment, as reported for ESEA/ESSA

Denominator = total number of 12th-grade concentrators in the reporting year who were included in the previous year's computation used by the state for high school academic attainment in English language arts, as reported for ESEA/ESSA

1S2 ACADEMIC ATTAINMENT – MATHEMATICS

► Formula

Numerator = total number of 12th-grade concentrators who scored proficient or advanced on the mathematics assessment, as reported for ESEA/ESSA

Denominator = total number of 12th-grade concentrators in the reporting year who were included in the previous year's computation used by the state for high school academic attainment in mathematics, as reported for ESEA/ESSA

2S1 TECHNICAL SKILL ATTAINMENT**► Formula**

Numerator = total number of concentrators who completed a CATE program and who passed technical skill assessments that are aligned with industry-recognized standards, if available and appropriate, during the reporting year plus concentrators who completed and achieved a final GPA of at least 2.0 averaged over the year for all the CATE courses taken during the year for those program areas that do not have other valid and reliable assessments

Denominator = total number of concentrators who completed a CATE program

3S1 SCHOOL COMPLETION**► Formula**

Numerator = total number of 12th grade concentrators who completed a CATE program and who attained a South Carolina high school diploma, or a GED

Denominator = total number of 12th grade concentrators who completed a CATE program

4S1 STUDENT GRADUATION RATES**► Formula**

Numerator = total number of CATE concentrators who, in the reporting year, were included as graduated in the State's computation of its graduation rate as defined in SC's Consolidated Accountability Plan

Denominator = total number of CATE concentrators who, in the reporting year, were included in the State's computation of its graduation rate as defined in SC's Consolidated Accountability Plan

5S1 PLACEMENT**► Formula**

Numerator = total number of concentrators who completed a CATE program and who are placed in postsecondary education, military service, or employment, averaged over a three-year period

Denominator = total number of concentrators who completed a CATE program and are available for placement, averaged over a three-year period

6S1 NONTRADITIONAL PARTICIPATION**► Formula**

Numerator = total number of concentrators of the underrepresented gender enrolled in CATE programs identified as leading to nontraditional training and employment

Denominator = total number of concentrators enrolled in CATE programs identified as leading to nontraditional training and employment

6S2 NONTRADITIONAL COMPLETION**► Formula**

Numerator = total number of 12th grade concentrators of the underrepresented gender who completed CATE programs identified as leading to nontraditional training and employment

Denominator = total number of 12th grade concentrators of the underrepresented gender enrolled in CATE programs identified as leading to nontraditional training and employment

Appendix B

CATE Report Card Measures

Report Card Measures and Indicators have not been determined yet for the **2017-18** school year. Contact Maria Swygert at 803-734-8456 regarding report card information.

Appendix C

CATE Clusters, Program, and Courses

Career Clusters

Career Clusters are groupings of occupations and broad industries based on commonalities that provide a vital framework for organizing and delivering quality CATE programs through learning and comprehensive programs of study. They also guide in developing programs of study bridging secondary and postsecondary curriculum and for creating individual student plans of study for a complete range of career options. Career clusters link what students learn in high school with the knowledge and skills they need for success in college and careers. This connection to future goals motivates students to work harder and enroll in more rigorous courses.

As such, it helps students discover their interests and their passions, and empowers them to choose the educational pathway that can lead to success in high school, college and career. In total, there are 16 Career Clusters representing more than 79 Career Pathways to help students navigate their way to greater success in college and career. The sixteen clusters represent all career possibilities:

- ❖ Agriculture, Food and Natural Resources
- ❖ Architecture and Construction
- ❖ Arts, Audio-Video Technology and Communications
- ❖ Business Management and Administration
- ❖ Education and Training
- ❖ Finance
- ❖ Government and Public Administration*
- ❖ Health Science
- ❖ Hospitality and Tourism
- ❖ Human Services/Family and Consumer Sciences
- ❖ Information Technology
- ❖ Law, Public Safety, Corrections and Security
- ❖ Manufacturing
- ❖ Marketing
- ❖ Science, Technology, Engineering and Mathematics
- ❖ Transportation, Distribution and Logistics

All descriptions of cluster content in this section are taken with minor editorial emendations from the States' Career Clusters Web page. Please refer to www.careertech.org for additional information.

***No CATE courses are assigned to this career cluster.**

CATE Code Descriptions

Course ID

- ❖ The eight characters used to identify each instructional activity.

The first four characters are the digits that make up the course code. The fifth and sixth characters are digits that are district defined. One of three different characters will occupy the seventh position: either the alpha character that represents the academic tag for credit-bearing courses, or the numeric 0, or the digit that represents the special education activity instructional approach. One of three different characters will occupy the eighth position: either the alpha character that represents the unit tag for credit-bearing courses or the numeric 0, or the digit that represents a specific instruction area. Use only **uppercase** characters for academic and unit tags.

Course Code

- ❖ The first four digits of the course ID.

Valid CATE courses and codes can be found beginning on page 60 of this section. Codes for the state-approved courses are used for the Perkins accountability indicators and report card measures and indicators. Perkins funds may be used to improve state-approved CATE courses with the exception of work-based credit courses. Courses with Local Board Approved (LBA) in the title are not valid CATE course codes for state and federal accountability and funding purposes.

New Innovative Courses

- ❖ Unique courses representing emerging areas of study that are not included in the CATE state approved course offerings. OCTE approval is required before a CATE course code is assigned. The new innovative application must be completed and submitted for OCTE approval by **January 31st** of each year. Once the innovative application has been approved by OCTE staff, notification will be sent to the school district with the assigned course code.

Renewal Innovative Courses

- ❖ A continuation of approved unique courses representing emerging areas of study that are not included in the CATE state approved course offerings. Approval will be granted for a maximum of five (5) years. After the period of five (5) years, the course should be reviewed for state approval status or local board approval status.

The **New CATE Innovative and Renewal Course Application** instructions can be found at: <http://ed.sc.gov/agency/programs-services/152/>

Work-Based Learning Courses

- ❖ Work-Based Learning Courses (credit bearing) are structured, stand-alone courses that are taken in addition to other CATE courses that make up a CATE CIP-coded program. Each Work-Based Learning Course (credit bearing) has an assigned CATE course code, and guidelines must be followed in order to award the Carnegie unit of credit upon successful completion of the course. Only one unit of work-based learning credit may be awarded toward CATE completer status. Reference the Work-Based Learning document located at: <http://ed.sc.gov/agency/ac/Career-and-Technology-Education/Program-Support/>.

CATE Program

- ❖ A state-recognized CATE program must be composed of an approved sequence of career and technology education courses leading to a career goal. Students must earn **all** of the required units of credit to be considered CATE program completers.

CIP Code

- ❖ The six-digit CIP (Classification of Instructional Programs) codes designate the specific CATE programs and are used for federal reporting and assessing the federal Perkins indicators. Every student identified as a CATE concentrator must be assigned a CIP code approved by the OCTE. **CIP codes are *not* the same as course codes.**

Approved Three-Unit Programs

Cluster	CIP Code	Program
Arts/AV Technology & Communication	500407 500408	Fashion Design and Apparel Construction Interior Design
Business Management and Administration	520401 521206 520201 521001 520204	Administrative Services Business Information Management General Management Human Resources Management Operations Management
Finance	520301 520801 520803 520804 521701 520807	Accounting Academy of Finance Banking Business Finance Insurance Securities and Investment
Health Science	260102 510999 510706 510000 310505	Biomedical Sciences – PLTW EMS Health Informatics Health Science Sports Medicine
Hospitality and Tourism	520905 520904	Culinary Arts Management Hospitality and Tourism Management
Human Services	190101 120410	Family and Consumer Sciences Nail Technology
Information Technology	151202 110901 110201 110801	Information Support and Services Networking Systems Programming and Software Development Web and Digital Communications
Law, Public Safety, Corrections & Security	430203 430107	Emergency & Fire Management Services Law Enforcement Services
Marketing	090903 521401 521402 521802 521804	Marketing Communications Marketing Management Marketing Research Merchandising Professional Sales
STEM	190501	Food Science

Agriculture, Food, and Natural Resources

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.

Course Code	Course Title
5600	Agribusiness and Marketing
5691	Agricultural and Biosystems Science
5614	Agricultural Crop Production and Management
5660	Agricultural Mechanics and Technology
5604	Agricultural Mechanics and Technology for the Workplace 1
5605	Agricultural Mechanics and Technology for the Workplace 2
5610	Agricultural Power Mechanics
5624	Agricultural Science and Technology
5620	Agricultural Science and Technology for the Workplace
5611	Agricultural Structural Mechanics
5603	Animal Science
5608	Animal Science for the Workplace 1
5609	Animal Science for the Workplace 2
5663	Aquaculture
5692	Biosystems Mechanics and Engineering
5695	Biosystems Technology 3
5696	Biosystems Technology 4
5693	Biosystems Technology Career Development 1
5694	Biosystems Technology Career Development 2
5646	Cattle Production
5626	Environmental and Natural Resources Management
5628	Environmental and Natural Resources Management for the Workplace 1
5629	Environmental and Natural Resources Management for the Workplace 2
5679	Equine Science
5621	Equipment Operation and Maintenance
5647	Farm Animal Production
5634	Floriculture
5657	Food Processing
5642	Forestry
5667	Golf Course Technology
5652	Horticulture for the Workplace 1
5653	Horticulture for the Workplace 2
5650	Introduction to Horticulture
5613	Introduction to Veterinary Science
5670	Landscape Technology
5672	Nursery, Greenhouse, and Garden Center Technology
5602	Outdoor Recreation
5612	Small Animal Care
5627	Soil and Water Conservation
5630	Soils and Soilless Research
5655	Sports Turf Management
5654	Turf and Lawn Management

5674	Wildlife Management
5690	Agriculture, Food and Natural Resources, work-based credit
5699	Agriculture, Food and Natural Resources, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
010205	Agricultural Mechanics and Technology
140301	Biosystems Engineering Technology
030101	Environmental and Natural Resources Management
010601	Horticulture
011101	Plant and Animal Systems

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program.*

All of the Agriculture, Food, and Natural Resources CIP-coded programs require a minimum of four (4) Carnegie units.

Agricultural Mechanics and Technology

010205

Agribusiness and Marketing
Agricultural and Biosystems Science
Agricultural Mechanics and Technology
Agricultural Mechanics and Technology for the Workplace 1
Agricultural Mechanics and Technology for the Workplace 2
Agricultural Power Mechanics
Agricultural Science and Technology
Agricultural Science and Technology for the Workplace
Agricultural Structural Mechanics
Biosystems Mechanics and Engineering
Equipment Operation and Maintenance
Soil and Water Conservation
Agriculture, Food and Natural Resources, work-based credit

Biosystems Engineering Technology

140301

Agricultural and Biosystems Science
Biosystems Technology 3
Biosystems Technology 4
Biosystems Technology Career Development 1
Biosystems Technology Career Development 2
Biosystems Mechanics and Engineering
Agriculture, Food and Natural Resources, work-based credit

Environmental and Natural Resources Management

030101

Agricultural and Biosystems Science
Agricultural Mechanics and Technology
Agricultural Science and Technology
Agricultural Science and Technology for the Workplace
Aquaculture
Biosystems Mechanics and Engineering
Environmental and Natural Resources Management
Environmental and Natural Resources Management for the Workplace 1
Environmental and Natural Resources Management for the Workplace 2
Equipment Operation and Maintenance
Forestry
Outdoor Recreation
Soil and Water Conservation
Soils and Soilless Research
Wildlife Management
Agriculture, Food and Natural Resources, work-based credit

Horticulture

010601

Agribusiness and Marketing
Agricultural and Biosystems Science
Agricultural Mechanics and Technology
Agricultural Science and Technology
Agricultural Science and Technology for the Workplace
Biosystems Mechanics and Engineering
Equipment Operation and Maintenance
Floriculture
Golf Course Technology
Horticulture for the Workplace 1
Horticulture for the Workplace 2
Introduction to Horticulture
Landscape Technology
Nursery, Greenhouse, and Garden Center Technology
Soils and Soilless Research
Sports Turf Management
Turf and Lawn Management
Agriculture, Food and Natural Resources, work-based credit

Plant and Animal Systems

011101

Agribusiness and Marketing
Agricultural and Biosystems Science
Agricultural Crop Production and Management
Agricultural Mechanics and Technology
Agricultural Science and Technology
Agricultural Science and Technology for the Workplace
Animal Science
Animal Science for the Workplace 1
Animal Science for the Workplace 2
Aquaculture
Biosystems Mechanics and Engineering
Cattle Production
Equine Science
Equipment Operation and Maintenance
Farm Animal Production
Food Processing
Introduction to Veterinary Science
Small Animal Care
Soil and Water Conservation
Soils and Soiless Research
Agriculture, Food and Natural Resources, work-based credit

Architecture and Construction

Careers in designing, planning, managing, building, and maintaining the built environment.

Course Code	Course Title
6060	Building Construction Cluster 1
6061	Building Construction Cluster 2
6062	Building Construction Cluster 3
6063	Building Construction Cluster 4
6080	Cabinetmaking 1
6081	Cabinetmaking 2
6082	Cabinetmaking 3
6083	Cabinetmaking 4
6091	Carpentry 1
6092	Carpentry 2
6093	Carpentry 3
6094	Carpentry 4
6287	Electricity 1
6288	Electricity 2
6289	Electricity 3
6290	Electricity 4
5330	Home Systems Technology
6003	HVAC Technology 1
6004	HVAC Technology 2
6005	HVAC Technology 3
6006	HVAC Technology 4
6001	Introduction to Construction
6250	Masonry 1
6251	Masonry 2
6252	Masonry 3
6253	Masonry 4
6280	Plumbing 1
6281	Plumbing 2
6282	Plumbing 3
6283	Plumbing 4
6690	Architecture and Construction, work-based credit
6299	Architecture and Construction, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
460000	Building Construction Cluster
480703	Cabinetmaking
460201	Carpentry
460301	Electricity
470201	HVAC Technology
460101	Masonry
460503	Plumbing

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program.*

All of the Architecture and Construction CIP-coded programs require a minimum of four (4) Carnegie units.

Building Construction Cluster **460000**

Introduction to Construction
Building Construction Cluster 1
Building Construction Cluster 2
Building Construction Cluster 3
Building Construction Cluster 4
Architecture and Construction, work-based credit

Cabinetmaking **480703**

Introduction to Construction
Cabinetmaking 1
Cabinetmaking 2
Cabinetmaking 3
Cabinetmaking 4
Architecture and Construction, work-based credit

Carpentry **460201**

Introduction to Construction
Carpentry 1
Carpentry 2
Carpentry 3
Carpentry 4
Architecture and Construction, work-based credit

Electricity **460301**

Introduction to Construction
Electricity 1
Electricity 2
Electricity 3
Electricity 4
Architecture and Construction, work-based credit

HVAC Technology**470201**

Introduction to Construction
HVAC Technology 1
HVAC Technology 2
HVAC Technology 3
HVAC Technology 4
Architecture and Construction, work-based credit

Masonry**460101**

Introduction to Construction
Masonry 1
Masonry 2
Masonry 3
Masonry 4
Architecture and Construction, work-based credit

Plumbing**460503**

Introduction to Construction
Plumbing 1
Plumbing 2
Plumbing 3
Plumbing 4
Architecture and Construction, work-based credit

Arts, Audio-Video Technology, and Communications

Designing, producing, exhibiting, performing, writing, and publishing multimedia content including visual and performing arts and design, journalism, and entertainment services.

Course Code	Course Title
6170	Architectural Design 1
6171	Architectural Design 2
6120	Digital Art and Design 1
6121	Digital Art and Design 2
6122	Digital Art and Design 3
6123	Digital Art and Design 4
5710	Fashion Design and Apparel Construction 1
5711	Fashion Design and Apparel Construction 2
6200	Graphic Communications 1
6201	Graphic Communications 2
6202	Graphic Communications 3
6203	Graphic Communications 4
5455	Interior Design 1
5456	Interior Design 2
5205	Introduction to Graphic Communications
6172	Mechanical Design 1
6173	Mechanical Design 2
6124	Media Technology 1
6125	Media Technology 2
6126	Media Technology 3
6127	Media Technology 4
5290	Arts, Audio-Video Technology and Communications, work-based credit
5299	Arts, Audio-Video Technology and Communications, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
151301	Architecture/Mechanical Design
500402	Digital Art and Design
500407	Fashion Design and Apparel Construction
100301	Graphic Communications
500408	Interior Design
100299	Media Technology

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

Architecture/Mechanical Design**151301**

The Architecture/Mechanical Design CIP-coded program requires a minimum of four (4) Carnegie units.

Architectural Design 1

Architectural Design 2

Mechanical Design 1

Mechanical Design 2

Arts, Audio-Video Technology and Communications, work-based credit

Digital Art and Design**500402**

The Digital Art and Design CIP-coded program requires a minimum of four Carnegie (4) units.

Digital Art and Design 1

Digital Art and Design 2

Digital Art and Design 3

Digital Art and Design 4

Arts, Audio-Video Technology and Communications, work-based credit

Fashion Design and Apparel Construction**500407**

The Fashion Design and Apparel Construction CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Fashion Design and Apparel Construction 1

Fashion Design and Apparel Construction 2

Additional approved courses if needed to meet state-recognized program requirements:

Entrepreneurship	Fashion Marketing
Family and Consumer Sciences 1	Marketing Management
Family and Consumer Sciences 2	Mechanical Design 1
Fashion, Fabric, and Design 1	Arts, Audio-Video Technology and Communications, Work-based credit
Fashion, Fabric, and Design 2	

Graphic Communications**100301**

The Graphic Communication CIP-coded program requires a minimum of four (4) Carnegie units.

Graphic Communications 1

Graphic Communications 2

Graphic Communications 3

Graphic Communications 4

Arts, Audio-Video Technology and Communications, work-based credit

Interior Design**500408**

The Interior Design CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Interior Design 1

Interior Design 2

Additional approved courses if needed to meet state-recognized program requirements:

Entrepreneurship	Housing and Interiors 2
Family and Consumer Sciences 1	Marketing Management
Family and Consumer Sciences 2	Mechanical Design 1
Housing and Interiors 1	Arts, Audio-Video Technology and Communications, work-based credit

Media Technology**100299**

The Media Technology CIP-coded program requires a minimum of four (4) Carnegie units.

Media Technology 1

Media Technology 2

Media Technology 3

Media Technology 4

Arts, Audio-Video Technology and Communications, work-based credit

Business Management and Administration

Business Management and Administration careers encompass planning, organizing, directing, and evaluating business functions essential to efficient and productive business operations. Business Management and Administration career opportunities are available in every sector of the economy.

Course Code	Course Title
5122	Administrative Support Technology
5044	Business Law
5092	Business Principles and Management
5008	Computer Applications (Refer to Page 106 for More Info)
5176	Digital Desktop Publishing
5181	Digital Literacy (Refer to Page 106 for More Info)
5030	Digital Multimedia
5180	Digital Technologies
5400	Entrepreneurship
5041	Essential Communications
5090	Fundamentals of Business, Marketing and Finance
5480	Fundamentals of Project Management
5032	Global Business
5007	Google Applications
5011	Google Basics (Refer to Page 106 for More Info)
5093	Human Resource Management
5340	Image Editing 1
5341	Image Editing 2
5020	Integrated Business Applications 1
5021	Integrated Business Applications 2
5100	Keyboarding (Refer to Page 106 for More Info)
5482	Logistics and Business Processes
5010	Multimedia Basics (Refer to Page 106 for More Info)
5270	<i>Principles of Digital Technology (Moved from Information Technology)</i>
5178	Professional and Leadership Development
5034	Social Media in Business
5150	Virtual Enterprise 1
5151	Virtual Enterprise 2
5152	Virtual Enterprise 3
5153	Virtual Enterprise 4
5490	Business Management and Administration, work-based credit
5499	Business Management and Administration, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
520401	Administrative Services
521206	Business Information Management
520201	General Management
521001	Human Resources Management
520204	Operations Management

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All of the Business Management and Administration CIP-coded programs require a minimum of three (3) Carnegie units.

Administrative Services

520401

Required Courses:

Administrative Support Technology
Integrated Business Applications 1

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Fundamentals of Web Page Design and Development
Advanced Web Page Design and Development	Google Applications
Business Law	Image Editing 1
Business Principles and Management	Image Editing 2
Digital Desktop Publishing	<i>Principles of Digital Technology</i>
Digital Technologies	Integrated Business Applications 2
Entrepreneurship	Professional and Leadership Development
Essential Communications	Social Media in Business
Financial Math	Business Management and Administration, work-based credit
Fundamental of Business, Marketing, and Finance	

Business Information Management**521206****Required Courses:**

Digital Desktop Publishing

Image Editing 1

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Fundamentals of Project Management
Advanced Web Page Design and Development	Fundamentals of Web Page Design and Development
Advertising	Google Applications
Business Law	Human Resource Management
Business Principles and Management	Image Editing 2
Digital Multimedia	Integrated Business Applications 1
Digital Technologies	Integrated Business Applications 2
Entrepreneurship	IT Fundamentals
Essential Communications	<i>Principles of Digital Technology</i>
Exploring Computer Science	Professional Leadership Development
Financial Math	Social Media in Business
Foundations of Animation	Business Management and Administration, work-based credit
Fundamentals of Business, Marketing, and Finance	

General Management**520201****Required Courses:**

Accounting 1

Entrepreneurship

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 2	Integrated Business Applications 2
Business Finance	Logistics and Business Processes
Business Law	Marketing
Business Principles and Management	Marketing Management
Essential Communications	Professional and Leadership Development
Financial Math	Social Media in Business
Fundamentals of Business, Marketing and Finance	Virtual Enterprise 1
Fundamentals of Project Management	Virtual Enterprise 2
Global Business	Virtual Enterprise 3
Google Applications	Virtual Enterprise 4
Human Resource Management	Business Management and Administration, work-based credit
Integrated Business Applications 1	

Human Resources Management**521001****Required Courses:**

Business Law

Human Resource Management

Additional approved courses if needed to meet state-recognized program requirements:

Business Principles and Management	Global Business
Digital Desktop Publishing	Google Applications
Entrepreneurship	Integrated Business Applications 1
Essential Communications	Integrated Business Applications 2
Financial Math	Professional and Leadership Development
Fundamentals of Business, Marketing, and Finance	Business Management and Administration, work-based credit

Operations Management**520204****Required Courses:**

Virtual Enterprise 1

Virtual Enterprise 2

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Google Applications
Accounting 2	Integrated Business Applications 1
Business Law	Integrated Business Applications 2
Business Principles and Management	Logistics and Business Processes
Digital Technologies	Marketing
Entrepreneurship	Professional and Leadership Development
Essential Communications	Social Media in Business
Financial Math	Virtual Enterprise 3
Fundamentals of Business, Marketing, and Finance	Virtual Enterprise 4
Fundamentals of Project Management	Business Management and Administration, work-based credit
Global Business	

Education and Training

Planning, managing, and providing education and training services and related learning support services.

Course Code	Course Title
5800	Child Development 1 (Refer to Page 106 for More Info)
5801	Child Development 2
5700	Early Childhood Education 1
5701	Early Childhood Education 2
5702	Introduction to Early Childhood Education
5703	Introduction to Teaching 1
5704	Introduction to Teaching 2
5705	Teacher Cadet - CATE
6390	Education and Training, work-based credit
6399	Education and Training, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
131210	Early Childhood Education
130101	Introduction to Teaching

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum* number of Carnegie units required for the program.

All of the Education and Training CIP-coded programs require a minimum of four (4) Carnegie Units.

Early Childhood Education

131210

Required Courses:

Early Childhood Education 1

Early Childhood Education 2

Additional approved courses if needed to meet state-recognized program requirements:

Child Development 1	Foods and Nutrition 2
Child Development 2	Integrated Business Applications 1
Entrepreneurship	Introduction to Early Childhood Education
Family and Consumer Sciences 1	Introduction to Teaching 1
Family and Consumer Sciences 2	Parenting Education 1
Family Life Education 1	Parenting Education 2
Family Life Education 2	Teacher Cadet - CATE
Foods and Nutrition 1	Education and Training, work-based credit

Introduction to Teaching**130101****Required Courses:**

Introduction to Teaching 1

Introduction to Teaching 2

Additional approved courses if needed to meet state-recognized program requirements:

Child Development 1	Integrated Business Applications 1
Child Development 2	Introduction to Early Childhood Education
Early Childhood Education 1	Parenting Education 1
Entrepreneurship	Parenting Education 2
Family Life Education 1	Teacher Cadet - CATE
Family Life Education 2	Education and Training, work-based credit

Finance

Planning, services for financial and investment planning, banking, insurance and business financial management.

Course Code	Course Title
5001	Accounting 1
5005	Accounting 2
5271	Banking Services
5273	Business Finance
5282	Financial Literacy (Refer to Page 106 for More Info)
5281	Financial Math
5275	Insurance
5131	Personal Finance – <i>(deleted from Business Management Administration)</i>
5277	Securities and Investments
6190	Finance, work-based credit
6899	Finance, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
520801	Academy of Finance
520301	Accounting
520803	Banking Services
520804	Business Finance
521701	Insurance
520807	Securities and Investments

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All of the Finance CIP-coded programs require a minimum of three (3) Carnegie units.

Academy of Finance

520801

Schools meeting the National Academy Foundation (NAF) membership requirements must follow the NAF curriculum (<http://www.naf.org>).

Accounting**520301****Required Courses:**

Accounting 1

Accounting 2

Additional approved courses if needed to meet state-recognized program requirements:

Banking Services	Personal Finance
Business Finance	Professional and Leadership Development
Business Principles and Management	Securities and Investments
Entrepreneurship	Virtual Enterprise 1
Financial Math	Virtual Enterprise 2
Fundamentals of Business, Marketing and Finance	Virtual Enterprise 3
Insurance	Virtual Enterprise 4
Integrated Business Applications 1	Finance, work-based credit
Integrated Business Applications 2	

Banking Services**520803****Required Courses:**

Banking Services

Business Finance

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Insurance
Accounting 2	Integrated Business Applications 1
Business Law	Integrated Business Applications 2
Business Principles and Management	Personal Finance
Entrepreneurship	Professional and Leadership Development
Essential Communications	Professional Sales
Financial Math	Securities and Investments
Fundamentals of Business, Marketing and Finance	Finance, work-based credit

Business Finance**520804****Required Courses:**

Accounting 1
Business Finance

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 2	Insurance
Banking Services	Integrated Business Applications 1
Business Law	Integrated Business Applications 2
Entrepreneurship	Marketing
Essential Communications	Personal Finance
Financial Math	Professional and Leadership Development
Fundamentals of Business, Marketing and Finance	Securities and Investments
Global Business	Finance, work-based credit

Insurance**521701****Required Courses:**

Business Finance
Insurance

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Integrated Business Applications 1
Accounting 2	Integrated Business Applications 2
Banking Services	Marketing
Business Law	Personal Finance
Business Principles and Management	Professional and Leadership Development
Entrepreneurship	Professional Sales
Essential Communications	Securities and Investments
Financial Math	Finance, work-based credit
Fundamentals of Business, Marketing and Finance	

Securities and Investments

520807

Required Courses:

Business Finance

Securities and Investments

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Fundamentals of Business, Marketing and Finance
Accounting 2	Insurance
Banking Services	Integrated Business Applications 1
Business Law	Integrated Business Applications 2
Business Principles and Management	Personal Finance
Entrepreneurship	Professional and Leadership Development
Essential Communications	Professional Sales
Financial Math	Finance, work-based credit

The Office of Career and Technology Education currently offers no courses in the following cluster:

Government and Public Administration

Executing governmental functions to include governance; national security; foreign service; planning; revenue and taxation; regulation; and management and administration at the local, state, and federal levels.

Health Science

Planning, managing, and providing therapeutic services, diagnostic services, health informatics, support services, and biotechnology research and development.

Course Code	Course Title
5583	Biomedical Innovation
5531	Emergency Medical Services 1
5532	Emergency Medical Services 2
5533	Emergency Medical Services 3
5505	Health Informatics 1 – Data and Use #
5506	Health Informatics 2 – Transforming Data into Information #
5507	Health Informatics 3 – Transforming Information into Knowledge #
5508	Health Informatics 4 – Problems and Solutions #
5550	Health Science 1
5551	Health Science 2
5552	Health Science 3
5560	Health Science Clinical Study
5581	Human Body Systems
5584	Medical Billing and Coding
5582	Medical Interventions
5540	Medical Terminology
5570	Pharmacology for Medical Careers
5520	Practical Nursing, Phase 1
5580	Principles of Biomedical Sciences
5555	Sports Medicine 1
5556	Sports Medicine 2
5557	Sports Medicine 3 #
5590	Health Science, work-based credit
5591	Sports Medicine, work-based credit
5599	Health Science, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
260102	Biomedical Sciences (Project Lead the Way)
510999	EMS
510706	Health Informatics #
510000	Health Science
511600	Practical Nursing
310505	Sports Medicine

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

Biomedical Sciences (Project Lead the Way)**260102**

The Biomedical Sciences (Project Lead the Way) CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Human Body Systems
Principles of Biomedical Sciences

Additional approved courses if needed to meet state-recognized program requirements:

Biomedical Innovation	Medical Terminology
Emergency Medical Services 1	Pharmacology for Medical Careers
Emergency Medical Services 2	Sports Medicine 1
Health Science 1	Sports Medicine 2
Health Science 2	Health Science, work-based credit
Health Science 3	Sports Medicine, work-based credit
Medical Interventions	

EMS**510999**

The EMS CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Emergency Medical Services 1
Emergency Medical Services 2

Additional approved courses if needed to meet state-recognized program requirements:

Emergency Medical Services 3	Pharmacology for Medical Careers
Health Science 1	Principles of Biomedical Sciences
Health Science 2	Sports Medicine 1
Health Science 3	Sports Medicine 2
Human Body Systems	Health Science, work-based credit
Medical Terminology	Sports Medicine, work-based credit

Health Informatics #**510706**

The Health Informatics CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:**Health Informatics 1 #****Health Informatics 2 #*****Additional approved courses if needed to meet state-recognized program requirements:***

Emergency Medical Services 1	Medical Terminology
Emergency Medical Services 2	Pharmacology for Medical Careers
Health Informatics	Principles of Biomedical Sciences
Health Science 1	Sports Medicine 1
Health Science 2	Sports Medicine 2
Health Science 3	Health Science, work-based credit
Human Body Systems	Sports Medicine, work-based credit
Medical Billing and Coding	

Health Science**510000**

The Health Science CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Health Science 1

Health Science 2

Additional approved courses if needed to meet state-recognized program requirements:

Emergency Medical Services 1	Pharmacology for Medical Careers
Emergency Medical Services 2	Practical Nursing, Phase 1
Health Science 3	Principles of Biomedical Sciences
Health Science Clinical Study	Sports Medicine 1
Human Body Systems	Sports Medicine 2
Medical Billing and Coding	Health Science, work-based credit
Medical Terminology	Sports Medicine, work-based credit

Practical Nursing**511600**

Practical Nursing, Phase 1

Sports Medicine**310505**

The Sports Medicine CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Sports Medicine 1

Sports Medicine 2

Additional approved courses if needed to meet state-recognized program requirements:

Emergency Medical Services 1	Medical Terminology
Emergency Medical Services 2	Pharmacology for Medical Careers
Health Science 1	Principles of Biomedical Sciences
Health Science 2	Sports Medicine 3 #
Health Science 3	Health Science, work-based credit
Human Body Systems	Sports Medicine, work-based credit

Hospitality and Tourism

Hospitality and Tourism encompasses the management, marketing, and operations of restaurants and other food services, lodging, attractions, recreation events, and travel-related services.

Course Code	Course Title
5723	Baking and Pastry
5720	<i>Culinary Arts Management 1</i>
5721	<i>Culinary Arts Management 2</i>
5475	Event and Entertainment Management
5477	Hospitality Management and Operations 2 (Phasing Out July 2018)
5722	<i>Introduction to Culinary Arts Management</i>
5478	Introduction to Hospitality and Tourism Management
5473	Lodging Management
5474	Travel and Tourism Management
5190	Hospitality and Tourism, work-based credit
5199	Hospitality and Tourism, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
520905	<i>Culinary Arts Management</i>
520904	<i>Hospitality and Tourism Management</i>

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All of the Hospitality and Tourism CIP-coded programs require a minimum of three (3) Carnegie units.

Culinary Arts Management

520905

Required Courses:

Culinary Arts Management 1

Culinary Arts Management 2

OR

Culinary Arts Management 1

Baking and Pastry

OR

Culinary Arts Management 1

Culinary Arts Management 2

Baking and Pastry

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	<i>Integrated Business Applications 1</i>
Entrepreneurship	<i>Introduction to Culinary Arts Management</i>
Event and Entertainment Management	Introduction to Hospitality and Tourism Management
Foods and Nutrition 1	Sports Nutrition 1
Foods and Nutrition 2	Sports Nutrition 2
Fundamentals of Web Page Design and Development	Hospitality and Tourism, work-based credit

Hospitality and Tourism Management

520904

Required Courses:

Hospitality Management and Operations 2 – Phasing Out July 2018
Introduction to Hospitality and Tourism Management

Select two (2) of the courses listed below for completer status:

Event and Entertainment Management
Lodging Management
Travel and Tourism Management

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Integrated Business Applications 1
<i>Culinary Arts Management 1</i>	<i>Introduction to Culinary Arts Management</i>
Entrepreneurship	Marketing Management
Foods and Nutrition 1	Sports and Entertainment Management
Foods and Nutrition 2	Sports and Entertainment Marketing
Fundamentals of Web Page Design and Development	Hospitality and Tourism, work-based credit

Human Services/Family and Consumer Sciences

Preparing individuals for employment in career pathways that relate to families and human needs.

Course Code	Course Title
6158	Barber/Master Hair Care 1
6159	Barber/Master Hair Care 2
6160	Barber/Master Hair Care 3
6161	Barber/Master Hair Care 4
6150	Cosmetology 1
6151	Cosmetology 2
6152	Cosmetology 3
6153	Cosmetology 4
6162	Esthetics 1
6163	Esthetics 2
6164	Esthetics 3
6165	Esthetics 4
5808	Family and Consumer Sciences 1
5809	Family and Consumer Sciences 2
5820	Family Life Education 1
5821	Family Life Education 2
5804	Fashion, Fabric, and Design 1 (Refer to Page 106 for More Info)
5805	Fashion, Fabric, and Design 2
5812	Financial Fitness 1
5813	Financial Fitness 2
5824	Foods and Nutrition 1 (Refer to Page 106 for More Info)
5825	Foods and Nutrition 2
5830	Housing and Interiors 1 (Refer to Page 106 for More Info)
5831	Housing and Interiors 2
5834	Human Development: Responsible Life Choices 1
5835	Human Development: Responsible Life Choices 2
6154	Nail Technology 1
6155	Nail Technology 2
6156	Nail Technology 3
6157	Nail Technology 4
5816	Parenting Education 1
5817	Parenting Education 2
5759	Sports Nutrition 1 (Refer to Page 106 for More Info)
5760	Sports Nutrition 2
5890	Family and Consumer Sciences, work-based credit
5790	Human Services, work-based credit
5899	Family and Consumer Sciences, LBA
5799	Human Services, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
120402	Barber/Master Hair Care
120401	Cosmetology
120409	Esthetics
190101	Family and Consumer Sciences
120410	Nail Technology

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program.*

Barber/Master Hair Care

120402

The Barber/Master Hair Care CIP-coded program requires a minimum of eight (8) Carnegie units.

Barber/Master Hair Care 1
Barber/Master Hair Care 2
Barber/Master Hair Care 3
Barber/Master Hair Care 4
Human Services, work-based credit

Cosmetology

120401

The Cosmetology CIP-coded program requires a minimum of eight (8) Carnegie units.

Cosmetology 1
Cosmetology 2
Cosmetology 3
Cosmetology 4
Human Services, work-based credit

Esthetics

120409

The Esthetics CIP-coded program requires a minimum of four (4) Carnegie units.

Esthetics 1
Esthetics 2
Esthetics 3
Esthetics 4
Human Services, work-based credit

Family and Consumer Sciences**190101**

The Family and Consumer Sciences CIP-coded program requires a minimum of three (3) Carnegie units.

Note: Program completers in Family and Consumer Sciences must select courses that show a clear path to a career and be able to complete an approved assessment successfully. A minimum of three units of credit are required to be a completer.

Required Courses (at least two of the following):

Child Development 1	Foods and Nutrition 2
Child Development 2	Housing and Interiors 1
Family and Consumer Sciences 1	Housing and Interiors 2
Family and Consumer Sciences 2	Human Development: Responsible Life Choices 1
Family Life Education 1	Human Development: Responsible Life Choices 2
Family Life Education 2	Parenting Education 1
Fashion, Fabric, and Design 1	Parenting Education 2
Fashion, Fabric, and Design 2	Sports Nutrition 1
Financial Fitness 1	Sports Nutrition 2
Financial Fitness 2	Family and Consumer Sciences, work-based credit
Foods and Nutrition 1	

Additional approved courses if needed to meet state-recognized program requirements for 4 units:

<i>Culinary Arts Management 1</i>	<i>Introduction to Culinary Arts Management</i>
Early Childhood Education 1	Introduction to Early Childhood Education
Fashion Design and Apparel Construction 1	Introduction to Teaching 1
<i>Food Science 1</i>	Personal Finance
Interior Design 1	

Nail Technology**120410**

The Nail Technology CIP-coded program requires a minimum of three (3) Carnegie units.

Nail Technology 1
Nail Technology 2
Nail Technology 3
Nail Technology 4
Human Services, work-based credit

Information Technology

Building linkages in IT occupations framework: for entry level, technical, and professional careers related to the design, development, support, and management of hardware, software, multimedia, and systems integration services.

Course Code	Course Title
5351	Advanced Animation
5323	Advanced Computer Operating Systems
5321	Advanced Computer Repair and Service
5372	Advanced Cyber Security
5311	Advanced Networking
5313	Advanced Server Administration
5033	Advanced Web Page Design and Development
5374	Computer Forensics
5322	Computer Operating Systems
5050	Computer Programming 1
5051	Computer Programming 2
5056	Computer Programming with C++ 1
5057	Computer Programming with C++ 2
5052	Computer Programming with Java 1
5053	Computer Programming with Java 2
5054	Computer Programming with Visual Basic 1
5055	Computer Programming with Visual Basic 2
5320	Computer Repair and Service
5370	Cyber Security Fundamentals
5324	Database Design and Programming with SQL
5326	Database Programming with PL/SQL
5023	Exploring Computer Science
5350	Foundations of Animation
5031	Fundamentals of Web Page Design and Development
5352	Game Design and Development
5361	GIS Technology 1
5362	GIS Technology 2
5025	IT Fundamentals
5058	Java Fundamentals and Java Programming
5310	Networking Fundamentals
5327	SAS Programming 1
5328	SAS Programming 2
5312	Server Administration
5390	Information Technology, work-based credit
5399	Information Technology, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
151202	Information Support and Services
110901	Networking Systems
110201	Programming and Software Development
110801	Web and Digital Communications

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the minimum number of Carnegie units required for the program.

All of the Information Technology CIP-coded programs require a minimum of three (3) Carnegie units.

Information Support and Services

151202

Required Courses:

Computer Repair and Service
Advanced Computer Repair and Service

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Cyber Security	Database Design and Programming with/SQL
Advanced Computer Operating Systems	Database Programming with PL/SQL
Advanced Networking	Entrepreneurship
Advanced Server Administration	Exploring Computer Science
Advanced Web Page Design and Development	Fundamentals of Web Page Design and Development
Computer Forensics	Game Design and Development
Computer Programming 1	Home Systems Technology
Computer Programming 2	<i>Principles of Digital Technology (do not select after July 2018)</i>
Computer Programming with C++ 1	IT Fundamentals
Computer Programming with C++ 2	Networking Fundamentals
Computer Programming with Java 1	Professional Leadership Development
Computer Programming with Java 2	SAS Programming 1
Computer Programming with Visual Basic 1	SAS Programming 2
Computer Programming with Visual Basic 2	Server Administration
Computer Operating Systems	Information Technology, work-based credit
Cyber Security Fundamentals	

Networking Systems

110901

Required Courses:

Networking Fundamentals

Advanced Networking

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Cyber Security	Computer Repair and Service
Advanced Computer Operating Systems	Cyber Security Fundamentals
Advanced Computer Repair and Service	Database Programming with/SQL
Advanced Server Administration	Database Programming with PL/SQL
Advanced Web Page Design and Development	Entrepreneurship
Computer Forensics	Exploring Computer Science
Computer Operating Systems	Fundamentals of Web Page Design and Development
Computer Programming 1	Home Systems Technology
Computer Programming 2	IT Fundamentals
Computer Programming with C++ 1	<i>Principles of Digital Technology (do not select after July 2018)</i>
Computer Programming with C++ 2	Professional and Leadership Development
Computer Programming with Java 1	SAS Programming 1
Computer Programming with Java 2	SAS Programming 2
Computer Programming with Visual Basic 1	Server Administration
Computer Programming with Visual Basic 2	Information Technology, work-based credit

Programming and Software Development

110201

Required Courses:

Computer Programming 1

Computer Programming 2

OR

Computer Programming with C++ 1

Computer Programming with C++ 2

OR

Computer Programming with Java 1

Computer Programming with Java 2

OR

Computer Programming with Visual Basic 1

Computer Programming with Visual Basic 2

OR

Database Design and Programming with SQL

Database Programming with PL/SQL

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Animation	GIS Technology 1
Advanced Cyber Security	GIS Technology 2
Advanced Web Page Design and Development	<i>Principles of Digital Technology (do not select after July 2018)</i>
Computer Forensics	IT Fundamentals
Cyber Security Fundamentals	Java Fundamental and Java Programming
Entrepreneurship	Professional and Leadership Development
Exploring Computer Science	SAS Programming 1
Foundations of Animation	SAS Programming 2
Fundamentals of Web Page Design and Development	Information Technology, work-based credit
Game Design and Development	

Web and Digital Communications**110801****Required Courses:**

Fundamentals of Web Page Design and Development

Advanced Web Page Design and Development

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Animation	Google Applications
Computer Programming 1	Image Editing 1
Computer Programming 2	Image Editing 2
Cyber Security Fundamentals	
Digital Desktop Publishing	<i>Principles of Digital Technology (do not select after July 2018)</i>
Digital Media Marketing	Integrated Business Applications 1
Digital Multimedia	Integrated Business Applications 2
Digital Technologies	IT Fundamentals
Entrepreneurship	Java Fundamentals and Java Programming
Exploring Computer Science	Professional and Leadership Development
Foundations of Animation	Social Media in Business
Game Design and Development	Information Technology, work-based credit

Law, Public Safety, Corrections, and Security

Planning, managing, and providing legal, public safety, protective services, and homeland security, including professional and technical support services.

Course Code	Course Title
6512	Emergency and Fire Management Services 1 (Phasing Out July 2018)
6513	Emergency and Fire Management Services 2 (Phasing Out July 2019)
6514	Fire Fighter 1
6515	Fire Fighter 2
6505	Introduction to Law, Public Safety, Corrections and Security
6510	Law Enforcement Services 1
6511	Law Enforcement Services 2
6590	Law, Public Safety, Corrections and Security, work-based credit
6599	Law, Public Safety, Corrections and Security, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
430203	Emergency and Fire Management Services
430107	Law Enforcement Services

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All of the Law, Public Safety, Corrections, and Security programs require a minimum of three (3) Carnegie units.

Emergency and Fire Management Services

430203

Fire Fighter 1
Fire Fighter 2

Additional approved courses if needed to meet state-recognized program requirements:

Introduction to Law, Public Safety, Corrections and Security
Law, Public Safety, Corrections and Security, work-based credit
OR
Emergency and Fire Management Services 1 (Phasing Out July 2018)
Emergency and Fire Management Services 2 (Phasing Out July 2019)
Introduction to Law, Public Safety, Corrections and Security
Law, Public Safety, Corrections and Security, work-based credit

Law Enforcement Services

430107

Introduction to Law, Public Safety, Corrections and Security
Law Enforcement Services 1
Law Enforcement Services 2
Law, Public Safety, Corrections and Security, work-based credit

Manufacturing

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.

Course Code	Course Title
6222	Advanced Technology for Design and Production #
6225	Design for the Production of Advanced Products #
6133	Electronics Technology 1
6134	Electronics Technology 2
6135	Electronics Technology 3
6136	Electronics Technology 4
6045	Introduction to Manufacturing Technology
6230	Machine Technology 1
6231	Machine Technology 2
6232	Machine Technology 3
6233	Machine Technology 4
6210	Mechatronics 1-Electrical Components/Industrial Safety
6211	Mechatronics 2-Mechanical Components Electric Drives/Hand & Power Tool Op.
6212	Mechatronics 3-Electro Pneumatics and Hydraulics
6213	Mechatronics 4-Digital Fundamentals and Programmable Controllers
6224	Mechatronic Systems for Advanced Production #
6260	Metal Fabrication 1
6261	Metal Fabrication 2
6262	Metal Fabrication 3
6263	Metal Fabrication 4
6223	Systems of Advanced Technology #
6340	Welding Technology 1
6341	Welding Technology 2
6342	Welding Technology 3
6343	Welding Technology 4
6490	Manufacturing, work-based credit
6499	Manufacturing, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
470101	Electronics Technology
480503	Machine Technology
150613	Integrated Production Technology #
150404	Mechatronics Integrated Technologies
480501	Metal Fabrication
480508	Welding Technology

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program.*

All Manufacturing CIP-coded programs require a minimum of four (4) units.

Electronics Technology

470101

Electronics Technology 1
Electronics Technology 2
Electronics Technology 3
Electronics Technology 4
Manufacturing, work-based credit

If a student completes Electronics Technology 1 and 2, the student could become a completer by:

Completing two or more of the following:

Mechatronics 1-Electrical Components/Industrial Safety
Mechatronics 2-Mechanical Components Electric Drives/Hand & Power Tool Op.
Mechatronics 3-Electro Pneumatics and Hydraulics
Mechatronics 4-Digital Fundamentals and Programmable Controllers
Manufacturing, work-based credit

Integrated Production Technology #

150613

Advanced Technology for Design and Production #
Systems of Advanced Technology #
Mechatronic Systems for Advanced Production #
Design for the Production of Advanced Products #
Manufacturing, work-based credit

Machine Technology

480503

Machine Technology 1
Machine Technology 2
Machine Technology 3
Machine Technology 4
Manufacturing, work-based credit

Mechatronics Integrated Technologies**150404**

Mechatronics 1-Electrical Components/Industrial Safety

Mechatronics 2-Mechanical Components Electric Drives/Hand & Power Tool Op.

Mechatronics 3-Electro Pneumatics and Hydraulics

Mechatronics 4-Digital Fundamentals and Programmable Controllers

Manufacturing, work-based credit

Complete two (from above) Mechatronics 1, 2, 3 or 4 and

Electronics Technology 1

Electronics Technology 2

OR

Required Courses:

PLTW-Introduction to Engineering Design

PLTW-Principles of Engineering

AND two or more of the following:

Mechatronics 1-Electrical Components/Industrial Safety

Mechatronics 2-Mechanical Components Electric Drives/Hand & Power Tool Op.

Mechatronics 3-Electro Pneumatics and Hydraulics

Mechatronics 4-Digital Fundamentals and Programmable Controllers

Manufacturing, work-based credit

Metal Fabrication**480501**

Metal Fabrication 1

Metal Fabrication 2

Metal Fabrication 3

Metal Fabrication 4

Manufacturing, work-based credit

Welding Technology**480508**

Welding Technology 1

Welding Technology 2

Welding Technology 3

Welding Technology 4

Manufacturing, work-based credit

Marketing

Planning, managing, and performing marketing activities to reach organizational objectives.

Course Code	Course Title
5470	Advertising
5422	Digital Media Marketing
5410	Fashion Marketing
5421	Marketing
5431	Marketing Management
5423	Marketing Research
5430	Merchandising
5471	Professional Sales
5426	Sports and Entertainment Management
5425	Sports and Entertainment Marketing
5091	Marketing, work-based credit
5099	Marketing, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
090903	Marketing Communications
521401	Marketing Management
521402	Marketing Research
521802	Merchandising
521804	Professional Sales

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All Marketing CIP-coded programs require a minimum of three (3) units.

Marketing Communications**090903****Required Courses:**

Advertising or Digital Media Marketing
Marketing

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Web Page Design and Development	Integrated Business Applications 2
Digital Media Marketing	Marketing Research
Digital Desktop Publishing	Professional and Leadership Development
Digital Multimedia	Professional Sales
Entrepreneurship	Social Media in Business
Essential Communications	Sports and Entertainment Marketing
Fundamentals of Web Page Design and Development	Virtual Enterprise 1
Google Applications	Virtual Enterprise 2
Image Editing 1	Virtual Enterprise 3
Image Editing 2	Virtual Enterprise 4
Integrated Business Applications 1	Marketing, work-based credit

Marketing Management**521401****Required Courses:**

Marketing
Marketing Management

Additional approved courses if needed to meet state-recognized program requirements:

Accounting 1	Logistics and Business Processes
Accounting 2	Marketing Research
Advertising	Professional and Leadership Development
Business Law	Professional Sales
Business Principles and Management	Social Media in Business
Entrepreneurship	Sports and Entertainment Management
Essential Communications	Virtual Enterprise 1
Fundamentals of Project Management	Virtual Enterprise 2
Google Applications	Virtual Enterprise 3
Hospitality Management and Operations 2 (Phasing out July 2018)	Virtual Enterprise 4
Integrated Business Applications 1	Marketing, work-based credit
Integrated Business Applications 2	

Marketing Research**521402****Required Courses:**

Marketing
Marketing Research

Additional approved courses if needed to meet state-recognized program requirements:

Advertising	SAS Programming 1
Entrepreneurship	SAS Programming 2
Essential Communications	Social Media in Business
Google Applications	Sports and Entertainment Marketing
Hospitality Management and Operations 2 (Phasing out July 2018)	Virtual Enterprise 1
Integrated Business Applications 1	Virtual Enterprise 2
Integrated Business Applications 2	Virtual Enterprise 3
Merchandising	Virtual Enterprise 4
Professional and Leadership Development	Marketing, work-based credit
Professional Sales	

Merchandising**521802****Required Courses:**

Marketing
Merchandising

Additional approved courses if needed to meet state-recognized program requirements:

Advanced Web Page Design and Development	Image Editing 2
Advertising	Integrated Business Applications 1
Digital Desktop Publishing	Integrated Business Applications 2
Digital Multimedia	Marketing Research
Entrepreneurship	Professional and Leadership Development
Essential Communications	Professional Sales
Fashion Marketing	Social Media in Business
Fundamentals of Web Page Design and Development	Sports and Entertainment Marketing
Google Applications	Marketing, work-based credit
Image Editing 1	

Professional Sales**521804****Required Courses:**

Marketing

Professional Sales

Additional approved courses if needed to meet state-recognized program requirements:

Digital Desktop Publishing	Merchandising
Digital Media Marketing	Professional and Leadership Development
Entrepreneurship	Social Media in Business
Essential Communications	Sports and Entertainment Marketing
Google Applications	Virtual Enterprise 1
Hospitality Management and Operations 2 (Phasing out July 2018)	Virtual Enterprise 2
Integrated Business Applications 1	Virtual Enterprise 3
Integrated Business Applications 2	Virtual Enterprise 4
Marketing Research	Marketing, work-based credit

Science, Technology, Engineering, and Mathematics

Planning, managing, and providing scientific research and professional and technical services (e.g., physical science, social science, engineering) including laboratory and testing services and research and development services.

Course Code	Course Title
6387	Advanced Aerospace Technology #
6388	Aeronautics Engineering Applications #
6389	Astronautics Engineering Applications #
6380	Clean Energy - Systems 1
6381	Clean Energy - Applications 2
6382	Clean Energy - Strategies 3
6383	Clean Energy - Innovations 4
6891	Computers, Networks and Databases #
6373	Computer Science Applications (CSA)
6377	Computer Science Principles (CSP)
6370	Core Engineering 1
6371	Core Engineering 2
6375	Core Engineering 3
6376	Core Engineering 4
6893	Databases in the Cloud #
6892	Design for the Digital World #
6894	Developing a Cloud Presence #
5757	<i>Food Science 1</i>
5758	<i>Food Science 2</i>
6386	Fundamentals of Aerospace Technology #
6040	Industrial Technology Education (Exploratory) 1
6041	Industrial Technology Education (Exploratory) 2
6372	Introduction to Computer Science (ICS)
6056	PLTW-Aerospace Engineering
6058	PLTW-Civil Engineering and Architecture
6053	PLTW-Computer Integrated Manufacturing
6052	PLTW-Digital Electronics
6054	PLTW-Engineering Design and Development
6374	PLTW-Environmental Sustainability (ES)
6051	PLTW-Introduction to Engineering Design
6050	PLTW-Principles of Engineering
6090	Pre-Engineering/Engineering & Industrial Technology Education, work-based credit
6099	Pre-Engineering/Industrial Technology Education, LBA
6890	Science, Technology, Engineering and Mathematics, work-based credit
CIP Code	Program Title (See below for the approved courses for each CATE program)
150801	Aerospace Engineering Technology #
149999	Clean Energy
111003	Computer and Information Systems Security/Information Assurance #
110701	Computer Science (PLTW) #

143501	Core Engineering
190501	<i>Food Science</i>
110104	Informatics #
140101	Pre-Engineering (Project Lead the Way)

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program.*

Aerospace Engineering Technology #

150801

The Aerospace Engineering Technology CIP-coded program requires a minimum of four (4) Carnegie units.

Fundamentals of Aerospace Technology # - (Implemented 2017-18)

Advanced Aerospace Technology # - (Implemented 2018-19)

Aeronautics Engineering Applications # - (Implemented 2019-20)

Astronautics Engineering Applications # - (Implemented 2020-21)

Science, Technology, Engineering, Mathematics, (STEM) work-based credit

Additional approved courses if needed to meet state – recognized program requirements: (Choose three)

PLTW – Introduction to Engineering Design (IED)

PLTW – Principles of Engineering (POE)

PLTW – Aerospace Engineering (AE)

PLTW – Civil Engineering and Architecture (CEA)

PLTW – Computer Integrated Manufacturing (CIM)

PLTW – Computer Science Application (CSA)

PLTW – Digital Electronics (DE)

PLTW – Engineering Design and Development (EDD)

PLTW – Environmental Sustainability (ES)

PLTW – Introduction to Computer Science (ICS)

PLTW – Science, Technology, Engineering, and Mathematics (STEM) work-based credit

Clean Energy

149999

The Clean Energy CIP-coded program requires a minimum of four (4) Carnegie units.

Clean Energy – Systems 1

Clean Energy – Applications 2

Clean Energy – Strategies 3

Clean Energy – Innovations 4

Science, Technology, Engineering, Mathematics, work-based credit

Computer Science (PLTW) #**110701**

The Computer Science (PLTW) CIP-coded program requires a minimum of four (4) Carnegie units.

Introduction to Computer Science (ICS)

Computer Science Principles (CSP)

Computer Science Applications (CSA)

Science, Technology, Engineering, Mathematics, (STEM) work-based credit

Computer and Information Systems Security/Information Assurance #**111003**

The Computer and Information Systems Security/Information Assurance CIP-coded program requires a minimum of four (4) Carnegie units.

Required Courses:

Fundamentals of Cyber Security

Advanced Cyber Security

***Additional approved courses if needed to meet state-recognized program requirements:
(Choose two)***

Exploring Computer Science

Introduction to Computer Science (PLTW)

Computer Forensics

Networking Fundamentals

Advanced Networking

Science, Technology, Engineering, Mathematics, (STEM) work-based credit

Core Engineering**143501**

The Core Engineering CIP-coded program requires a minimum of four (4) Carnegie units.

Core Engineering 1

Core Engineering 2

Core Engineering 3

Core Engineering 4

Science, Technology, Engineering, Mathematics, work-based credit

Food Science**190501**

The Food Science CIP-coded program requires a minimum of three (3) Carnegie units.

Required Courses:

Food Science 1

Food Science 2

Additional approved courses if needed to meet state-recognized program requirements:

Foods and Nutrition 1

Foods and Nutrition 2

Food Processing

Sports Nutrition 1

Sports Nutrition 2

Informatics**110104**

The Informatics CIP-coded program requires a minimum of four (4) Carnegie units.

Computers, Networks and Databases #

Design for the Digital World #

Databases in the Cloud #

Developing a Cloud Presence #

Science, Technology, Engineering, Mathematics, (STEM) work-based credit

Pre-Engineering (Project Lead the Way)**140101**

The Pre-Engineering (Project Lead the Way) CIP-coded program requires a minimum of four (4) Carnegie units.

Required Courses:

PLTW-Introduction to Engineering Design

PLTW-Principles of Engineering

Additional approved courses if needed to meet state-recognized program requirements:

PLTW-Aerospace Engineering

PLTW-Civil Engineering and Architecture

PLTW-Computer Integrated Manufacturing

PLTW-Computer Science Applications (CSA)

PLTW-Digital Electronics

PLTW-Engineering Design and Development

PLTW-Environmental Sustainability (ES)

PLTW-Introduction to Computer Science (ICS)

Pre-Engineering/Engineering & Industrial Technology Education, work-based credit

Transportation, Distribution, and Logistics

Planning, management, and movement of people, materials, and goods by road, pipeline, air, rail, and water and related professional and technical support services such as transportation infrastructure planning and management, logistics services, mobile equipment, and facility maintenance.

Course Code	Course Title
6020	Automotive Collision Repair Technology 1
6021	Automotive Collision Repair Technology 2
6022	Automotive Collision Repair Technology 3
6023	Automotive Collision Repair Technology 4
6030	Automotive Technology 1
6031	Automotive Technology 2
6032	Automotive Technology 3
6033	Automotive Technology 4
6310	Diesel Engine Technology 1
6311	Diesel Engine Technology 2
6312	Diesel Engine Technology 3
6313	Diesel Engine Technology 4
6192	Functional Areas in Logistics – Course 2: #
6193	Global Logistics Management – Course 3: #
6191	Introduction to Logistic – Course 1: #
6015	Introduction to Transportation, Distribution and Logistics
6194	Logistics and Supply Chain Management – Course 4: #
6300	Power Equipment Technology 1
6301	Power Equipment Technology 2
6302	Power Equipment Technology 3
6303	Power Equipment Technology 4
6790	Transportation, Distribution and Logistics, work-based credit
6199	Transportation, Distribution and Logistics, LBA
CIP Code	Program Title (See below for the approved courses for each CATE program)
470603	Automotive Collision Repair Technology
470604	Automotive Technology
470605	Diesel Engine Technology
520203	Global Logistics & Supply Chain Management #
470606	Power Equipment Technology

Each state-recognized CATE program identified below must include only approved courses listed for each CIP code and must offer the *minimum number of Carnegie units required for the program*.

All of the Transportation, Distribution, and Logistics programs require a minimum of four (4) Carnegie units.

Automotive Collision Repair Technology	470603
Automotive Collision Repair Technology 1	
Automotive Collision Repair Technology 2	
Automotive Collision Repair Technology 3	
Automotive Collision Repair Technology 4	
Transportation, Distribution and Logistics, work-based credit	
 Automotive Technology	 470604
Automotive Technology 1	
Automotive Technology 2	
Automotive Technology 3	
Automotive Technology 4	
Transportation, Distribution and Logistics, work-based credit	
 Diesel Engine Technology	 470605
Diesel Engine Technology 1	
Diesel Engine Technology 2	
Diesel Engine Technology 3	
Diesel Engine Technology 4	
Transportation, Distribution and Logistics, work-based credit	
 Global Logistics & Supply Chain Management #	 520203
Introduction to Logistics #	
Functional Areas in Logistics #	
Global Logistics Management #	
Logistics and Supply Chain Management #	
Transportation, Distribution and Logistics, work-based credit	
 Power Equipment Technology	 470606
Power Equipment Technology 1	
Power Equipment Technology 2	
Power Equipment Technology 3	
Power Equipment Technology 4	
Transportation, Distribution and Logistics, work-based credit	

Middle School CATE Courses
Seventh and Eighth Grades

No High School Credit	
Course Code	Course Title
2841	Gateway to Technology
2840	Industrial Technology Education
2856	Introduction to Agriculture
2830	Introduction to Career Clusters
2857	Introduction to Family and Consumer Service Sciences 1
2858	Introduction to Family and Consumer Service Sciences 2
2839	Introduction to Health Professions #

High School Credit (Not part of a CATE program)	
Course Code	Course Title
Use 5008 (Computer Applications), 5100 (Keyboarding), 5181 (Digital Literacy), 5010 (Multimedia Basics), 5011 (Google Basics) and 5282 (Financial Literacy) as the course codes for middle school students taking these courses for high school credit if (a) the courses follow the CATE curriculum standards for Computer Applications, Keyboarding, Digital Literacy, Multimedia Basics, Google Basics, and Financial Literacy and (b) if a teacher with business education certification teaches the courses.	
5008	Computer Applications (high school credit)
5181	Digital Literacy (high school credit)
5282	Financial Literacy (high school credit)
5011	Google Basics (high school credit)
5100	Keyboarding (high school credit)
5010	Multimedia Basics (high school credit)

High School Credit	
Course Code	Course Title
Level 1 of Family and Consumer Sciences courses can be offered in the 7 th and/or 8th grade for one unit of high school credit. Courses must be taught by a licensed Family and Consumer Sciences teacher.	
5800	Child Development 1
5808	Family and Consumer Sciences 1
5804	Fashion, Fabric and Design 1
5824	Foods and Nutrition 1
5830	Housing and Interiors 1
5759	Sports Nutrition

Appendix D

Nontraditional CATE Programs

Nontraditional Programs for Females	
CIP Code	Program Title
010205	Agricultural Mechanics and Technology
151301	Architectural/Mechanical Design
470603	Automotive Collision Repair Technology
470604	Automotive Technology
460000	Building Construction Cluster
480703	Cabinetmaking
460201	Carpentry
470103	Communication Electronics (Program phased out July 2013)
470101	Electronics Technology
470605	Diesel Engine Technology
460301	Electricity
430203	Emergency and Fire Management Services
030101	Environmental and Natural Resources Management
520201	General Management
470201	HVAC Technology
010601	Horticulture
470105	Industrial Electronics (Program phased out July 2013)
151202	Information Support and Services
430107	Law Enforcement Services
480503	Machine Technology
460101	Masonry
150404	Mechatronics Integrated Technologies
480501	Metal Fabrication
110901	Networking Systems
011101	Plant and Animal Systems
460503	Plumbing
110201	Programming and Software Development
140101	Pre-Engineering (Project Lead The Way)
470606	Power Equipment Technology
480508	Welding Technology

Nontraditional Programs for Males	
CIP Code	Program Title
520401	Administrative Services
120401	Cosmetology
131210	Early Childhood Education
190501	Food Science and Dietetics
120410	Nail Technology