HIGH SCHOOL DUAL ENROLLMENT ACADEMIES
High School Dual Enrollment Academies

The Community College of Allegheny County has established the High School Dual Enrollment Academies to provide college-bound students with the opportunity to develop advanced technical skills and earn college credit toward an associate and/or bachelor’s degree while still in high school. The college anticipates that students in the High School Dual Enrollment Academies will continue their studies through an associate degree at CCAC or transfer their credits to another college or university to earn a college credential or industry-recognized certification.

The High School Dual Enrollment Academies—What They Are & How They Work

• Students are enrolled at their high school and CCAC simultaneously. Depending upon the program selected, students complete six or more college courses while enrolled in the academies along with obtaining credit for high school courses.
• All credits earned in the academies will appear as completed courses on a CCAC college transcript, establishing the transferability of these courses.
• Students will earn, where appropriate, recognized industry certifications and prepare to enter high-demand career fields.

Curriculum

The tables on the following pages provide the recommended courses of study for the High School Dual Enrollment Academies.

Participation in the High School Dual Enrollment Academies

Dual Enrollment classes are not like college classes—they ARE college classes.

While many CCAC courses don’t require a placement test, students are required to take CCAC’s skills assessment for any courses that require a placement score. CCAC’s English and mathematics courses require such a score, as do other courses that require strong reading, writing and/or math skills. Students wishing to enroll in the High School Dual Enrollment Academies should contact their high school official working with the CCAC academies or the CCAC Admissions Office directly.

CCAC Offers Classes in the High School Dual Enrollment Academies in Two Formats:

Classes Offered in High School/Career Technical Center

CCAC offers High School Dual Enrollment Academies classes at the high school/CTC during the school day or before/after school to students identified by their school and approved by CCAC. Some courses are taught online, via video conferencing, or before or after school by CCAC faculty.

Students pay the one-time matriculation fee plus half the tuition for courses taken during the normal high school day taught by a high school faculty member or the college’s regular course tuition and fees for courses taken online through CCAC, after the normal school day or in the summer.

CCAC Online Classes & Classes Offered at CCAC’s Campuses/Centers

High school students who are ready for college work can enroll in CCAC’s High School Dual Enrollment Academies courses offered online or at one of CCAC’s campuses and/or centers. Students pay the one-time matriculation fee plus CCAC’s regular tuition and fees.

Arts Academy

• Film (126.2)
• Technical Theatre (125.1)

University Academy

Students will earn 22 credit hours. They will have completed a significant portion of the general education requirements for CCAC and most other colleges and universities.

Business Academy

• Accounting
• Business Management (216.1)
• Entrepreneurship (219.1)

Health Professions Academy

They will have completed many or all of the prerequisite courses for admission into one of CCAC’s competitive Allied Health and/or Nursing programs

Tech Academy

• Cybersecurity (792)
• Robotics & Artificial Intelligence Coming soon

Skilled Professionals Academy

• Administrative Computer Specialist (234)
• Advanced Manufacturing Coming soon
• Aviation & Flight Training
• Culinary Arts (671)
• Heating & Air Conditioning Technology (312.3)
• Mechatronics (732.2)
• Welding Technology (317.3)

Social Services Academy

• Education & Child Development (622.5)
• Homeland Security (616)
Arts Academy
Film at South Campus
Students will earn at least 20 credit hours. They will have six courses remaining to complete the Film Technician Certificate (126.2).

This academy leads toward CCAC’s Film Technician Certificate. The certificate prepares graduates to work on film, television, concerts and sporting events as crew. Positions such as construction, scenic artist, set dressing, grip, set lighting technician, sound mixing and editing, video assist, camera operator, craft services, production assistant, wardrobe and location scouting will be introduced. Opportunities to visit or intern on movie locations and sound stages will be an integral part of the hands-on training.

Year One
Fall  FLM 105 Film & Video Editing 1  3 *
Spring  FLM 108 The Art of Cinema  3

Year Two
Fall  FLM 106 Introduction to Filmmaking  3 *
Fall  FLM 161 Cinematography 1  4 *
Spring  FLM 131 Grip & Electric 1  4 * +
Spring  Restricted Elective  3–6

Technical Theatre
Students will earn 17 credit hours. They will have one course remaining to complete the Technical Theatre Certificate (125.1).

This academy leads toward CCAC’s Technical Theatre Certificate, which provides students with an overview of the technical aspects of theatre, including theatrical terminology, scenic design, stage lighting, set construction, stage rigging and draperies, sound systems, and the safety precautions that need to be taken when using hand and power tools and working in a theatre, on a movie set or in a television studio.

Upon completion of the program, graduates can obtain an entry-level job as a theatre set construction crew member or as a technical staff member for theatrical productions.

Year One
Fall  THE 101 Introduction to Theatre  3 +
Spring  THE 117 Theatre Production 1  3

Year Two
Fall  THE 121 Technical Theatre 1  3
Fall  SEM 103 College Seminar  2
Spring  THE 118 Theatre Production 2  3
Spring  THE 122 Technical Theatre 2  3 +

University Academy
General Education
Students will earn 22 credit hours. They will have completed a significant portion of the general education requirements for CCAC and most other colleges and universities.

This academy leads toward CCAC’s General Education Certificate. The certificate provides college courses to promote competency in English composition, mathematics, analytical reasoning, cultural diversity and computer literacy. These courses cultivate valuable workplace skills and knowledge of the world essential for careers in the 21st century. This certificate also provides a basic building block for many associate degree programs at the college.

Year One
Fall  ENG 101 English Composition 1  3 +
Spring  ENG 102 English Composition 2  3 +
Spring  SEM 103 College Seminar  2

Year Two
Fall  MAT Mathematics Requirement  3–4 +
Fall  PSY 101 Introduction to Psychology  3
Spring  SPH 101 Oral Communication  3 +
Spring  CHM 109 Introduction to Chemistry  4 +

Business Academy
Accounting
Students will earn 17 credit hours toward the CCAC Accounting Certificate and will have three courses remaining to complete the award. The Accounting Certificate program is designed for those students seeking entry-level positions in the accounting field.

Year One
Fall  ACC 100 Introduction to Accounting  3
Spring  ACC 104 Financial Accounting  4 +

Year Two
Fall  CIT 100 Computer Fundamentals & Applications  3
Spring  ACC 120 Computer Applications in Accounting  3 +
Spring  CIT 140 Spreadsheets for Business Environments  4 +

Business Management
Students will earn 18–19 credit hours. They will have five courses remaining to complete the Business Management Certificate (216.1).

This academy leads toward CCAC’s Business Management Certificate. The Business Management program prepares students for entry-level positions dealing with business principles, procedures and problems. Graduates may qualify for a training program in business and industry, government or nonprofit organizations—and may find jobs in several functional

+ Some courses may have prerequisites.
Please check with your counselor or advisor for more information.
areas including, but not limited to, marketing, finance, human resource management or business administration.

**Year One**

- **Fall**: BUS 101 and/or ACC 100 3
- **Spring**: ACC 104 Financial Accounting 3-4

**Year Two**

- **Fall**: BUS 103 Principles of Management 3
- **Fall**: SEM 103 College Seminar 2
- **Spring**: ECO 102 Principles of Macroeconomics 3
- **Spring**: BUS 104 Principles of Marketing 3

## Entrepreneurship

Students will earn 17 credit hours. They will have three courses remaining to complete the Entrepreneurship Certificate (219.1).

This academy leads toward CCAC’s Entrepreneurship Certificate. Entrepreneurship provides an opportunity for economic self-sufficiency. Entrepreneurs possess the drive and energy to be successful, but need to learn certain critical skills for success.

This certificate program is designed to help students develop an understanding of how to create and sustain a small business—and focuses on providing the knowledge and understanding of what it means to be an entrepreneur. Students who successfully complete the program will have created a business plan, will understand how to find initial funding for that plan, and will be prepared to manage and market their small business.

### Year One

- **Fall**: BUS 104 Principles of Marketing 3
- **Spring**: BUS 112 Entrepreneurship 3

### Year Two

- **Fall**: BUS 140 Introduction to E-Commerce 3
- **Fall**: SEM 103 College Seminar 2
- **Spring**: BUS 143 Internet Marketing 3
- **Spring**: BUS 240 Small Business Management 3

## Health Professions Academy

### Health Foundations

Students will earn 22 credit hours. They will have laid the foundation for matriculation into more than 20 different health career programs.

This academy gives students the foundation for entry into Nursing or another Allied Health program. As more than 75% of health care is delivered by professionals other than physicians, students can work toward a career in a number of health-related fields.

CCAC is one of the nation’s leading producers of graduates with associate degrees in the health professions. The college can help you chart a path in diagnostic, therapeutic, patient or administrative services and prepare you for a health-related career both in the classroom and in state-of-the-science lab/clinical facilities.

### Year One

- **Fall**: BIO 110 Introduction to Biological Science 4+
- **Spring**: CHM 109 Introduction to Chemistry 4+

### Year Two

- **Fall**: BIO 161 Anatomy & Physiology 1 4+
- **Fall**: SEM 103 College Seminar 2
- **Spring**: BIO 162 Anatomy & Physiology 2 4+
- **Spring**: BIO 175 Microbiology 4+

## Tech Academy

### Cybersecurity

Students will earn 17 credit hours. To finish the cycle they will have no remaining courses to complete the Cybersecurity Support Specialist Certificate (791) and only one course to complete the cycle for the Network Support Specialist Certificate (792).

This academy leads toward CCAC’s Cybersecurity Support Specialist Certification. The program provides students with the specific technical competencies required for entry-level employment opportunities as a network cybersecurity support specialist, whose job description includes implementing security policies with respect to an organization’s servers and desktop and mobile equipment, along with ensuring the confidentiality, integrity and accessibility of data in its various forms as well as its storage. Students interested in later obtaining industry certifications such as CompTIA Network+ and Security+ can benefit from the knowledge and skills provided by this program.

### Year One

- **Fall**: CIT 115 Information Technology Fundamentals 3
- **Spring**: CIT 120 Networking Concepts 3

### Year Two

- **Fall**: CIT 150 Computer Configuration & Support 3
- **Fall**: SEM 103 College Seminar 2
- **Spring**: CIT 182 Principles of Cybersecurity 3
- **Spring**: CIT 250 Network Routing & Switching 3

## Robotics & Artificial Intelligence at West Hills Center

This academy leads toward CCAC’s Robotics and Artificial Intelligence Certification. The coursework will lay the groundwork for developing students’ technical knowledge and skills to work in fields that will experience significant growth in the years ahead.

+ Some courses may have prerequisites. Please check with your counselor or advisor for more information.
Skilled Professionals Academy

Administrative Computer Specialist

Students will earn 18 credit hours. They will have three courses remaining to complete the Administrative Computer Specialist Certificate (234).

This academy aligns with CCAC’s Administrative Computer Specialist Certificate, which is designed for students seeking to enhance their information technology skills to work in a business, professional, educational or industrial office environment.

Students learn the effective use of information technology and application software involving word processing, desktop publishing, spreadsheets, presentation graphics, e-commerce and databases.

Advanced Manufacturing at West Hills Center

This program prepares students to sit for the Manufacturing Skill Standards Council (MSSC) Certified Production Technician (CPT) industry credential and helps students acquire the common skills and competencies they will need to work in Pennsylvania’s manufacturing and energy industries. The program is designed to enable students to learn much of the course content online, with periodic labs on-site at CCAC’s West Hills Center. The cost of the credentialing exam is included in the course lab fees.

Aviation & Flight Training

Students are able to earn their private pilot certification and prepare to move towards advanced certifications. This program follows FAA Part 141 Curriculum and Certifications. Students must be 16 to legally fly solo and 17 to take their first FAA check ride.

Culinary Arts at Allegheny Campus

Students will earn 18 credit hours. They will complete the Culinary Basics Certificate (671). Students will achieve ServeSafe Industry certification in CLR 110.

This academy awards CCAC’s Culinary Basics Certificate. By providing students with hands-on instruction in fundamental culinary techniques, the program prepares students for an entry-level cook’s position in a commercial foodservice kitchen. It provides realistic, hands-on training by experienced chef instructors in the college’s commercial training kitchens. Certificate holders may find employment as prep cooks, line cooks, short order cooks, foodservice workers and bakery assistants in the restaurant, hotel, club, bakery and retail food industries. Students enrolled in this program are required to purchase a knife kit and uniform and are expected to be well groomed in compliance with standards of sanitation. Credits earned in this certificate program can be applied to the Culinary Arts Associate Degree program.
Heating & Air Conditioning Technology at West Hills Center

Students will be eligible to take EPA 608 Certification. This academy leads toward CCAC’s Heating & Air Conditioning Technology Certificate. This certificate program provides students with an opportunity to learn the concepts and practices of refrigeration, air conditioning and heating equipment along with the electrical knowledge required to work in this fast-growing industry. Students will be presented with the fundamentals of refrigerant heat transfer, safe work practices, electricity and the regulations governing the use of refrigerant gases. Medium and low temperature refrigerators, freezers, walk-in coolers and ice machines will be covered. Students will be trained in the application and troubleshooting of natural gas furnaces, air conditioning equipment and heat pumps by participating in both lecture and laboratory activities using actual live equipment and training simulators. EPA certification exams are administered during the program to enable students to purchase and safely handle refrigerants. Proper workplace communication and customer relations will be discussed. In addition, students will receive training in electrical safety and basic circuitry and motor controls.

Year One

| Fall  | SEM 103 College Seminar | 2 |
| Spring| HAC 120 HVAC Technical Documentation | 1 |

Year Two

| Fall  | HAC 101 Basic Electrical Wiring | 5*** |
|       | (Evening class; meets twice a week) |
| Spring| HAC 107 EPA Refrigerant Certification Preparation | 5*** |

Mechatronics at West Hills Center

Students will be prepared to take the MSSC CPT Certification tests following each course. Students will earn 18 credit hours. They will have six courses remaining to complete the Mechatronics Technology Certificate (723.2).

This academy leads toward CCAC’s Mechatronics Technology Certificate and provides skills and knowledge in four major areas: mechanical engineering, electrical engineering, electronic engineering and control systems. This technology training is relevant to several industries, including the natural gas industry, energy, manufacturing, and supply chain and logistics. Students who pursue this certificate will benefit from a technical core set of courses that combine industry-recognized certification and quality college education.

Typical job titles include: production, planning and expediting clerks, entry-level maintenance and repair workers, inspectors, testers, sorters, samplers and weighers, electro-mechanical technicians, industrial maintenance technicians and entry-level supply chain technicians.

Students who complete MEC 100 and MEC 102 will sit for the Manufacturing Skill Standards Council (MSSC) Certified Production Technician (CPT) industry credential. This is a National Association of Manufacturers (NAM) endorsed credential. The cost of the certification is included in the fees for the courses. There are additional, optional certifications students may wish to pursue to enhance their employability.

Students who successfully complete MEC 103, MEC 106 and MEC 156 will be prepared to sit for the Packaging Machinery Manufacturers Institute (PMMI) industry credential: PMMI Mechatronics Industrial Electricity 1. Students who successfully complete EGR 181 will be prepared to sit for the PMMI Mechatronics: Mechanical Components 1 industry credential. Students who successfully complete MEC 108 will be prepared to sit for the PMMI Mechatronics: PLC 1 industry credential.

CCAC is a proud member of the North American Process Technology Alliance (NAPTA) organization.

Year One

| Fall  | MAT 191 Math for Industries | 3 |
| Spring| EET 103 Introduction to Electronics | 3*** |

Year Two

| Fall  | EGR 170 Fluid Power Systems | 3*** |
| Fall  | SEM 103 College Seminar | 2 |
| Spring| EGR 181 Introduction to Mechanical Systems | 3*** |
| Spring| MEC 100 Mechatronics Safety & Quality | 3*** |

Welding Technology at West Hills Center

Students will earn 18 credit hours. They will complete the Welding Technology Certificate (317.3).

This academy leads toward CCAC’s Welding Technology Certificate. This certificate program provides students with the entry-level skills to work as welders in small and large companies. Students in this certificate program are eligible to take the American Welding Society D1.1 and D1.5 Certification Test. This program also offers students the skills that are necessary to read blueprints in the technical work area. Students may find employment as welders, fabricators or grinders.

Year One

| Fall  | WLD 101 Welding Fundamentals | 3*** |
| Spring| WLD 102 Advanced Welding | 3*** |
Social Services

Academy

Education & Child Development

Students will earn 23 credit hours. They will have three courses remaining to complete the Early Education & Child Development Certificate (622.5).

This academy leads toward CCAC’s Early Education & Child Development Certificate. The certificate program provides theoretical and practical information enabling students to develop job skills for working with infants, toddlers, school age children and their families. Students learn the developmental needs of children and developmentally appropriate activities for children of various ages. Students receive training in the physical, social, emotional and psychological needs of children. Information about children with special needs and their families is included in the program along with an emphasis on diversity and the professionalism needed for working with children and their families. Students become aware of the effects of social conditions on the development of children and study the laws and regulations pertaining to children and the agencies that work with them.

Students must be eligible for clearances through the Federal Criminal History Record (Act 114), Pennsylvania State Police Criminal History Check (Act 34) and the Pennsylvania Department of Public Welfare Child Abuse History Record Check (Act 151) and meet the local requirements of the field placement site.

Completion of this program enables students to work in child care centers, family day care homes, schools, agencies serving students with special needs or as in-home child care professionals. Graduates may seek employment as a child care assistant, nanny or as an early childhood educational assistant.

Homeland Security

Students will earn 22 credit hours. They will have completed the Homeland Security Certificate (616).

This academy awards CCAC’s Homeland Security Certificate. The program is designed to prepare students for positions as homeland security professionals in various occupations, including border, airport and seaport security as well as employment in the intelligence field, technology security, and disaster or emergency response. Risk management, systems integration, threat dynamics and the legal, political and ethical issues associated with homeland security are explored. The criminal justice system, perspectives on terrorism, cybersecurity and continuity of operations are also examined.

Notes

* Some program components offered at CCAC’s South Campus in West Mifflin
** Some program components offered at CCAC’s Allegheny Campus in Pittsburgh, North Shore
*** Some program components offered at CCAC’s West Hills Center in Oakdale, North Fayette Township

Denotes programs that are part of PA TRAC, which is a program articulation system to create seamless transfers from CCAC to state colleges and universities and other member institutions.