# 2023-2024

**High School Planning Guide** 



#### **Calvert County High Schools**

#### **Calvert High School**

520 Fox Run Blvd.

Prince Frederick, MD 20678

Mr. Darrel Prioleau, Principal

Main Office: 443-550-8880 Guidance Office: 443-550-8893

#### **Huntingtown High School**

4125 N. Solomons Island Road

Huntingtown, MD 20639

Ms. Beth Morton, Principal

Main Office: 443-550-8810 Guidance Office: 443-550-8816

#### Northern High School

2950 Chaneyville Road

Owings, MD 20736

Mr. Stephen Williams, Principal

Main Office: 443-550-8950 Guidance Office: 443-550-8941

#### **Patuxent High School**

12485 Southern Connector Blvd.

Lusby, MD 20657

Mr. Anthony Barone, Principal

Main Office: 443-550-8840 Guidance Office: 443-550-8855

#### Calvert County Middle Schools

#### **Calvert Middle School**

655 Chesapeake Blvd.

Prince Frederick, MD 20678

Ms. Rebecca Bowen, Principal

Main Office: 443-550-8970 Guidance Office: 443-550-8972

#### Mill Creek Middle School

12200 Southern Connector Blvd.

Lusby, MD 20657

Ms. Shelley Amstutz, Principal

Main Office: 443-550-9190 Guidance Office: 443-550-9203

#### Northern Middle School

2954 Chaneyville Road

Owings, MD 20736

Mr. Jaime Webster, Principal

Main Office: 443-550-8230 Guidance Office: 443-550-9228

#### Plum Point Middle School

1475 Plum Point Road

Huntingtown, MD 20639

Ms. Danielle Swann, Principal

Main Office: 443-550-9170 Guidance Office: 443-550-9175

#### Southern Middle School

9615 H. G. Trueman Road

Lusby, MD 20657

Mr. James Carpenter, Principal

Main Office: 443-550-9250 Guidance Office: 443-550-9259

#### Windy Hill Middle School

9560 Boyds Turn Road

Owings, MD 20736

Mr. Mark Whidden, Principal

Main Office: 443-550-9310 Guidance Office: 443-550-9313

#### **Calvert County Special Schools & Centers**

#### Career and Technology Academy

330 Dorsey Road

Prince Frederick, MD 20678

Ms. Carrie Akins, Principal

Main Office: 443-550-9940 Guidance Office: 443-550-9972

#### **Calvert Country School**

1350 Dares Beach Road

Prince Frederick, MD 20678

Ms. Rachel Lindauer, Principal

Main Office: 443-550-9910

## Calvert County Public Schools High School Planning Guide

## **Board of Education of Calvert County**

Inez N. Claggett
President

Antoine S. White Vice President

Dawn C. Balinski Member

Lisa M. Grenis Member

Jana L. Smith-Post Member

Margaret C. Rathgeb Student Representative

Dr. Andraé Townsel Superintendent of Schools

©202

Calvert County Public Schools
Divisions of Instruction & Student Services • 443-550-8000
1305 Dares Beach Road, Prince Frederick, MD 20678



1305 Dares Beach Road Prince Frederick, MD 20678 P 443-550-8000 • F 410-286-1358 www.calvertnet.k12.md.us

February 2023

Dear Calvert County Public School Students and Families:

Calvert County Public Schools (CCPS) offers a wide variety of courses for high school students. The Course Offering Guide can help you and your parents select the courses that are best for you and your future goals. Choosing the courses for your high school program is an important task that you should do thoughtfully as a family.

The Four-Year Plan of Study, unique to each student, outlines courses that align with future education and career goals. Each year, you will be asked to review the student's personal plan of study. As you select the courses, please consider the following: What courses are required for graduation? When will each required course be taken? What are the interests and areas wished to develop? What courses are best suited to the student's college and career goals?

This year, as a result of the Blueprint for Maryland's Future and subsequent decisions by the Maryland State Department of Education (MSDE), families in Calvert County should be aware of the following:

- Students in eleventh grade are required to take and pass Health II for graduation.
- Students entering 9<sup>th</sup> grade in 2023-2024 will have the State End of Course Assessment in Biology and Government count as 20% of their final grade.
- Students will be considered College and Career Ready if they pass both the Algebra I and English 10 Assessments.

If you have questions, I encourage you to schedule an appointment with a school counselor to develop your four-year high school plan. This is a wonderful opportunity to plan an academic program that moves you toward reaching each personal milestone for achievement.

Excellence in Truth and Service,

Dr. Andraé Townsel Superintendent of Schools Calvert County Public Schools does not discriminate on the basis of race, color, religion, sex, age, ancestry or national origin, familial status, marital status, physical or mental disability, sexual orientation, gender identity and expression, or genetic information or age in its programs and activities and provides equal access to the Boy Scouts and other designated youth groups. The following persons have been designated to handle inquiries regarding the non-discrimination policies:

- Director of Student Services
- Director of Human Resources 443-550-8000

For further information on notice of non-discrimination, visit the Office for Civil Rights Complaint Assessment System at https://ocrcas.ed.gov or call 1-800-421-3481.

\*\*\*\*\*\*\*\*\*\*\*\*\*\*\*

#### Anti-sexual, Anti-racial and Anti-disability Harassment Statement

Discrimination can manifest itself in behaviors such as bullying, harassment, or intimidation of individuals.

Calvert County Public Schools does not tolerate any form of harassment including, but not limited to, sexual, racial, or disability. Any individual (student, employee, or community member) who believes that he or she has been subjected to any form of harassment is encouraged to report the allegation of harassment.

Students, parents and community members may report allegations of harassment to:

Mr. James Kurtz Director of Student Services Calvert County Public Schools 1305 Dares Beach Road Prince Frederick, MD 20678

Employees may report allegations of harassment to:
Mr. Zachary Seawell
Director of Human Resources
Calvert County Public Schools
1305 Dares Beach Road
Prince Frederick, MD 20678

Calvert County Public Schools is committed to conducting a prompt investigation for any allegation of harassment. If harassment has occurred, the individual will be disciplined promptly. Disciplinary actions for students found to have engaged in any form of harassment may result in suspension or expulsion. Disciplinary actions for employees found to have engaged in any form of harassment may result in suspension or termination.

Calvert County Public Schools encourages all students, parents, employees, and community members to work together to prevent any form of harassment.

For further information on notice of non-discrimination, visit the Office for Civil Rights Complaint Assessment System at https://ocrcas.ed.gov for the office that serves your area or call 1-800-421-3481.

## Contents

Graduation Requirements	5
Maryland High School Certificate of Program Completion	10
Technology Education Requirement Courses	12
Fine Arts Requirement Courses	12
Academic Awards	13
Policy on Academic Eligibility for Athletics	13
Field Trips	13
Guidelines for Scheduling	14
Courses that Meet for One Semester	17
Alternatives to 4-Year Enrollment in a Public High School	18
Dual Enrollment Opportunities	19
Online Learning Program	
College and Career Preparation	23
COURSE DESCRIPTIONS	
Career & Technical Education	
Enrollment Procedures for Career & Technical Education (CTE) programs at the Career Academy	· & Technology
Career & Technical Education (CTE) Programs	
Business Education	
Computer Science	70
English	72
Family and Consumer Science	77
Fine Arts	78
Mathematics	
Naval Science/NJROTC	
Physical Education/Health and Wellness	
Preparatory Courses	
Science	
Social Studies	
Technology Education  World Language and ESOL	
Course Sequence Chart – Social Studies	
Course Sequence Chart – Mathematics	
Course Sequence Chart - Science	
Course Sequence Chart – World Language	
FOUR YEAR PLAN	120
	1/1

In the event that a CCPS policy or procedure referenced in this book changes after printing, the requirements in the updated policy or procedure will prevail.

#### **Graduation Requirements**

#### **Guidelines for Meeting Graduation Requirements**

All students must schedule a program of classes that leads to completion of credit requirements and must follow at least one of the two career pathways: Career and Technical Education (CTE) and/or College Prep. The guide that follows may assist students and their parent(s) in planning a four-year program of high school studies. (An example of the Four-Year Plan has been included at the end of this document for students entering high school in 2023.) Requirements are noted and other courses are suggested.

After reviewing the requirements for graduation, students should evaluate curricular and extracurricular interests before pursuing one of the pathways. Students should also learn the specific entrance requirements of those universities, colleges, business schools, technical schools or other post-secondary institutions to which they might apply for admission. Finally, students should consult with their teachers and school counselors for assistance in selecting appropriate courses.

NOTE: Calvert County Public Schools may not offer all courses during a particular school year. When courses do not reach a required minimum enrollment at a school, they may be cancelled or held synchronously online.

To earn the Maryland High School Diploma in Calvert County, a student must fulfill applicable Maryland State Board of Education and Calvert County Public School requirements. These requirements include successful completion of particular courses, passing high school assessments, and the completion of service learning. In addition, students must satisfactorily complete 4 years of approved study beyond the eighth grade unless one of the alternatives to the 4-year enrollment requirement is satisfied. (See Alternatives to 4-Year Enrollment Requirement in a Public High School on page 17 of this guide).

More specific information may be obtained from a teacher, school counselor, and/or school administrator.

#### **Graduation Requirements**

## CALVERT COUNTY PUBLIC SCHOOLS GRADUATION REQUIREMENTS FOR STUDENTS WHO ENTERED HIGH SCHOOL IN THE 2020-2021 SCHOOL YEAR OR EARLIER

To be awarded a diploma, a student shall be enrolled in a Maryland public school system and have earned a minimum of  $\underline{23 \frac{1}{2}}$  credits that include the following:

Subject Area	Specific Credit Requirements
English	4 credits
*Students are required to take a math course each year they are enrolled in high school.	<ul> <li>4 credits</li> <li>1 in algebra/data analysis</li> <li>1 in geometry</li> <li>2 other</li> </ul>
Science	3 credits
Social Studies	<ul> <li>3 credits</li> <li>1 in U.S. history</li> <li>1 in local, state, national government</li> <li>1 in world history</li> </ul>

#### **Maryland Comprehensive Assessment Program**

Students must meet the Maryland State Department of Education's end of course requirements.

#### **Other Requirements**

Subject Area	Specific Credit Requirements	
Fine Arts	1 credit	
Physical Education	½ credit	
Health	½ credit	
Technology Education	1 credit	
Financial Literacy	½ credit	
Pathway Requirements	College Prep: 2 credits in a World Language or advanced technology education	
	OR	
	CTE: Completion of a State-approved career & technical education program (3 or 4 credits based on the program of enrollment)	
Additional Credit Requirement	1 additional credit in an area of the student's personal interest to support a well-rounded education	
Elective Credits	1-3 elective credits for a total of 23.5 credits	

Students must also meet attendance and service-learning requirements.

## CALVERT COUNTY PUBLIC SCHOOLS GRADUATION REQUIREMENTS FOR STUDENTS WHO ENTERED HIGH SCHOOL IN THE 2021-2022 SCHOOL YEAR OR LATER

To be awarded a diploma, a student shall be enrolled in a Maryland public school system and have earned a minimum of <u>24</u> credits that include the following:

Subject Area	Specific Credit Requirements	
English	4 credits	
*Students are required to take a math course each year they are enrolled in high school.	<ul> <li>4 credits</li> <li>1 in algebra/data analysis</li> <li>1 in geometry</li> <li>2 other</li> </ul>	
Science	<ul> <li>3 credits</li> <li>1 in life science</li> <li>1 in physical science</li> <li>1 in earth/space science OR a course with the topics of earth/space science integrated</li> </ul>	
Social Studies	<ul> <li>3 credits</li> <li>1 in U.S. history</li> <li>1 in local, state, national government</li> <li>1 in world history</li> </ul>	

#### **Maryland Comprehensive Assessment Program**

Students must meet the Maryland State Department of Education's end of course requirements.

#### **Other Requirements**

Subject Area	Specific Credit Requirements	
Fine Arts	1 credit	
Physical Education	½ credit	
Health	1 credit	
Technology Education	1 credit	
Financial Literacy	½ credit	
Pathway Requirements	College Prep: 2 credits in the same World Language	
	OR	
	CTE: Completion of a State-approved career & technical education program (3 or 4 credits based on the program of enrollment)	
Additional Credit Requirement	1 additional credit in an area of the student's personal interest to support a well-rounded education	
Elective Credits	1-4 elective credits for a total of 24 credits	

Students must also meet attendance and service-learning requirements.

#### **Maryland Comprehensive Assessment Program**

Maryland Comprehensive Assessment Program (MCAP) Graduation Requirements for Students in American Government, AP United States Government, Biology, and AP Biology

In May 2021, the Maryland State Board of Education adopted a new assessment model for students taking the *American Government* and the *Life Science* (*Biology*)- *Maryland Integrated Science* (LS-MISA) Assessments. Currently, all Maryland high school students must sit for these assessments. Beginning with the 2023-2024 school year and thereafter, any student taking either the Government or LS-MISA assessment will take these assessments and have their converted scaled score count for 20% of their final course grade. 80% of a student's final course grade will be comprised of the student's four marking period grades, and the final 20% derived from the MCAP assessment. To meet the Maryland graduation requirement for these courses, a student must receive a passing grade once their course and MCAP grades are calculated together. For more information about the Maryland Comprehensive Assessment Program, visit the Maryland State Department of Education page at

https://www.marylandpublicschools.org/about/Pages/DAAIT/Assessment/EOCs/index.aspx.

#### **Service Learning**

Service Learning is a process by which students learn and develop through active participation in thoughtfully organized service experiences that meet actual community needs. These activities are coordinated between the schools and the community. The Calvert County Service-Learning model is a comprehensive, integrated curriculum involving several instructional areas. The goals of this program are to have students:

- accept some measure of responsibility for the welfare of others in their community;
- gain experience in planning a program of service learning;
- implement an action plan of service to the community; and
- engage in meaningful activities to reflect on the experience of performing service to the community.

The Service-Learning curriculum consists of three phases: preparation, action, and reflection. Certain subject areas are assigned major responsibilities for ensuring that these conditions are met. Students must earn 75 hours of service learning prior to graduation. All grade level projects were developed under content supervisor direction with input from selected teacher teams and community partner organizations.

Grade	Project Name	Subject	Student Service- Learning Hours
Grade One	Helping Pollinators	Science	5
Grade Two	Recycling Advocacy	Science	5
Grade Three	Terrapin Restoration	Science	8
Grade Four	Historic Preservation	Social Studies	7

#### **Graduation Requirements**

Grade	Project Name	Subject	Student Service- Learning Hours
Grade Five	Oyster Preservation	Science	10
Grade Six	Historic Preservation	Social Studies	15
Grade Seven	Bay Grasses in the Classroom	Science	15
Grade Eight	Environmental Data Bank Project	Science	15
Grade Nine	Site based Environmental Literacy Project	Biology	5
Middle and High School Students enrolling from other school Districts	Independent Study	TBD	Based on independent projects

#### Service-Learning Requirements for students new to Calvert County Public Schools:

With appropriate documentation, CCPS accepts the student service-learning experiences of students prior to their enrollment in CCPS. At the time of enrollment, official documentation of prior service beginning in grade one may be presented to the student service-learning coordinator for inclusion in the student's record.

- Students enrolling or entering CCPS for the **first** time during **grades 6 or 7** are required to earn <u>65</u> service-learning hours before graduation.
- Students enrolling in CCPS for the **first** time in **grade 8** are required to complete <u>50</u> approved service-learning hours before graduation.
- Students enrolling in CCPS for the **first** time in **grade 9** are required to complete <u>40</u> approved service-learning hours before graduation.
- Students enrolling in CCPS for the **first** time in **grade 10** are required to complete <u>30</u> approved service-learning hours before graduation.
- Students enrolling in CCPS for the **first** time in **grade 11** are required to complete <u>20</u> approved service-learning hours before graduation.
- Students enrolling in CCPS for the **first** time in **grade 12** are required to complete <u>10</u> approved service-learning hours before graduation.

#### **Graduation Requirements**

#### Maryland High School Certificate of Program Completion

The Maryland High School Certificate of Program Completion shall be awarded only to a student with disabilities who cannot meet the requirements for the Maryland High School Diploma but who meets other specified standards.

#### **Alternate Standards Framework Course Offerings**

The following high school courses are designed to provide specialized instruction to students enrolled in Functional Skills and Intensive Structured Learning Environment (ISLE) programs aligned with Maryland's alternate standards framework. This framework ensures that students can participate in instruction and assessments that measure what they know and can do in relation to alternate grade-level standards linked to the Maryland College and Career-Ready Standards (MCCRS). Students participating in these courses must have a current Individualized Education Program (IEP) in compliance with special education mandates and procedures and are eligible for Maryland's alternate assessment.

#### 0983 Math: Alternate Standards Framework:

This course is designed to provide students with instruction towards the most essential components of grade level, core academic content in high school mathematics, aligned to alternate academic achievement standards. Instruction is individually modified to meet the learning needs of each student and correlates grade level content to each student's Individualized Education Plan. This course is linked to the general education curriculum; however, each student will require a different scope and sequence with adapted and modified materials.

**CREDIT**: 0 **GRADE**: 9-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

#### 0981 English: Alternate Standards Framework:

This course is designed to provide students with instruction towards the most essential components of grade level, core academic content in high school English, aligned to alternate academic achievement standards. Instruction is individually modified to meet the learning needs of each student and correlates grade level content to each student's Individualized Education Plan. This course is linked to the general education curriculum; however, each student will require a different scope and sequence with adapted and modified materials.

**CREDIT**: 0 **GRADE**: 9-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

#### 0984 Science: Alternate Standards Framework:

This course is designed to provide students with instruction towards the most essential components of grade level, core academic content in high school Science courses, aligned to alternate academic achievement standards. Instruction is individually modified to meet the learning needs of each student and correlates grade level content to each student's Individualized Education Plan. This course is linked to the general education curriculum; however, each student will require a different scope and sequence with adapted and modified materials.

**CREDIT**: 0 **GRADE**: 9-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

#### 0982 Social Studies: Alternate Standards Framework:

This course is designed to provide students access to the basic topics in core academic content of high school social studies courses. Instruction is individually modified to meet the learning needs of each student and correlates grade level content to each student's Individualized Education Plan. This course is linked to the general education curriculum; however, each student will require a different scope and sequence with adapted and modified materials.

CREDIT: 0 GRADE: 9-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

## 0985 Community Access and Independent Living Skills: Alternate Standards Framework:

This course is designed to provide students regular and systematic instruction in everyday community settings using naturally occurring materials and situations. The emphasis is on acquisition and application of meaningful and age-appropriate skills. Instruction will take place within the school building and within the community setting.

**CREDIT:** 0 **GRADE**: 9-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

#### 0986 Career Exploration and Job Skills: Alternate Standards Framework:

This course is designed to provide students with access to career preparation, employability skills, workplace readiness, personal growth and development, and employment experiences. This course will provide direct links to transition services, adult agencies, and supports as students move from school to postsecondary options. Each student will require an individualized scope and sequence for progression through this course.

**CREDIT**: 0 **GRADE**: 11-12

PREREQUISITE: Approval of the IEP Team and participation in an alternate assessment

#### **Graduation Requirements**

#### **Technology Education Requirement Courses**

The successful completion of one of the following courses will fulfill the one credit graduation requirement in Technology Education:

Course #	Course Title
8000	Foundations of Technology
8000o	Foundations of Technology Online
8005	Introduction to Engineering Design
8006	Principles of Engineering
3505	Foundations of Computer Science
3505o	Foundations of Computer Science Online
3506	AP Computer Science Principles

#### **Fine Arts Requirement Courses**

The successful completion of one of the following courses will fulfill the one credit graduation requirement in Fine Arts:

Course #	Course Title	Course #	Course Title
6000	Dance I	6340	Chamber Chorus
6010	Dance II	6350	Music Theatre
6100	Art / Design	6370o	Music Appreciation (Online)
6110	Drawing & Paint	6060	Concert Chorus
6120	Advanced Drawing & Paint	6400	Concert Band
6130	Sculpture	6410	Symphonic Band
6135	Advanced Sculpture	6420	Wind Ensemble
6140	Ceramics	6430	Jazz Ensemble
6150	Advanced Ceramics	6440	String Orchestra
6180	Photography	6445	Adv. Strings Orchestra
6190	Advanced Photo	6450	Brass Ensembles
6200	Studio Art	6470	Percussion Ensembles
6209	AP Studio Drawing	6475	Symphony Orchestra
6219	AP Studio – 2D Design	6500	Theatre I
6229	AP Studio – 3D Design	6510	Theatre II
6239	AP Art History	6520	Advanced Acting I
6300	Music Theory	6530	Advanced Acting II
6309	AP Music Theory	6540	Advanced Acting III
6310	Chorale	6550	Stagecraft
6320	Chorus I		

Students may also fulfill their Fine Arts requirement by taking two (2) semesters of the following courses: 6480S Guitar I (this may be repeated for credit one time), 6485S Guitar II, 6490S Class Piano I, 6495S Class Piano II, 6570S Improvisational Theatre.

#### **Academic Awards**

#### **Superintendent's Scholastic Recognition Award**

Annually the Calvert County Board of Education and the Superintendent of Schools award pins and certificates in recognition of scholastic achievement. To qualify for selection in a particular year, a student must earn an unweighted grade of 90% or higher for every course of each marking period.

#### **Honor Roll Criteria**

A student must earn a grade point average of 80% or higher with no grade less than 70% in order to be placed on the Honor Roll for each marking period. Students must be enrolled in a minimum of four high school credits to be eligible for honor roll. Students who are enrolled in Advanced Placement courses will have their weighted grade factored into this award.

#### **High Honor Roll Criteria**

A student must earn a grade point average of 90% or higher with no grade less than 90% in order to be placed on the High Honor Roll for each marking period. Students must be enrolled in a minimum of four high school credits to be eligible for high honor roll. Students who are enrolled in Advanced Placement courses will have their weighted grade factored into this award.

#### **Graduating with Distinction**

In order to honor graduating students for meeting a high standard of academic achievement, seniors earning a weighted Cumulative Grade Point average of 3.9 or above will be recognized as "Graduates with Distinction." Please contact your child's school counselor for additional information.

#### **Policy on Academic Eligibility for Athletics**

Calvert County Public Schools policy #3452 and procedure #3452.1 pertain to high school and middle school academic eligibility for athletics.

A student must maintain a 70% grade point average (GPA), with no more than one failing grade (less than 60%). Students who fail a course worth two or more credits will be deemed ineligible. Marking period 1 grades will determine continued eligibility for the fall and winter eligibility. Marking period 2 grades will determine continued eligibility for winter and spring eligibility. Marking period 3 grades will determine continued eligibility for spring, and marking period 4 grades will determine eligibility for the fall.

#### Field Trips

Field trips designed to enhance instructional programs result in effective learning experiences. Students also benefit from observing or participating in events or activities that occur away from the school. Costs associated with these field trips include transportation, substitute teachers, and admission fees. For most field trips, these costs will be paid by students. In the event that a field trip fee places an undue burden on a family, parents and students should feel free to contact the principal.

#### **Guidelines for Scheduling**

It is the responsibility of the student to carefully evaluate and select courses. Students should obtain help from appropriate teachers, school counselors and/or administrators. Parental approval of course selections is required for all students.

#### The High School Organization

CCPS high schools have school days that are divided into seven class periods and a lunch period. Students are expected to schedule a full program of classes each year. Students are not permitted to audit classes. All courses must be taken for credit. The State of Maryland requires that all students take end of course assessments for graduation in Algebra, English 10, Science, and Government.

CCPS offers the following levels of instruction:

#### **Standard Classes**

Classes are designed for students on or above grade level. Assignments are challenging. Students will have frequent writing and reading requirements. They will be expected to fully participate in group activities in the classroom. Teachers frequently assess student mastery of content, and individual/groups of students may receive unique assignments to either enrich them or to address difficulties. Classes focus on both the essential elements of the curriculum and other related, significant areas of content knowledge.

#### **Honors Classes**

Honors classes provide an intensive and accelerated delivery of curricular content. Reading assignments are typically more frequent and of a more complex wide-ranging nature than standard level classes. Writing assignments and discussions are frequent, and there is an expectation that students actively participate in the class both as individuals and as groups of learners. Admission to Honors is, in general, open to students who have a numerical grade of 80% or higher in the pertinent subject matter area and in any other prerequisite courses or the recommendation of the most recent instructor in that academic discipline.

#### Advanced Placement (AP)

While not considered a separate instructional cluster, AP courses are taught at the college level. They afford advanced ninth, tenth, eleventh, and twelfth grade students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level. College credit is typically predicated on the attainment of a specific score on national standardized examination and attendance at one of the many colleges and universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive weighted credit in their grade point average.

#### **Current Advanced Placement Course Offerings**

Course #	Course Title	Course #	Course Title
1309	AP English Language and Composition	3506	AP Computer Science Principles
1309o	AP English Language and Composition <b>Online</b>	3519	AP Computer Science Coding
1409	AP English Literature and Composition	4209	AP Biology
1409o	AP English Literature and Composition <b>Online</b>	3429	AP Statistics
1759	AP French Language and Culture	3429o	AP Statistics Online
1859	AP Spanish Language and Culture	4309	AP Chemistry
2209	AP American History	4419	AP Physics C: Mechanics
2309	AP United States Government and Politics	4429	AP Physics: Electricity & Magnetism
2509	AP World History	4439	AP Physics 1
2519	AP European History	4449	AP Physics 2
2521	AP Human Geography	4509	AP Environmental Science
2549	AP Psychology	5179	AP Microeconomics
2549o	AP Psychology <b>Online</b>	6209	AP Studio-Drawing
3409	AP Calculus 1	6219	AP Studio-2D Design
3409o	AP Calculus 1 <b>Online</b>	6229	AP Studio-3D Design
3419	AP Calculus 2	6239	AP Art History
		6309	AP Music Theory

#### **Seminar Period for Advanced Placement Students**

Students may elect to enroll in a seminar period if they are taking 3 or more of the above Advanced Placement courses (not including science labs) in the same year. This non-credit course allows students who are encountering college-level workloads to meet as a group for inschool study or research time. Approval from the principal and counselor is required.

#### **Grade Level Requirements**

The minimum credit requirements for placement in each high school grade are as follows. Students who have earned:

- fewer than 5 credits will be placed in Grade 9;
- between 5 and 10 credits, including one required credit in English, will be placed in Grade 10:
- between 11 and 16 credits, including two required credits in English, will be placed in Grade 11:
- 17 or more credits, including two required credits in English, will be placed in Grade 12.

#### **High School Credit**

In the <u>Code of Maryland Regulations</u>, Title 13A, 03.02.02, a unit of credit is defined as "successful demonstration of a specified unit of study."

The Calvert County Public School System offers .5 high school unit of credit for one course, meeting daily for a semester.

#### **Special Education**

Special education services are provided to students identified as having an educational disability and in need of specially designed instruction. These students are educated according to their Individualized Education Program (IEP), and to the maximum extent

appropriate, with students who are not disabled. IEPs may also include related services such as speech, occupational or physical therapy, audiology, counseling and/or other services.

#### Interventions

Interventions are provided to students who have not achieved grade level standards. The goal of these interventions is to help students who are not making satisfactory progress return to the path of adequate development. Intervention supports are delivered by trained staff during and outside of the school day and may occur in the regular and/or special education classroom or in small group settings. Student enrollment in interventions is based upon the results of assessments and other data about classroom performance such as Maryland Comprehensive Assessment Program, CCPS benchmarks, and classroom assignments. This data is used to place students appropriately. Interventions may be short or long-term in duration.

#### **English for Speakers of Other Languages (ESOL)**

ESOL services are provided to students identified as English Learners. The ESOL program supports English Learners as they develop academic language proficiency in English and helps prepare them to meet the challenging academic achievement standards of all Maryland students. The regional program is located at Calvert High School.

#### **Composition of Grades**

Calvert County Public Schools recognizes that a student's grade for a course should reflect what the student knows and is able to do. To accomplish this, each assignment that is recorded in a teacher's gradebook will be identified as either a Product Assignment or a Process Assignment. Calvert County Public Schools defines these terms as follows:

<u>Product Assignments</u> – These assessments of learning are assignments and assessments given at a point in time when the teacher expects the students to have mastered the material. These could include—but are not limited to—district assessments, unit assessments, mid-unit assessments, benchmarks, quizzes, performance tasks, projects, term papers, essays, and presentations.

<u>Quarterly Assessments</u> – These assessments of learning occur within the marking period in which they are given. The central office determines when these assessments are given and the content standards that are covered. These include system-generated assessments and teacher-created assessments.

<u>Process Assignments</u> – These assessments of learning are assignments and assessments given at a point in time when the students are progressing towards mastery. Process assignments should vary in type. These could include—but are not limited to— independent practice on daily assignments, homework, brief progress checks, warm-ups, exit tickets, and reflections.

A student's grade in a course is based on a minimum of 60% product, 10% quarterly assessment, and a maximum of 30% process grades. Please see Policy #3415 and Procedure #3415.3 for more information.

#### **Courses that Meet for One Semester**

Courses that meet for only one semester increase the opportunities students have to pursue interests and meet academic requirements. Calvert County Public Schools will offer a limited number of courses for ½ of a credit during the school year. The number of students that enroll in a course will determine when a course is offered. If many students enroll, a course may run in both the fall and the spring semesters. If fewer students enroll, a course will be scheduled only in the fall or the spring. The following semesterized courses will be offered next year:

Course #	Course Title	Course #	Course Title
1010S	College Entrance Exams Preparation	6480S	Guitar I
1025S	Seminar for Advanced Studies	6485S	Guitar II
1050S	Strategies for Self Determination	6490S	Class Piano I
1055S	Strategies for Daily Living	6495S	Class Piano II
1101S	Freshman Seminar	6570S	Improvisational Theatre
1570S	Creative Writing	7008S	Unified Physical Education
2530S	African American Studies	7010S	Health I
2560S	Cultural Anthropology	7010So	Health I Online
2565S	Archeology	7020S	Team Sports
2580S	Women's History	7025S	Team Sports II
2585S	Sports and Society	7041S	Lifetime Activities
2590S	Honors Introduction to Philosophical Thought	7046S	Lifetime Activities II
2595S	History of the North American Indian	7050S	Weight Training and Physical Conditioning I
2710S	Service Learning/Independent Study	7060S	Weight Training and Physical Conditioning II
3122S	Academic Algebra 1 Lab	7085S	Fitness Fusion
5230S	Financial Literacy: Money Management	7086S	Fitness Fusion II
5230So	Financial Literacy: Money Management <b>Online</b>	7100S	Basic Athletic Training I
5240S	Computer Keyboarding for College and Careers	7110S	Basic Athletic Training II
		7115S	Health II

#### Alternatives to 4-Year Enrollment in a Public High School

In recognition of the fact that four-year enrollment in a public high school may not serve the best interests of some students, the following alternatives shall be made available:

#### **Option 1: Early Graduation**

The student chooses to apply for a waiver of the fourth year of high school and earn a high school diploma by the end of grade 11. All credits, state mandated assessments, and student service-learning requirements must be met prior to the start of the fourth year of high school, and the superintendent or designee must determine that the waiver is in the best interest of the student. To obtain more information on the early graduation option, students should meet with their school counselor. The deadline for submitting paperwork for early graduation is May 1 of the student's sophomore year.

## Option 2: Early Admission to an Accredited College or Vocational/Technical School The student chooses to be a full-time student at an accredited college or approved vocational, technical, or other post-secondary school rather than attend a fourth year of high school. The

student must have met criteria for this option, which include:

- All state mandated assessments
- Student service-learning requirements prior to the fourth year
- 2.7 cumulative GPA
- No more than 10 days of absence during the sophomore year
- Post-secondary institution's placement exams
- Post-secondary letter of acceptance

If the plan includes graduation requirements being fulfilled during the first year of college, the student must submit a written request for the high school diploma to the superintendent or designee, together with a transcript or letter from the post-secondary school indicating that the student has successfully completed a full year of post-secondary school work. Please see your school counselor for detailed information on this option.

#### **Option 3: General Educational Development Testing Program**

A Maryland High School Diploma may be awarded for satisfactory performance on approved General Educational Development tests, provided that the student meets those requirements as defined in Education Article §7-205, Annotated Code of Maryland and COMAR 13A.03.03.01.

#### **Option 4: Maryland Adult External High School Diploma Program**

A Maryland High School Diploma may be awarded for demonstrating competencies in general life skills and individual skills on applied performance tests, provided that the student meets those requirements as defined in COMAR 13A.03.03.02.

#### **Dual Enrollment Opportunities**

Dual College Enrollment and Concurrent College Enrollment for High School Students

A joint program between Calvert County Public Schools and College of Southern Maryland

Dual/Concurrent college enrollment for high school students is a program that offers certain Calvert County high school students the ability to earn college credits while still in high school. Students will find the College of Southern Maryland, Prince Frederick campus the most accessible and convenient campus, but they may choose to take classes from any of the four campuses of the College of Southern Maryland. While the college tries to schedule classes that appeal to dual/concurrent enrollment students in the afternoon; students may take approved classes at any time that fits their schedule. Schedule information (the days and times classes are offered) may be accessed on the CSM dual enrollment website at <a href="https://www.csmd.edu/apply-register/credit/high-school/dual-enrollment">https://www.csmd.edu/apply-register/credit/high-school/dual-enrollment</a>

#### **Enrollment Procedures for dual and concurrent enrollment:**

- ✓ Contact your high school counselor to verify that you meet the requirements for dual or concurrent enrollment.
- ✓ Apply for admission to the college online at the link below. (There is no fee for application.)
- ✓ Demonstrate college level placement (for CSM campus-based classes only). See website below.
- ✓ Complete the Dual Enrollment Recommendation Form online.
- ✓ Once an admissions decision is made, make an appointment with an enrollment advisor to register for your class(es). Call: 443-550-6000 and ask for a dual/concurrent enrollment advisor. Review information with your high school counselor to ensure you are signed up for appropriate courses.

Website for applying to CSM: <a href="https://www.csmd.edu/apply-register/credit/steps-to-enroll-credit-courses/highschool-student-admissions/dual-enrollment-student-admissions/">https://www.csmd.edu/apply-register/credit/steps-to-enroll-credit-courses/highschool-student-admissions/</a>

#### **DUAL ENROLLMENT OPPORTUNITIES**

A student is considered enrolled in a <u>dual enrolled course</u> at CSM if he or she is earning both high school credit and community college credit for that course. Tuition and fees for dual enrollment students are paid by CCPS. In some instances, students may take courses for both high school and college credit while remaining on the high school campus. In other cases, students may take a course at any CSM campus.

#### On a CCPS campus

Successful completion of selected courses taught at a CCPS high school may result in a student receiving college credits from CSM. Students who choose this option will take the course at one of CCPS's high schools, register in a CSM section of the course when the CSM enrollment advisor visits, and receive CSM credits as if they were taking the course at one of their campuses. Students who take advantage of this opportunity do not have to attend classes on a CSM campus. They receive all of their instruction within their high school.

- Students who successfully complete Academic Pre-Calculus, Honors Pre-Calculus, or Accelerated Algebra with Pre-Calculus at one of our high schools are given the opportunity to enroll with CSM into a section of MTH 1150 Precalculus Algebra and Trigonometry and receive four (4) college credits.
- Students who successfully complete Calculus 3 at one of our high schools are given the opportunity to enroll with CSM into a section of MTH 2200 Calculus III and receive four (4) college credits.
- Students who successfully complete Honors Composition and Rhetoric at one of our high schools are given the opportunity to enroll with CSM into a section of ENG 1010 Composition and Rhetoric and receive three (3) college credits.
- Students who successfully complete the full Project Lead the Way Biomedical program (four courses) with an 80% average for all four required courses and no more than one grade of "C" across all four courses are eligible to enroll with CSM into BIO-1040 Introduction to Human Anatomy & and BIO-1040L Physiology with Lab and receive four (4) college credits.
- Students who successfully complete Level I and Level II of Interactive Media Production are eligible to enroll in Digital Media Production 1010 and receive three (3) college credits.
- Students who are enrolled in the Academy of Health Professions Program and who successfully complete the Physical Rehabilitation pathway course are eligible to enroll in WFS 2000 (Kinesiology) and receive three (3) college credits.

A list of courses available for dual enrollment is available from your school counselor and is also on the CSM website.

#### CONCURRENT ENROLLMENT

A student is considered <u>concurrently enrolled</u> if he or she is earning community college credit for a course taken at CSM which is not offered through CCPS and simultaneously earning high school credit for courses taken at his or her high school. These college courses do not satisfy high school graduation requirements.

#### **College Requirements**

- Must have completed 10th grade and be at least 16 years old\*.
- Earned a cumulative high school grade point average of at least 2.5.
- Must complete placement tests in English, Reading, and/or Mathematics (if taking a math course).
- Students must receive a score which falls within the "college level range" as determined by CSM. (CSM only allows placement tests to be taken once)

\*In rare cases, younger students may qualify for dual or concurrent enrollment. Speak to your school counselor for additional information.

The deadline for application to the dual/concurrent enrollment program for spring is December 15. The deadline for application to the dual/concurrent enrollment program for fall is July 15. Requests made after these dates will be considered on a case by case basis by CCPS.

#### Benefits:

- Earn college credits while still in high school.
- Experience college while still living at home.

- Dual enrollment students do not have to pay for their tuition or fees. These costs are covered by CCPS.
- Expand course options once high school requirements have been completed.
- Transfer credits to other colleges and universities (plan course choices with a college advisor).
- Demonstrate on college admissions applications that you can succeed in college-level work
- Explore personal interests that might not be available in high school.
- Get involved with college and community activities (service learning, volunteerism and co-curricular activities).
- Save money and time.

#### **Online Learning Program**

Students from all four high schools will be able to participate in the Online Learning Program. Each student enrolled in the Online Learning Program will be assigned a mentor.

Students will be able to access course materials from any computer with internet access and may have a class period in their schedule allowing time for online coursework. Courses in the Online Learning Program run either 100% asynchronous or a blend of synchronous and asynchronous instruction. Taking a course through the Online Learning Program will provide students with scheduling flexibility while giving them an opportunity to collaborate with students across the county and have access to unique courses that might not be available at their home school.

Depending on student requests as of May, the following courses may be available for students to take online:

AP Offerings (1 Credit)	Full Year (1 Credit)	Semester (1/2 Credit)
AP Calculus I – 34090 AP English Lit & Comp - 14090 AP English Lang & Comp - 13090 AP Psychology – 25490 AP Statistics – 34290	Foundations of Computer Sci – 3505o Foundations of Tech – 8000o Music Appreciation – 6370o	Health – 7010So Financial Literacy – 5230So

Course offerings are subject to change based on MSDE approval.

#### **Time & Commitment**

- Online courses are rigorous and academically challenging.
- A substantial commitment is required by the student.
- Students should make and keep a schedule that commits to at least 6 hours each week for the course.
- Students can schedule no more than one online course outside of the regular school day.

#### **Attendance**

 Students who select to take online Health I or online Financial Literacy are required to attend face-to-face meetings (synchronous instruction). Meetings may be held after school, evenings, weekends, or held virtually depending on course content. See the course description for additional information regarding face-to-face meetings.

#### Communication

- The vast majority of communication with students and parents is conducted using email.
- Parents are required to provide a current working email.
- Student accounts will use their school issued Office 365 email.

#### **Registration & Fees**

- Students must complete the Online Learning Interest Survey prior to registration.
- Ninth graders are eligible for an online course during the spring of their freshman year.
- Upperclassmen will be given priority for course enrollment.
- Students taking a course beyond their 7 credits during the school year will be charged \$325 for a one credit course and \$225 for a half credit course. This includes a non-refundable fee of \$25 per course.



For more information, go to the Calvert County Public Schools webpage for Online Learning or contact the Office of Digital Learning.

#### College and Career Preparation

#### **College and Career Preparation**

Calvert County Public Schools is committed to helping every student be prepared to leave high school with a plan and focus for their life. Beginning in elementary school, students are exposed to different careers and career pathways and learn about their personal strengths that will contribute to their success. By the time students reach high school they are prepared to use Xello to search for various career and college information.

Xello is an engaging, online program that helps K-12 students define their future goals and transform their aspirations into actionable plans for success. The program puts students at the center of their college and career planning experience. It helps them build self-knowledge, explore their options, create a plan, and develop the 21st-century skills needed to thrive in the world of work. Learn more about Xello at <a href="https://www.xello.world">www.xello.world</a>.

Please reach out to your child's school counselor for more information or if you would like to set up an appointment to meet with them about your child's future planning.

Please take a few minutes to log in to Xello with your child.

#### How to access Xello

Students can log into Xello through their Clever account.

#### College and Career Preparation

#### **Preparing for College**

#### **University System of Maryland Requirements**

Each institution in the University System of Maryland (USMD) has its own decision criteria, which may be more rigorous than the system-wide minimum stated below, however, the following is required at all of the University System of Maryland colleges:

- √ High school diploma or its equivalent
- ✓ **Grade point average**-A high school grade point average equivalent to a C or better is required for admission of full-time and part-time entering freshmen who have graduated from high school within three years of intended enrollment.
- ✓ **Test Score**-A score on a nationally standardized examination such as the SAT or ACT is required of all applicants who have graduated from high school within three years of intended enrollment. (Some institutions are test optional.)
- ✓ **Minimum core content proficiency requirements**-In addition to the above stated requirements, high school seniors or graduates must demonstrate their readiness for college-level work by achievement at the appropriate level of competencies in the core content associated with the array of courses that follows:
  - o English 4
  - Biological and Physical Sciences 3
    - The courses completed must be in at least two different subject areas. Two of the three courses must include laboratory experience. For students interested in Science, Technology, Engineering, or Mathematics (STEM) related careers (such as medicine, engineering, the sciences, veterinary medicine, physical therapy, etc.), four years of science are recommended in three different science areas, with three laboratory experiences.
  - Social Science/History 3
  - Mathematics 4
    - Algebra I
    - Geometry
    - Algebra II
    - A math course higher than Algebra II
  - Language other than English or in some instances, Advanced Technology Education electives – 2
    - Must be two units of the same language (ASL counts as a language)
    - Students should consult the admissions office of the USM institution they are seeking to attend to determine if advanced technology is accepted in fulfillment of this requirement.

For more information refer to the USMD policy on undergraduate admissions at <a href="https://www.usmd.edu/regents/bylaws/SectionIII/III400.pdf">https://www.usmd.edu/regents/bylaws/SectionIII/III400.pdf</a>



#### **College Planning Timeline:**

#### Grades 9 and 10

#### □ Plan Ahead:

- Meet with your counselor to discuss your high school and post-secondary plans.
   Review your schedule and your 4-Year Plan to make sure you're enrolled in rigorous classes that will help you prepare for your future plans.
- Use Xello to complete interest and learning style inventories to find out more about yourself.
- o Get involved in extracurricular activities in high school.
- Get involved in community activities.
- Go to college and career fairs.

#### □ Learn about Colleges and Careers

- Use Xello as a resource to:
  - Save college and career searches
  - Learn about college costs and how financial aid works
  - Begin to build your resume: extra-curricular activities, sports, employment, leadership positions, awards/recognitions
- Visit colleges while they are in session and, if possible, speak to an Admissions counselor.
- Talk to friends and family members who are college students to find out more about specific colleges.

#### **□** Prepare for Tests:

 Talk to your counselor and teachers about taking the PSAT in mid-October in your freshman and/or sophomore year (CCPS pays for all sophomores to take the test). The PSAT is a good predictor of scores on the SAT and may make you eligible for scholarships. https://www.collegeboard.org

#### **☐** Make the Most of Summer Opportunities:

- Look for a great summer opportunity: job, internship or volunteer in the community.
- Start a summer reading list. Ask teachers to recommend books.



## College and Career Preparation

#### <u> Grade 11</u>

Revie	w your academic credentials			
	Review your 4-Year Plan, post-secondary plans, GPA and class rank with your school counselor. Make sure you continue to take the most rigorous courses you can.			
	Update your resume on Xello with any new information.			
Take t	he PSAT/NMSQT:			
	■ At school, sign up early to take the PSAT/NMSQT in October.			
	https://www.collegeboard.org			
	Start Your College Search:			
	Start with you: Make lists of your abilities, preferences and personal qualities. List things			
_	you may want to study and do in college.			
	Jump-start your college planning by reading about majors and careers.			
	Use Xello to search for colleges with the right characteristics.			
	Thinking about Financial Aid:			
	Talk to your counselor about your college plans. Attend college night and financial aid			
	night at your school or another school in the county.			
ч	Log onto Xello to use search tools on colleges and financial aid.			
	eady for the SAT:			
	Schedule Your Spring Testing			
	Review standardized policies for colleges that you are interested in applying to so that			
	you can plan what tests you will need to take.			
Ц	You can take either the SAT or up to three SAT Subject tests on one test day. Plan your			
	testing schedule carefully if you want to take both, and register for two separate test dates. See the SAT schedule of test dates and register online for the SAT.			
	https://www.collegeboard.org			
	Prepare for the SAT by taking a free full-length official practice test. Then get a score			
_	and skills report. Learn which skills you need to improve. You can also use Khan			
	Academy to help prepare for or improve your score.			
	Contact your school counselor to find out about fee waivers/eligibility.			
	Explore Colleges			
	<ul> <li>Start visiting local colleges and get a feel for what works for you.</li> </ul>			
	<ul> <li>Develop an initial list of colleges that interest you. You can narrow it down</li> </ul>			
	later.			
	Prepare for AP Exams			
	Plan Ahead for the summer and Senior Year			
	Review your senior year class schedule with your counselor. Challenge yourself			
	with honors, AP classes, or dual enrollment courses.			
	Plan summer activities early. Enrich yourself by volunteering or getting an			
	interesting job or internship.			
Ц	Keep Up Your Momentum			
	<ul> <li>Visit colleges and narrow your list of schools that you are interested in. Take campus tours and, at colleges you're serious about, schedule interviews</li> </ul>			
	with admission officers.			
	<ul> <li>Save colleges that you are interested in to your plan in Xello and review the</li> </ul>			
	requirements for entrance. Check important dates; some colleges have			
	early dates or rolling admission.			

#### Grade 12

#### **Getting Started**

	Finalize your resume in Xello.  Discuss college/career options with your counselor and parent(s).  Research admissions standards and know what testing/courses are required.  Personally visit college campuses.
	Take advantage of SAT Prep courses before repeating the SAT.
	mmer before 12th Grade/Fall
	Take SAT and/or ACT if you haven't already, or if you need to improve your score. Check if the SAT Subject Tests are also required. https://www.collegeboard.org Begin preparing college applications and essays; have someone proofread this work. Attend college fairs and talk with college representatives visiting your school. Learn about all deadline dates for colleges and scholarships.
	Talk with your school counselor about the process for requesting high school transcripts.  Complete the NCAA Clearinghouse Initial Eligibility Form if you plan to play college sports (Division I or II).
	Talk with teachers and school counselors who will be writing letters of recommendation. Provide them with copies of your resume or recommendation request form.
	Have your English teacher or other trusted adult review your essay.  Set up a file for each college and/or scholarship application or use the College Application Tracker in Xello.
	Investigate all potential sources of financial aid. Check the guidance office and Xello regularly for scholarship information.
	On or after October 1 <sup>st</sup> , complete the Free Application for Federal Student Aid (FAFSA) application online at FAFSA.ed.gov
	Apply for Senatorial and Delegate scholarships.  Apply for scholarships.
	Attend a financial aid night and explore all options for assistance; ask questions. Submit your applications!
Sp	ring
	Reply to colleges to notify them of your final choice.  Make a final visit to the college of your choice.  Reply promptly to all financial aid awards. A missed deadline could mean lost aid!  Send in room deposits, if necessary.  Take college placement exams, if necessary.  Request high school guidance office to send transcripts and proof of graduation to the college of your choice.

### **COURSE DESCRIPTIONS**

Career & Technical Education	29
Academy of Health Professions	36
Accounting	
Apprenticeship Maryland	
Auto Mechanics – Service Technician	
Business Administrative Services	
Business Management	
Career Research and Development	
Carpentry	
CISCO Networking Academy & Cybersecurity  Computer Science	
Cosmetology	
Criminal Justice/Law Enforcement	
Culinary Arts	
Curriculum for Agricultural Sciences Education (CASE)	
Electricity	
Firefighter/Emergency Medical Technician	
Graphic Arts	
Home Improvement	57
Interactive Media Production	58
Naval Science	59
Plumbing, Heating, Ventilation, & Air Conditioning	
Project Lead the Way – Biomedical Sciences	
Project Lead the Way – Pathway to Engineering	
Teacher Academy of Maryland (TAM)	
Welding	65
Business Education	67
Computer Science	70
English	72
Family and Consumer Science	77
Fine Arts	78
Mathematics	88
Naval Science	93
Physical Education/Health and Wellness	95
Preparatory Courses	
Science	
Social Studies	
Technology Education	
World Language and ESOL	

In order to receive a Maryland High School Diploma, students must complete a program of study, or pathway. There are two possible pathways. One is the College Preparatory Pathway. Another option for students is to complete a pathway in Career and Technical Education.

Career and Technical Education (CTE) is relevant, authentic learning that gives students real job-related experiences and allows them to pursue areas of strength as well as areas of interest. It is this relevance and authenticity that provides students an educational program that truly prepares them for a career and/or college. In many CTE programs, students have an opportunity to earn college credits while still in high school.

Calvert County Public Schools offers a wide variety of CTE programs of study. Of these programs, fourteen are offered at the Career and Technology Academy (CTA), which is adjacent to Calvert High School's campus in Prince Frederick. All programs at the CTA are designed to prepare students for post-secondary education and/or employment. Programs at the CTA are two year programs. Students attend CTA in eleventh grade for level one and in twelfth grade for level two. Level one classes are generally two periods long and level two classes are three periods long. Students in level one classes also take their English course while at CTA.

The comprehensive programs are open to all eleventh and twelfth-grade students. Students who are repeating tenth grade may enroll in Career and Technology Academy courses with their high school principal's permission. Priority for enrollment in level one courses is given to eleventh grade students. Twelfth graders are permitted to enroll in level one if space is available.

At CTA, Job Placement Services provide employment readiness training for career and technology education students in the fourteen program areas. Students learn to correctly complete a job application, resume, and cover letter, and will participate in individual job interviews. Seniors receive a portfolio which includes their transcript, resume, employability profile, and job application.

The CTE programs available at CTA are:

- Academy of Health Professions
- Automotive Service Technician
- Carpentry
- CISCO Networking & Cybersecurity
- Cosmetology
- Culinary Arts
- Curriculum for Agriculture Science Education (CASE)
- Electricity
- Firefighter/Emergency Medical Technician
- Graphic Arts
- Home Improvement
- Interactive Media Production
- Plumbing, Heating, Ventilation, and Air Conditioning
- Welding

In addition to the CTE programs available at CTA, many Career and Technical Education programs are offered at the four high schools. Programs consist of three to five courses. Students may complete one of the following CTE programs without ever leaving their home school:

- Accounting
- Apprenticeship Maryland
- Business Administrative Services
- Business Management
- Career Research and Development
- Computer Science
- Criminal Justice/Law Enforcement
- Naval Science/NJROTC
- Project Lead the Way Biomedical Sciences
- Project Lead the Way Pathway to Engineering
- Teacher Academy of Maryland (TAM)

Students who complete both a college prep pathway as well as a CTE pathway are referred to as Dual Completers. Dual completion provides students with more options upon graduating from high school. Students who graduate as dual completers are prepared to continue their education in college as well as to enter the workforce.

#### <u>Articulation Agreements for Career and Technical Education Programs of Study</u>

The majority of the pathways have articulation agreements in place with community colleges, technical colleges or universities which provide college credit for the completion of high school courses. Some of the programs have a "memorandum of understanding" in place with a local union giving CCPS graduates a head start when joining a union. For more information, please call the CTA.

Below is a list of articulation agreements by program:

Pathways	Location of Program	Articulation
Academy of Health Professions	СТА	CSM
Business Management	Home High School	CSM
Accounting	Home High School	CSM
Automotive Service Technician	СТА	Advanced Technical Institute Community College of Baltimore County Nashville Auto Diesel College Ohio Technical College Pennsylvania College of Technology Universal Technical Institute University of Northwestern Ohio
Carpentry	CTA	Mid-Atlantic Carpenters Training Center

Pathways	Location of Program	Articulation
CASE	СТА	Blue Ridge Technical and Community College Community College of Baltimore Delaware Valley University Rutgers University St. Mary's College of Maryland University of Maryland – Institute of Applied Agriculture
CISCO Networking & Cybersecurity	СТА	CSM
Criminal Justice/Law Enforcement	Home High School	CSM
Culinary Arts	СТА	Anne Arundel Community College Johnson & Wales University
Fire Fighter/EMT	СТА	University of Maryland
Graphic Arts	СТА	Boston University CSM
Home Improvement	СТА	MidAtlantic Carpenters Training Center
Interactive Media Production	СТА	CSM
P-HVAC	СТА	CSM Unions
Project Lead the Way- Pathway to Engineering	Home High School	CSM UMBC
Project Lead the Way- Biomedical Sciences	Home High School	CSM Stevenson University
Teacher Academy of Maryland	Home High School	Bowie State University Coppin State CSM Frostburg State University Hood College McDaniel College Morgan State University Salisbury University Stevenson University St. Mary's College of Maryland Towson University
Welding	СТА	Unions

#### The following programs are offered at each of the four home high schools:

	Course		
Program	Number	Course Name	Credits
	5000	Principles of Business Administration and Management	1
Accounting   5000   Principles of Business Administration and Management   5050   Principles of Accounting   5060   Advanced Accounting   8680   Apprenticeship Work-Based Learning Experience I   8681   Apprenticeship Work-Based Learning Experience II   8682   Apprenticeship Work-Based Learning Experience II   8683   Apprenticeship Work-Based Learning Experience II   8683   Apprenticeship Work-Based Learning Experience II   8000   Principles of Business Administrative Services   5050   Principles of Business Administration and Management   5050   Principles of Accounting   5050   Principles of Biomedical Sciences   5050   Principles of Biomedical Sciences   5050   Principles of Engineering   5050   Principles of Curriculum and Instruction   5050   Foundations of Curriculum and Instruction   5050	1		
	5060	Advanced Accounting	1
	8680	Apprenticeship Related Technical Instruction	1
Apprenticeship	8681	Apprenticeship Work-Based Learning Experience I	1
Maryland (Pilot)	8682	Apprenticeship Work-Based Learning Experience II	1
	8683	Apprenticeship Work-Based Learning Experience III	1
Ducinosa	5000	Principles of Business Administration and Management	1
	5050	Principles of Accounting	1
	5030	Office Systems Management (Word/PowerPoint)	1
Services	5100	Office Systems Management (Excel/Access)	1
Dusinss	5000	Principles of Business Administration and Management	1
	5050	Principles of Accounting	1
wanagement	5160	Advanced Business Management	1
Carrage Daggarah	8650	Career Research Development	1
	8660	Career Research Development Seminar	1
and Development	8665	Work-Based Learning Experience	1
	3506	AP Computer Science Principles	1
Computer	3511	App Development	1
Science	3519	AP Computer Science Coding	1
		OR Dual Enrollment (see 3519 for info)	
	2600	American Criminal Justice System	1
Criminal Justice /	2610	Juvenile Justice	1
Law Enforcement	2620	Criminal Law	1
	2630	Criminal Investigation	2
Novel Science/	7210	Naval Science I	1
Law Enforcement  Naval Science/ NJROTC	7220	Naval Science II	1
NJKOTO	7230	Naval Science III	1
Droject Lead the	8025	Principles of Biomedical Sciences	1
Apprenticeship Maryland (Pilot)  8681 Apprenticeship Work-Based Learning Experience I 8682 Apprenticeship Work-Based Learning Experience II 8683 Apprenticeship Work-Based Learning Experience III 8684 Apprenticeship Work-Based Learning Experience III 8685 Apprenticeship Work-Based Learning Experience III 8686 Principles of Business Administration and Management 8600 Office Systems Management (Word/PowerPoint) 8600 Principles of Business Administration and Management 8600 Principles of Business Administration and Management 8600 Principles of Business Administration and Management 8600 Principles of Accounting 8600 Principles of Accounting 8600 Principles of Accounting 8600 Advanced Business Management 8600 Career Research Development 8600 Career Research Development Seminar 8600 AP Computer Science Principles 8600 AP Computer Science Principles 8600 AP Computer Science Coding 9 OR Dual Enrollment (see 3519 for info) 8600 American Criminal Justice System 8600 Criminal Investigation 8600 Criminal Investigation 8600 Criminal Investigation 8600 Principles of Biomedical Sciences 8600 Naval Science II 8600 Principles of Biomedical Sciences 8600 Research Principles of Engineering Design (Prerequisite course) 8600 Research Principles of Engineering Design and Development Progent Research Profession 8600 Research Profession 8600 Research Principles of Engineering Design and Development Principles Science Principles of Engineering Design and Development Principles Science Principles of Engineering Design and Development Principles Science Principles Principles Science Principles Principles Principles Principles Principl	1		
	8027	Medical Interventions	1
ociences	8028	Biomedical Innovation	1
	8005	Introduction to Engineering Design (Prerequisite course)	1
Project Lead the	8006	Principles of Engineering	1
•	8007	Digital Electronics	1
_	8008	Aerospace Engineering	1
Liigiiieeiiiig		<u> </u>	
		· · ·	1
		·	1
Teacher Academy	5510	•	1
of Maryland (TAM)	5520	Foundations of Curriculum and Instruction	1
	5530	Education Academy Internship	1

#### The following programs are offered at the Career and Technology Academy (CTA):

Program	Course Number	Course Name	Credits
	8061	Academy of Health Professions I	2
Academy of Health Professions	8071 8072	Academy of Health Professions II Track A (CCMA) OR Academy of Health Professions II Track B (Physical Rehabilitation)	3
Automotive Service Technician	8941	Service Technician I (Brakes, Steering, and Suspension)	2
lecimician	8951	Service Technician II	3
Composition	8271	Carpentry I	2
Carpentry	8281	Carpentry II	3
CISCO Networking &	8441	Introduction to Network Engineering	2
Cybersecurity	8452	CCNA and CyberOps	3
Commetalomy	8360	Cosmetology I	3
Cosmetology Culinary Arts	8371	Cosmetology II	3
Outlines Auto	8511	Culinary Arts I	2
Culinary Arts	8521	Culinary Arts II	3
O	8035	Intro. to Agriculture, Food, and Natural Resources (AFNR)	1
Curriculum for	8036	Principles of Agricultural Science – Animal (ASA)	1
Agricultural Science	8037	Animal and Plant Biotechnology	1
Education (CASE)	8038 or 8039	Agricultural Business, Research, and Development	1/2
Floatricity	8411	Electricity I	2
Electricity	8421	Electricity II	3
Firefighter/Emergency	8994	Emergency Medical Technician (EMT)	3
Medical Tech	8998	Firefighting	3
Graphic Arts	8611	Graphic Arts I	2
Graphic Arts	8621	Graphic Arts II	3
Home Improvement	8871	Home Improvement I	2
Tionie improvement	8881	Home Improvement II	3
Interactive Media	8631	Interactive Media Production I	2
Production	8641	Interactive Media Production II	3
Plumbing, Heating, Ventilation, and Air	8124	Heating, Ventilation, and Air Conditioning I	2
Conditioning	8125	Heating, Ventilation, and Air Conditioning II	3
Welding	8911	Welding I	2
Welding	8921	Welding II	3

## Enrollment Procedures for Career & Technical Education (CTE) programs at the Career & Technology Academy

Programs at the Career & Technology Academy (CTA) are two-year programs. Students may begin these programs in the Junior year and will complete them during the Senior year. The enrollment process begins January 1<sup>st</sup> of the student's sophomore year.

#### ALL interested students must complete the CTA ENROLLMENT FORM

The priority enrollment period begins January 1st and closes the last Thursday of February at 5:00 p.m.

## If the student completes the CTA Enrollment Form DURING the Priority Enrollment Period:

- If there are <u>equal to or fewer</u> students interested in a program than there are spaces available, all students who completed during the priority enrollment period will receive a placement in the program. These students will be contacted no later than the last week of March.
- If there are <u>more</u> students interested in a program than there are spaces available, students who are interested in the program will move to the next step.
  - <u>ALL</u> interested students will be required to attend an orientation session for the program.
  - All students who attended orientation will be entered into a lottery.
  - Names are drawn at random until the program is full.
  - Any remaining students are added to a waiting list.
  - Students are notified of their placement status no later than the last week of March.

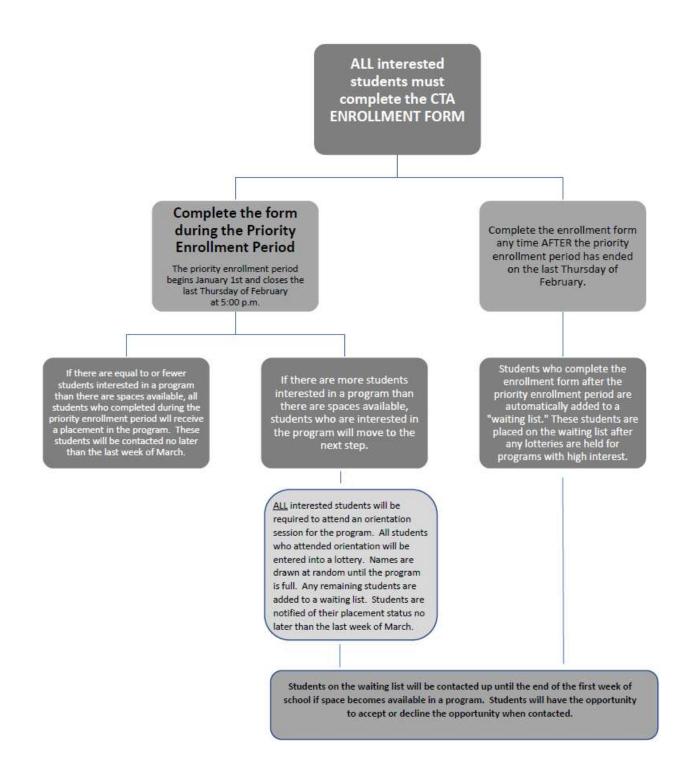
## If the student completes the CTA Enrollment Form any time AFTER the priority enrollment period has ended on the last Thursday of February:

- Students who complete the enrollment form after the priority enrollment period are automatically added to a "waiting list."
- These students are placed on the waiting list after any lotteries are held for programs with high interest.

Students on the waiting list will be contacted up until the end of the first week of school if space becomes available in a program. Students will have the opportunity to accept or decline the opportunity when contacted.

Flowchart

## Enrollment Procedures for Career & Technical Education (CTE) programs at the Career & Technology Academy



## **Career & Technical Education (CTE) Programs**

## **Academy of Health Professions**

Program	Course	Course Name	Credits
1.09	Number		Oroano
	8061	Academy of Health Professions I	2
	8071	Academy of Health Professions II Track A – Nursing	
Academy of Health		Assistant & Medical Assistant	
Professions	8072	OR Academy of Health Professions II Track B –	3
		Nursing Assistant and Physical Rehabilitation/Sports	
		Medicine	

**8061** Academy of Health Professions I (Academy of Health Professions Level I is comprised of two courses: Foundations of Medicine and Health Science and Structure and Functions of the Human Body)

The Academy of Health Professions pathway is a program designed for students who plan to pursue healthcare careers that involve direct patient care. In the junior year, students will learn Anatomy and Physiology, basic disease processes, and simple medical skills. In addition, students will become certified in both American Heart Association First Aid and Health Care Provider CPR. The junior year in the Academy of Health Professions serves as a foundation for the skills learned and certifications acquired during the senior year. Any student who successfully completes 8061 and 8071 with an 80% or greater and attends CSM will be eligible for college credit from CSM. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

**PREREQUISITE:** Successful completion with a grade of 70% or higher in Biology (4204 or 4207).

## **Academy of Health Professions II**

Academy of Health Professions II highlights direct patient care related to multiple health disciplines. Emphasis is placed on preparing the student for hands-on experiences in various healthcare fields. Students choose from two different track options allowing them the opportunity to specialize their educational training in an area that best meets their future career goals. In both tracks, students who qualify will be given an opportunity to participate in a 40-hour clinical rotation at a local healthcare facility. Students must meet criteria set forth by host sites for participation in clinical experiences. These *may* include completion of a background check and/or flu, COVID-19, or other vaccinations. Qualifications are set by the partner facilities, not by CCPS. Any student ineligible for participation in clinicals for these reasons will not have grades penalized and will be provided with alternate learning activities. However, note that the 40-hour clinical rotation is required in order to be eligible for some certifications as set forth by the Maryland Board of Nursing. Please see below for course numbers and descriptions of both track options.

# **8071** Academy of Health Professions II Track A- Nursing Assistant & Medical Assistant (Academy of Health Professions Level II Track A is comprised of two courses: Certified Nursing Assistant and Certified Clinical Medical Assistant)

In Track A, students will spend one semester learning Certified Nursing Assistant (CNA) and Geriatric Nurse Assistant (GNA) content and one semester learning Certified Clinical Medical Assistant (CCMA) content. The CNA and GNA curricula focus on direct patient care in a hospital setting or a long-term care facility. Students learn hands-on patient care skills in a hospital lab environment and then attend a 40-hour clinical rotation to work with real patients. The CCMA curriculum prepares students to work in a

medical office by teaching EKG, Phlebotomy, Medical Office skills, and Pharmacology. At the end of the senior year, students who meet the requirements can sit for the Certified Nursing Assistant, Geriatric Nursing Assistant, and Certified Clinical Medical Assistant certification exams. These certifications prepare students for post-secondary education or immediate employment upon graduation. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance with program fees and purchase of materials is available for students who qualify. Any student who successfully completes 8061 and 8071 with an 80% or greater and attends CSM will be eligible for college credit from CSM.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion with a grade of 70% or higher in Academy of Health Professions I (8060).

8072 Academy of Health Professions II Track B- Nursing Assistant & Physical Rehabilitation/Sports Medicine (Academy of Health Professions Level II Track B is comprised of two courses: Certified Nursing Assistant and Physical Rehabilitation) In Track B, students will spend one semester learning Certified Nursing Assistant (CNA) and Geriatric Nursing Assistant (GNA) content and one semester studying Physical Therapy/Sports Medicine content. The CNA and GNA curricula focus on direct patient care in a hospital setting or a long-term care facility. Students learn hands-on patient care skills in a hospital lab environment and then attend a 40-hour clinical rotation to work with real patients. At the end of the CNA semester, students who meet the requirements can sit for the Certified Nursing Assistant and Geriatric Nursing Assistant (GNA) certification exams. These certifications prepare students for post-secondary education or immediate employment upon graduation. The Physical Therapy/Sports Medicine curriculum will train students in areas related to physical injuries and rehabilitative services. Topics include anatomy and clinical kinesiology, range of motion and functional mobility, general principles of physical therapy, and exercise therapy. In addition to classroom and lab learning, students will attend an internship opportunity to gain experience working with physical therapists and athletic trainers. At the end of the Physical Therapy/Sports Medicine semester. students will receive documentation of all internship hours which can be used for admission to college or for employment upon graduation. Any student who successfully completes 8061 and 8071 with an 80% or greater and attends CSM will be eligible for college credit from CSM. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance with program fees and purchase of materials is available for students who qualify. **COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion with a grade of 70% or higher in Academy of Health Professions I (8060).

## Accounting

Program	Course	Course Name	Credits
	Number		
	5000	Principles of Business Administration and Management	1
Accounting	5050	Principles of Accounting	1
	5060	Advanced Accounting	1

#### 5000 Principles of Business Administration and Management

This is a required course in all four Business, Management, and Finance pathways. In this course you will learn the basic principles surrounding economics, management, marketing, accounting, business ethics, business law, business communication, and careers in business. Enjoy many online learning programs, listen to and learn from motivational guest speakers representing various fields in business.

CREDIT: 1 TYPE: Academic GRADE: 9-12

### 5050 Principles of Accounting

This is a required course in all four Business, Management, and Finance pathways. This course provides students with the skills and knowledge necessary to manage and maintain a small company's financial resources in daily operating decisions. Students will learn to apply generally accepted accounting principles to determine the value of assets, liabilities, and owner's equity as they apply to various forms of business ownership. In addition, students will prepare, interpret, and analyze financial statements using manual and computerized systems for service and merchandising businesses. Upon completion of the course, students will also have a good understanding of payroll, payroll and sales tax liabilities and have the skills to manage a business checking account.

CREDIT: 1 TYPE: Academic GRADE: 10-12

### 5060 Advanced Accounting

This course explores methods for using accounting data in planning, controlling, predicting, and evaluating business initiatives. Students learn to make business decisions which integrate tools such as cash flow analysis, cost, accounting, cost volume profit analysis, budgeting, and other quantitative methods. Software will be used to apply accounting principles learned in this class. This course will prepare students to enter the workforce and provide the tools for success in college. This course, along with Accounting I, is articulated with the College of Southern Maryland.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of Principles of Accounting (5050) with a 70% or higher AND completion of or concurrent enrollment in Principles of Business Administration and Management (5000).

## **Apprenticeship Maryland**

Program	Course	Course Name	Credits
	Number		
	8680	Apprenticeship Maryland Related Technical Instruction	1
	8681	Apprenticeship Maryland Work-based learning	1
Apprenticeship		Experience I	
Maryland	8682	Apprenticeship Maryland Work-based learning	1
wai yianu		Experience II	
	8683	Apprenticeship Maryland Work-based learning	1
	0003	Experience III	

## **Apprenticeship Maryland Program Overview:**

The Apprenticeship Maryland Program is offered to eligible juniors and seniors throughout Calvert County. Instruction for this program primarily occurs off-site at approved work-based learning and other instructional locations. Acceptance to the program depends on a competitive application process, to include a written application and in-person interview. The number of students accepted to the program depends upon the number of Youth Apprenticeship Sponsors/sites available.

The Apprenticeship Maryland Program is coordinated through a partnership between the Maryland State Department of Education (MSDE) and the Maryland Department of Labor (MDL). The program is for students, ages 16 and up, and is designed to lead to sustainable employment and further education.

The program is based on a partnership among employers and mentors, school districts, and students and parents. Eligible employers (approved by the Maryland Apprenticeship Training Council (MATC) through MDL) hire high school juniors and seniors to work in eligible career track occupations and provide fair compensation, thus, creating an "earn and learn" opportunity. Students also receive training in employability skills, interpersonal/social skills, and a general knowledge of the world of work.

The program consists of at least one credit of related technical instruction and a workplace component of at least 450 hours. The workplace component is a paid (at least minimum wage) mentored, on-the-job,

work experience with a written, student rating/work-based learning plan and a formal agreement among the student, school, and employer. Students can start the program during the junior year, the summer leading into their senior year, or during the senior year. Whether students start the program in the summer or during the school year, all program requirements (including the one year of related technical instruction and the minimum 450 hours of work-based training under the supervision of an eligible employer) must be completed prior to graduation.

#### 8680 Apprenticeship Maryland Related Technical Instruction

Students are required to complete one year of related classroom instruction. The work-based learning coordinator for Calvert County Public Schools works with the eligible student, the Youth Apprenticeship sponsor, and other school system personnel to determine what related technical instruction is necessary and appropriate as it relates to the specific apprenticeship experience. Each student will identify specific goals for an Apprenticeship Maryland training plan. The related technical instruction will assist the student in meeting the goals outlined in the student training plan. Related technical instruction could occur in a variety of formats, including through a virtual or web-based platform, in-person at school, or in a classroom setting away from school (such as at the College of Southern Maryland). Grading for each appropriate related technical instructional experience will be communicated prior to the start of the course during the development of the Apprenticeship Maryland training plan.

CREDIT: 1 TYPE: Academic GRADE: 11 or 12

**PREREQUISITE:** Students must complete an application process and be accepted to this program prior to beginning. Students must also meet all requirements of the sponsoring employer which may include possession of a driver's license, background checks, drug testing, vaccination requirements, or other standards typical of employment with the company. Students must be at least 16 years of age at the start of the program. Students must meet all employment requirements of the industry apprenticeship sponsor.

#### 8681 Apprenticeship Maryland Work-based Learning Experience I

The apprenticeship work-based learning experience takes place at a work-site and must be a paid experience (at least minimum wage). Students apply to and are accepted to a specific apprenticeship work-based learning experience prior to enrolling in this course; these are specific jobs that the student participates in. The student must complete a minimum of 150 work-based learning hours per credit/course. All three parts of WBL experience must cumulate to a minimum of 450 hours. This experience is directed by the work-based learning agreement provided by the school system and a student work plan developed among the student, WBL coordinator, and eligible employer. The student work plan identifies the appropriate competencies, duties, tasks and outcomes in academic, technical, and workplace readiness areas that apply directly to the student's goals for a specific work-related placement. Evaluation for this course is based on the student's progress using a providing a rubric for measuring academic, technical, and workplace readiness. The rubric will measure the student's level of performance for each duty and task indicated. Continuous supervision and regular communication among the student, employer, and WBL coordinator will provide the student with feedback and evaluation results from their WBL placements. In addition, the student will formulate a process for reflection and evaluation of their own skill development. The student's final portfolio will document proficiency in academic, technical, and workplace readiness skills as indicated in the student WBL plan. As part of the experience, students will develop a required portfolio. Articles related to the portfolio and its development will account for 30% of the student's grade (process) each marking period.

CREDIT: 1 TYPE: Academic GRADE: 11 or 12

**PREREQUISITE:** Successful completion of or Students must complete an application process and be accepted to this program prior to beginning. Students must be at least 16 years of age at the start of the program. Students must meet all employment requirements of the industry apprenticeship sponsor.

#### 8682 Apprenticeship Maryland Work-based Learning Experience II

The level II Apprenticeship Work-based Learning Experiences are a continuation of the level I experience and incorporate the student's learning through the work-based learning plan and the related technical instruction. As in the Level I experience, students continue with the development of a required portfolio.

Articles related to the portfolio and its development will account for 30% of the student's grade (process) each marking period. The student's final portfolio will document proficiency in academic, technical, and workplace readiness skills as indicated in the student WBL plan and will be due during the final quarter of the student's enrollment in Apprenticeship III. The entire portfolio will count for 30% of the fourth marking period grade. A copy of the employer's assessment as well as documentation from the WBL coordinator shall be included.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of or concurrent enrollment in Apprenticeship Related Technical Instruction and Apprenticeship Work-based Learning Experience I. Students must meet all employment requirements of the industry apprenticeship sponsor.

## 8683 Apprenticeship Maryland Work-based Learning Experience III

The level III Apprenticeship Work-based Learning Experiences are a continuation of the level I and II experience and incorporate the student's learning through the work-based learning plan and the related technical instruction. As in the Level I experience, students continue with the development of a required portfolio. Articles related to the portfolio and its development will account for 30% of the student's grade (process) each marking period. The student's final portfolio will document proficiency in academic, technical, and workplace readiness skills as indicated in the student WBL plan and will be due during the final quarter of the student's enrollment in Apprenticeship III. The entire portfolio will count for 30% of the fourth marking period grade. A copy of the employer's assessment as well as documentation from the WBL coordinator shall be included.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of or concurrent enrollment in Apprenticeship Related Technical Instruction and Apprenticeship Work-based Learning Experience I. Students must meet all employment requirements of the industry apprenticeship sponsor.

## **Automotive Service Technician**

Program	Course Number	Course Name	Credits
Automotive Service Technician	8941	Service Technician I (Brakes, Steering, and Suspension)	2
rechnician	8951	Service Technician II	3

#### 8941 Service Technician I (Brakes, Steering, and Suspension)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. Focus will be on safety, basic theory, shop operations, brakes, steering, and suspensions. Students will have the opportunity to learn skills needed for career entry employment in the automotive industry. This Automotive Service Excellence (ASE) Education Foundation Maintenance and Light Repair certified course will prepare students to enter an automotive training program at the post-secondary level. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance with program fees and purchase of materials is available for students who qualify. It is strongly recommended that students join SkillsUSA which enables students to participate in the ASE Education Foundation benefits (shadowing, mentoring, etc.). Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

## 8951 Service Technician II (Service Technician Level II is comprised of three

**courses**: Automotive Maintenance and Light Repair, Electrical/Elect Systems & Automotive HVAC, and Automotive Capstone)

Students will build on the skills taught in the Service Technician I program. Students will focus on safety, basic theory, shop operations, electrical/electronics, and maintenance and light repair. Students are prepared to sit for the ASE tests. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance with program fees and purchase of materials is available for students who qualify. It is strongly recommended that students join SkillsUSA which enables students to participate in the ASE Education Foundation benefits (shadowing, mentoring, etc.). Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion of Service Technician I (8941) with a grade of 70% or higher

and teacher recommendation.

### **Business Administrative Services**

Program	Course	Course Name	Credits
	Number		
Business Administrative Services	5000	Principles of Business Administration and Management	1
	5050	Principles of Accounting	1
	5030	Office Systems Management (Word/PowerPoint)	1
	5100	Office Systems Management (Excel/Access)	1

#### 5000 Principles of Business Administration and Management

This is a required course in all four Business, Management, and Finance pathways. In this course you will learn the basic principles surrounding economics, management, marketing, accounting, business ethics, business law, business communication, and careers in business. Enjoy many online learning programs, listen to and learn from motivational guest speakers representing various fields in business.

CREDIT: 1 TYPE: Academic GRADE: 9-12

## 5050 Principles of Accounting

This is a required course in all four Business, Management, and Finance pathways. This course provides students with the skills and knowledge necessary to manage and maintain a small company's financial resources in daily operating decisions. Students will learn to apply generally accepted accounting principles to determine the value of assets, liabilities, and owner's equity as they apply to various forms of business ownership. In addition, students will prepare, interpret, and analyze financial statements using manual and computerized systems for service and merchandising businesses. Upon completion of the course, students will also have a good understanding of payroll, payroll and sales tax liabilities and have the skills to manage a business checking account.

CREDIT: 1 TYPE: Academic GRADE: 10-12

#### 5030/5035 Office Systems Management (Word/PowerPoint)

The Office Systems Management (Word/PowerPoint) course provides students with a study of advanced business practices, information systems and computer applications. Students develop managerial and technical skills for business support operations through applied learning. Problem-solving skill development is incorporated throughout the course. Competencies include: applying emerging technologies in order to complete appropriate office operations; using advanced desktop publishing and

word processing software in order to create business documents and professional presentations; exhibiting appropriate interpersonal knowledge of acceptable values and behaviors in order to become ethically responsible employees and developing an appreciation of diversity in the workplace. Industry standard office equipment and Microsoft Office software will be used in this course. When students complete this course, they will be able to obtain the advanced competencies to take the Microsoft Office Specialist exam for industry certification in MS Word and/or MS PowerPoint.

**COURSE NOTE:** Students wishing to complete the Business Administrative Services pathway should register for 5030. Students who are not planning on completing the Business Administrative Services pathway should register for 5035.

CREDIT: 1 TYPE: Academic GRADE: 10-12

### 5100 Office Systems Management (Excel/Access)

The Office Systems Management (Excel/Access) course provides students with a study of advanced skills using Microsoft's leading business productivity software to create spreadsheets and databases. Students will be expected to think analytically, manipulate information, and use the computer as a productivity tool through integrated application programs. Expertise in technology will contribute to students' future career mobility, advancement potential, compensation and job satisfaction. Industry standard office equipment and Microsoft Office software will be used in this course. When students complete this course, they will be able to obtain the advanced competencies to take the Microsoft Office Specialist exam for industry certification in MS Excel and/or MS Access.

CREDIT: 1 TYPE: Academic GRADE: 10-12

## **Business Management**

Program	Course	Course Name	
	Number		
Dualmasa	5000	Principles of Business Administration and Management	1
Business	5050	Principles of Accounting	1
Management	5160	Advanced Business Management	1

### 5000 Principles of Business Administration and Management

This is a required course in all four Business, Management, and Finance pathways. In this course you will learn the basic principles surrounding economics, management, marketing, accounting, business ethics, business law, business communication, and careers in business. Enjoy many on-line learning programs, listen to and learn from motivational guest speakers representing various fields in business.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 5050 Principles of Accounting

This is a required course in all four Business, Management, and Finance pathways. This course provides students with the skills and knowledge necessary to manage and maintain a small company's financial resources in daily operating decisions. Students will learn to apply generally accepted accounting principles to determine the value of assets, liabilities, and owner's equity as they apply to various forms of business ownership. In addition, students will prepare, interpret, and analyze financial statements using manual and computerized systems for service and merchandising businesses. Upon completion of the course, students will also have a good understanding of payroll, payroll and sales tax liabilities and have the skills to manage a business checking account.

CREDIT: 1 TYPE: Academic GRADE: 10-12

#### 5160 Advanced Business Management

This course explores advanced topics such as major management theories and functions, operational aspects of management, human resource management, production management, accounting and marketing management, and international management. In this course, students will prepare a formal business plan for a small, service-based or goods-based business. This course prepares students to pass

the College Board's CLEP (College Level Examination Program) exam in Principles of Management. The CLEP exam is recognized by close to 3,000 colleges and universities nationwide. Students earn three college credits by passing this exam. There is an \$80 test fee and a \$25 sitting fee required to take the exam at the College of Southern Maryland. More information is available about the CLEP exam at www.collegeboard.org/clep.

**COURSE NOTE:** Students wishing to complete the Business Management pathway should register for 5160. Students who are not planning on completing the Business Management pathway should register for 5165.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of 5000 Principles of Business Management with a 70% or higher and completion of OR concurrent enrollment in 5050 Principles of Accounting.

## **Career Research and Development**

Program	Course	Course Name	Credits
	Number		
Career Research	8650	Career Research Development	1
	8660	Career Research Development Seminar	1
and Development	8665	Work-Based Learning Experience – 1 Credit Required; a second credit is optional for students for further experience/additional 1 credit.	1

#### 8650 Career Research and Development

Career Research and Development is the first in a series of two courses and a work based learning experience designed to teach students the process of self-awareness, career exploration and the setting of academic and career related goals to prepare them for further education or employment. Students will be introduced to career planning, job skills, the Skills for Success (communication, learning, interpersonal technology, and critical thinking). Classes will be held at the home school of the student. It is strongly recommended that students join SkillsUSA in the amount of \$10.00 (annual dues), which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. **CREDIT: 1 TYPE:** Academic **GRADE:** 11-12

#### 8660 Career Research and Development Seminar

Students will research and refine skills for job seeking and advancement. Through a seminar format, students will apply financial literacy skills to life management and assess personal and professional goals. They will complete a job search, practice interviewing and build a career portfolio that demonstrates proficiency in workplace readiness, personal financial management, and employment experiences. Students will complete a portfolio as the final project for this class. It is strongly recommended that students join SkillsUSA in the amount of \$15.00 (annual dues), which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. Students in the course are encouraged to take the ASVAB (Armed Services Vocational Aptitude Battery) exam for career exploration purposes.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of Career Research and Development. Concurrent enrollment is permitted.

#### 8665 Work-Based Learning Experience

As part of the pathway, students are required to complete at least one credit in the work-based learning experience. The work-based learning (WBL) experience takes place at the work-site, includes a minimum of 135 hours per course credit, and may be paid or unpaid. WBL experiences must occur outside of the home with an approved employer or WBL sponsor. This experience is directed by the WBL agreement and plan developed by the student, parent, WBL coordinator and employer. The WBL plan identifies

appropriate competencies, duties and tasks in academic, technical and work readiness areas that apply directly to the goals for a specific work-related placement. Work-based learning placements prepare students for employment that leads to a family-supporting wage based on student interest and employer demand. A portfolio that documents proficiency in academic, technical, and workplace readiness skills must be completed and submitted as part of the course. The portfolio shall include a copy of the employer(s) assessment. Students enrolled in this course are required to complete the Work-Based Learning Questionnaire for each WBL experience in which a student participates.

CREDIT: 1 TYPE: Academic GRADE: 12

PREREQUISITE: Career Research and Development

COREQUISITES: Concurrent enrollment in 8660 - Career Research and Development Seminar is

required

## Carpentry

Program	Course Number	Course Name	Credits
Carpentry	8271	Carpentry I	2
	8281	Carpentry II	3

## **8271** Carpentry I (Carpentry Level I is comprised of two courses: Foundations of Building and Construction Technology and Carpentry I)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. If you want to learn a trade, build your own house or just like working with your hands, the Carpentry Program may be for you. You will develop the knowledge and skills needed in today's home construction and remodeling. Students will earn the OSHA 10 safety certification and work towards their certifications through the National Center for Construction Education and Research (NCCER) This curriculum covers all aspects of Construction such as blueprint reading, framing, job and tool safety and estimating materials. Students will also have the opportunity to demonstrate their abilities through the SkillsUSA organization competing against students from other school systems. Students will need to supply appropriate work clothes, work boots, and tape measure. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. For this program, the OSHA-10 and/or OSHA-30 certifications are utilized for required safety examinations. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

## **8281 Carpentry II** (Carpentry Level II is comprised of two courses: Carpentry II and Construction Professions Capstone)

Level II students in Carpentry will earn their NCCER certifications through the Associated Builders and Contractors of America. These certifications allow students to enter post-secondary Carpentry training programs at advanced apprentice levels. Students will develop the Job entry skills needed for the success in the construction field. Students will be actively involved in many hands-on construction projects during the year including a house construction project. Students in the Carpentry Program will be given the opportunity to compete in a variety of SkillsUSA contests such as Carpentry, Cabinetmaking, Teamwork and Chapter Display. This program has been extremely successful in these areas advancing many students to the National Levels contests. Students successfully completing the second year of Carpentry will be considered Program Completers. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions

held throughout the year. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. For this program, the OSHA-10 and/or OSHA-30 certifications are utilized for required safety examinations. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion Carpentry I (8271).

## **CISCO Networking & Cybersecurity**

Program	Course Number	Course Name	Credits
CISCO Networking &	8441	Introduction to Network Engineering	2
Cybersecurity	8452	CCNA and CyberOps Associate	3

While participating in the Networking & Cybersecurity program, students are granted access to computer functions as a part of the curriculum. This privilege enables participating students to perform many functions beyond those that are typical for a CCPS student. Students are expected to always use what they have learned in the program in a responsible manner and not for destructive or disruptive purposes. Specific Networking & Cybersecurity program offenses include, but are not limited to:

- Attempting to gain access to information owned by the school system or by its authorized users without permission from the appropriate parties;
- Accessing, downloading, printing, or storing information with sexually explicit content as prohibited by law or CCPS policy and procedures;
- Installing or downloading computer software, programs, or executable files that violate CCPS policies and procedures;
- Intentionally developing or experimenting with malicious programs (viruses, worms, spy-ware, keystroke loggers, phishing software, Trojan horses, etc.) on any school–owned computer;
- Knowingly propagating malicious programs;
- Changing administrator rights on any school-owned computer, or the equivalent on non-Microsoft Windows based systems.

Failure to comply with these expectations will result in disciplinary action. Depending on the severity of the incident, students may be suspended from school, restricted from using CCPS computers, or permanently removed from the Networking & Cybersecurity program.

A more comprehensive list of expectations as well as the consequences for failing to comply with these expectations are included in a student-user agreement form. This form, which students and their parents/guardians are required to sign, will be distributed to students and thoroughly explained at the beginning of each school year.

# **8441** Introduction to Network Engineering (Introduction to Network Engineering is comprised of two courses: Scaling Networks and Switching, Routing & Wireless Essentials)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. This course covers the content from two of Cisco's courses: CCNA: Introduction to Networks, and CCNA: Switching, Routing and Wireless Essentials. The CCNA: Introduction to Networks covers networking architecture, structure, and functions. The course introduces the principles and structure of IP addressing and the fundamentals of Ethernet concepts, media, and operations to provide a foundation for the curriculum. The CCNA: Switching, Routing and Wireless Essentials course covers the architecture,

components, and operations of routers and switches in a small network. Students learn how to configure a router and a switch for basic functionality. By the end of the course, students will be able to explain network technologies, explain how devices access local and remote network resources, describe router hardware, explain how switching operates in a small-to-medium business, configure initial settings on a network device, configure Ethernet switchports, Implement VLANS, implement static routing, Configure DHCP, Setup Network Address Translation and Implement access control lists. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

# **8452 CCNA and CyberOps Associate** (CCNA and CyberOps Associate is comprised of two courses: CCNA: Enterprise Routing, Security and Automation and CyberOps Associate)

This level 2 course in the Networking Academy program covers content in three of Cisco's courses: CCNA: Enterprise Networking, Security and Automation, Cybersecurity Essentials, and CCNA Security. CCNA: Enterprise Networking, Security and describes the architectures and considerations related to designing, securing, operating, and troubleshooting enterprise networks. It covers wide area network (WAN) technologies and quality of service (QoS) mechanisms used for secure remote access along with the introduction of software-defined networking, virtualization, and automation concepts that support the digitalization of networks. The Cybersecurity Essentials course develops foundational understanding of cybersecurity and how it relates to information and network security. The course introduces students to characteristics of cyber crime, security principles, technologies, and procedures to defend networks. Through interactive, multimedia content, lab activities, and multi-industry case studies, students build technical and professional skills to pursue careers in cybersecurity. In the CyberOps Associate course students will learn security concepts, security monitoring, host-based analysis, network intrusion analysis, and security policies procedures. This course also aligns with the National Initiative for Cybersecurity Education (NICE) Cybersecurity Workforce Framework to support consistent communication language for cybersecurity education, training, and workforce development. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: 8441 - PC Troubleshooting and Introduction to Network Engineering

## **Computer Science**

Program	Course	Course Name	Credits
	Number		
Computer Science	3506	AP Computer Science Principles	1
	3511	App Development	1
	3519	AP Computer Science Coding	1
		OR Dual Enrollment (See 3519 for info)	

## 3506 AP Computer Science Principles

This course advances students' understanding of the technical aspects of computing including: programming and algorithm design, computer system organization and operation, and data

representation and information organization. Specific programming languages may include Processing, C++, and Java.

As a result of this course, students will:

Demonstrate proficiency in programming and algorithm design that requires the use of data abstraction to solve basic programming problems in multiple (or single) programming paradigms;

- Analyze computer systems including components, organization, and operation;
- Demonstrate in-depth knowledge of how computer systems work individually and collectively;
- Apply principles of data representation and information organization at the machine level for program analysis;
- Apply principles of data representation and information organization at the data structure level for program implementation;
- Apply principles of data representation and information organization at the problem representation and files and database levels for solution design;
- Analyze the interaction amongst systems for people for overall system design and effectiveness;
- Work effectively in teams in collaborative software development.

This course is the second course of a four course Career and Technology Education program of study called Computer Science. Depending on which school they attend, students who wish to complete this program may do so at the CTA in 11th and 12th grade. This course meets the graduation requirement for Technology Education if not also used as part of a CTE pathway.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA PREREQUISITE: 3505/3505So - Foundations of Computer Science

#### 3511 App Development

This course is designed to further a student's understanding of computer programming by gaining a solid knowledge of the Java programming language and then applying those skills by developing apps and games using Android® Studio App Inventor.

Students will start by creating increasingly complex programs in an integrated development environment (IDE) such as Eclipse®.

The purpose of the class is to not only teach students how to program, but to also prepare students for college or the workplace as they learn about how applications work and how to program them. The students will create actual apps that can be downloaded to their smartphones or tablets, and theoretically can be put out on the market.

CREDIT: 1 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** 3505/3505So - Foundations of Computer Science or 3506 AP Computer Science Principles

### 3519/3509 AP Computer Science Coding (CTE Pathway)

Students are taught how to write logically structured, well-documented computer programs. Major course emphases are programming methodology, algorithms, and data structures. Computer systems and the social implications of computing are also examined. The programming language used is JAVA, which is the only language employed on the Advanced Placement Computer Science examination. Since documentation plays a central role in this course, students must have good written communication skills. Similarly, prior to enrollment, students should be able to structure and develop a topic in a logical manner. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who enroll in this course are not required to take the national Advanced Placement examination. However, this course does prepare them for the "A" version of the Advanced Placement Computer Science examination. Students who complete an Advanced Placement course shall receive a weighted grade.

Note: Students may choose from one of the following Dual Enrollment courses in lieu of AP Computer Science Coding:

• ITS 1050 Computing Essentials: Students are introduced to the principles of various types of microcomputer operating systems. Topics include system resources, memory management,

- processor management, user interface and operating system functions. Major emphasis is placed on how the user, hardware, and software interface with the operating system. Various current operating systems will be covered in this course.
- PHL 1150 Cyber Ethics: Students consider the safe and ethical use of computer technology
  including the Internet. They study the role of technology in today's society, cyber protection
  issues and the moral challenges we face in using technology including cyber space. Topics to be
  included are privacy, intellectual property, cyber abuse/crime, codes of conduct, policy
  development as well as the digital divide. In addition, students consider how the global and
  anonymous nature of the Internet makes it difficult to transfer standard rules of conduct to this
  virtual environment.

**COURSE NOTE:** Students wishing to complete the Computer Science CTE pathway should register for Course 3519. Students who are not planning on completing the Computer Science CTE pathway should register for Course 3509.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Successful completion of Academic Algebra 2 (3135) and either Programming in JAVA (3510) or AP Computer Science Principles (3506) with a grade of 80% or higher and teacher recommendation.

## Cosmetology

Program	Course Number	Course Name	Credits
Cosmetology	8360	Cosmetology I	3
	8371	Cosmetology II	3

### 8360 Cosmetology I – Principles and Practice of Cosmetology

Students who take this Level 1 course will receive their English instruction at their home high school. The two-year cosmetology program is to prepare students to successfully pass the Maryland State Board Cosmetologist Licensing Exam and become a licensed cosmetologist. Students care for hair, skin and nails by training in areas such as styling, cutting, coloring, permanent waving, chemical relaxing, facials, manicures, and pedicures. Students become familiar with the principles of sanitation, chemistry of cosmetics, and state regulations governing the cosmetology field. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy. Students should obtain 1,000 hours of approved lab setting time in order to be considered "on track" for completion of the Cosmetologist license (taken in Cosmetology II). Excellent attendance is required to attain the total 1,500 hours needed to qualify to sit for the State Board Exam.

CREDIT: 3 TYPE: Academic GRADE: 11

## **8371 Cosmetology II** (Cosmetology Level II is comprised of two courses: Advanced Cosmetology and Mastery of Cosmetology)

This course incorporates theory and practical applications learned in the first level. Students continue practicing basic techniques which are reinforced in the clinic. Topics studied include current trends in coloring, styling, cutting, wigs, nail diseases, skin disorders, massage, facial makeup, and basic electricity. Detailed theory and practical skills will be studied in preparation for the Maryland State Board exam, which all students are required to take as a part of successful course completion. A Senior

Capstone project on Salon Business is required. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy. Students must complete 1,500 hours of completion time to qualify to sit for the State Board Exam. Excellent attendance is required to attain the hours needed.

CREDIT: 3 TYPE: Academic GRADE: 12

**PREREQUISITE:** Cosmetology I (8360); It is highly recommended that students have completed a minimum of 1,000 hours of approved lab setting time prior to attempting Cosmetology II in order to be on track for the State Board Exam.

## **Criminal Justice/Law Enforcement**

Program	Course	Course Name	Credits
	Number		
	2600	American Criminal Justice System	1
Criminal Justice /	2610	Juvenile Justice	1
Law Enforcement	2620	Criminal Law	1
	2630	Criminal Investigation	2

A student enrolled in any of the four Criminal Justice Pathway courses who is arrested for any reportable offense\* will be placed on Class 2 Status. Students on Class 2 Status will receive classroom instruction along with their classmates and are invited to participate in most classroom discussions. However, these students will be removed from field trips or instructional sessions conducted by local, state or federal law enforcement officials that specifically deal with policing and investigative procedures. Class 2 students will be given alternative assignments for the field trips and policing sessions from which they have been removed and will not be held responsible for any material presented exclusively in one of these learning activities.

Criminal Justice Pathway students who receive either in school or out of school suspension may be excluded from field trips at the discretion of the teacher in consultation with their principal. Students who do not attend a field trip for this reason will be given an alternative assignment.

\*Reportable offenses are crimes committed in the community by children enrolled in the public school system and reported to the school system by the appropriate law enforcement agency.

\*Reportable offenses do not include in-school conduct which would traditionally be treated as a matter of school discipline to be handled by school administrators. Additionally, reportable offenses do not include out of school conduct that does not lead to an arrest and would not qualify as a crime if committed by an adult.

### 2600 American Criminal Justice System

This is an introductory course for students interested in the law enforcement career pathway. It consists of an overview of the agencies comprising the criminal justice system, namely, the legislature, police, courts, and corrections. A principal focus of the course is based upon the many occupations in this broad field. Information on how the legal and the public administrative systems work is provided. Students are required to purchase a uniform that will be worn one day each week. Beginning with his/her first day of

high school, a student who is arrested for any reportable offense\* may be prohibited from enrolling the Criminal Justice program.

Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland. Students who choose this option will earn college credits for successful completion of this course.

\*Reportable offenses are crimes committed in the community by children enrolled in the public school system and reported to the school system by the appropriate law enforcement agency. Reportable offenses do not include in-school conduct which would traditionally be treated as a matter of school discipline to be handled by school administrators. Additionally, reportable offenses do not include out of school conduct that does not lead to an arrest and would not qualify as a crime if committed by an adult. **CREDIT:** 1 **TYPE:** Academic **GRADE:** 10-12

**PREREQUISITE:** Successful completion of 9th grade social studies course and most recent English course with a grade average of 70% or higher or teacher recommendation.

#### 2610 Juvenile Justice

The second of four courses in the law enforcement career pathway, Juvenile Justice provides students with a practical understanding of the law and the legal system as it affects juveniles. The fundamental principles and values underlying the Constitution, the laws, and the legal system are examined. Also discussed are current legal issues and controversies that have an impact upon the juvenile. Beginning with his/her first day of high school, a student who is arrested for any reportable offense\* maybe prohibited from enrolling the Criminal Justice program. Students are required to purchase a uniform that will be worn one day each week. Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland. Students who choose this option will earn college credits for successful completion of this course.

\*Reportable offenses are crimes committed in the community by children enrolled in the public school system and reported to the school system by the appropriate law enforcement agency. Reportable offenses do not include in-school conduct which would traditionally be treated as a matter of school discipline to be handled by school administrators. Additionally, reportable offenses do not include out of school conduct that does not lead to an arrest and would not qualify as a crime if committed by an adult.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of American Criminal Justice System (2600) with a grade of 70% or higher.

#### 2620 Criminal Law

The third of four courses in the law enforcement career pathway, Criminal Law deals with both the causes of crime and the prescriptions of the criminal justice system and society in alleviating it. In addition to introducing and explaining general legal principles, this course presents an overview of substantive criminal law. Beginning with his/her first day of high school, a student who is arrested for any reportable offense\* will be prohibited from enrolling the Criminal Justice program. Students are required to purchase a uniform that will be worn one day each week.

Students enrolled in this course will be given the chance to register for dual enrollment with the College of Southern Maryland. Students who choose this option will earn college credits for successful completion of this course.

\*Reportable offenses are crimes committed in the community by children enrolled in the public school system and reported to the school system by the appropriate law enforcement agency. Reportable offenses do not include in-school conduct which would traditionally be treated as a matter of school discipline to be handled by school administrators. Additionally, reportable offenses do not include out of school conduct that does not lead to an arrest and would not qualify as a crime if committed by an adult.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of American Criminal Justice (2600) with a grade of 70% or higher.

## 2630 Criminal Investigation

The last of four courses in the law enforcement career pathway, this course introduces students to the investigative procedures used by the law enforcement community in obtaining and processing evidence. Emphasis is placed upon critical thinking, reasoning, communication, observation and problem-solving skills as they apply to the investigation procedure. This course is facilitated by a member of the Calvert County Sheriff's Office and conducted with the regimen and expectations in deportment followed at the Police Academy. Beginning with his/her first day of high school, a student who is arrested for any reportable offense\* will be prohibited from enrolling the Criminal Justice program. Students are required to purchase a uniform that will be worn one day each week.

Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland. Students who choose this option will earn college credits for successful completion of this course.

\*Reportable offenses are crimes committed in the community by children enrolled in the public school system and reported to the school system by the appropriate law enforcement agency. Reportable offenses do not include in-school conduct which would traditionally be treated as a matter of school discipline to be handled by school administrators. Additionally, reportable offenses do not include out of school conduct that does not lead to an arrest and would not qualify as a crime if committed by an adult. **CREDIT:** 2 **TYPE:** Academic **GRADE:** 12

**PREREQUISITE:** Successful completion of Juvenile Justice (2610) and Criminal Law (2620) with a grade of 70% or higher or teacher recommendation. The successful completion of or concurrent enrollment in Psychology (2540) and Sociology (2550) is recommended.

## **Culinary Arts**

Program	Course Number	Course Name	Credits
Culinary Arts	8511	Culinary Arts I	2
	8521	Culinary Arts II	3

## **8511** Culinary Arts I (Culinary Arts Level I is comprised of two courses: Basic Cooking Principles and Intro to Professional Cooking)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. The Culinary Arts program is certified by the American Culinary Foundation (ACF). Students in this program will progress in skills needed to obtain the ACF Certified Culinarian certification. Students are prepared for entry into careers in the growing food service industry. Professionalism and productivity are key components of the program. Commercial kitchen management, food safety and sanitation, food preparation and presentation will be emphasized. Students learn how to select, purchase, and prepare food in accordance with professional standards for freshness, sanitation and quality control; and to serve wholesome food in visually appealing displays. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In Culinary Arts, the successful completion of the ServSafe Food Handlers exam with certifying score is required prior to the students' participation in any Culinary lab activities.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

## **8521 Culinary Arts II** (Culinary Arts II is comprised of two courses: Professional Cooking and Internship in Cooking)

After reviewing sanitation and safety requirements, students develop stronger skills in preparing sauces and soups. Baking, international cooking, and garnishing as well as banquet settings and organization are also included. To further equip them for their culinary careers, students are afforded work opportunities in local food service facilities. Students who successfully complete both the Culinary Arts I course and the Culinary Arts II courses with a minimum grade of 75% in each course are eligible to apply for the ACF Certified Fundamental Cook (CFC) certification. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In Culinary Arts, the successful completion of the ServSafe Food Handlers exam with certifying score is required prior to the students' participation in any Culinary lab activities.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Food Production and Management I (8511).

## **Curriculum for Agricultural Sciences Education (CASE)**

Program	Course Number	Course Name	Credits
	8035	Intro. to Agriculture, Food, and Natural Resources (AFNR)	1
Curriculum for	8036	Principles of Agricultural Science – Animal (ASA)	1
Agricultural Science Education (CASE)	8037	Animal and Plant Biotechnology	1
	8038 or 8039	Agricultural Business, Research, and Development	1/2

## 8035 Introduction to Agriculture, Food, & Natural Resources

The Agriculture, Food, and Natural Resources (AFNR) course is intended to serve as the foundation course within the CASE™ program sequence. The course is structured to enable all students to have a variety of experiences that will provide an overview of the fields of agricultural science and natural resources so that students may continue through the sequence of courses in the CASE™ program. Students participating in the AFNR course will experience inquiry-based activities, projects, and problems. Students' experiences will involve the study of communication, sciences of agriculture, plants, animals, natural resources, and agricultural mechanics. While surveying the opportunities available in agriculture and natural resources, students will learn to solve problems, conduct research, analyze data, work in teams, and take responsibility for their work, actions, and learning. For example, students will work in groups to determine the efficiency and environmental impacts of fuel sources in a practical learning exercise. It is strongly recommended that students join SkillsUSA or Future Farmers of America (FFA), which enables students the opportunity to compete in a skill or trade and other program-related activities held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify.

CREDIT: 1 TYPE: Academic GRADE: 9-12

### 8036 Principles of Agricultural Science-Animal (ASA)

The Principles of Agricultural Science - Animal (ASA) course is the second of four courses within the CASE™ program sequence. The course is structured to enable all students to have a variety of experiences that will provide an overview of the field of agricultural science with a foundation in animal science so that students may continue through the sequence of courses in the CASE™ program. Students will explore hands-on projects and activities to learn the characteristics of animal science and work on major projects and problems similar to those that animal science specialists, such as veterinarians, zoologists, livestock producers, or industry personnel face in their respective careers. The knowledge and skills students develop will be used in future courses within the CASE™ program. In addition, students will understand specific connections between the Animal Science lessons SAE, FFA, and LifeKnowledge® (a curriculum for leadership and career development) components that are important for the development of an informed agricultural education student. Students will build on the skills developed in AFNR to investigate, conduct experiments, and document projects that solve real life problems. Students will communicate their solutions through reports and presentations to their peers and members of the professional community. It is strongly recommended that students join SkillsUSA or Future Farmers of America (FFA), which enables students the opportunity to compete in a skill or trade and other program-related activities held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: 8035 - Introduction to Agriculture, Food, & Natural Resources (or Concurrent

Enrollment)

#### 8037 Animal and Plant Biotechnology

Animal and Plant Biotechnology, the third of four courses within the CASE program sequence, is a specialization course in the CASE Program of Study, and provides students with experiences in industry appropriate applications of biotechnology related to plant and animal agriculture. Students will complete hands-on activities, projects, and problems designed to build content knowledge and technical skills in the field of biotechnology. Student are expected to become proficient at biotechnological skills involving micropipetting, bacterial cultures and transformations, electrophoresis, and polymerase chain reaction. Students will maintain a research level Laboratory Notebook throughout the course documenting their experiences in the laboratory. Research and experimental design will be highlighted as students develop and conduct industry appropriate investigations. This course is only offered at CHS.

**COURSE NOTE:** Concurrent enrollment in 8036 is acceptable as well.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** 8035 - Introduction to Agriculture, Food, & Natural Resources (AFNR) AND 8036 - Principles of Agricultural Science-Animal (ASA). Concurrent enrollment in 8036 is acceptable.

#### 8038/8039 Agriculture Business, Research, and Development

The Agriculture Business, Research, and Development course, the fourth course in the CASE program, will serve as the capstone course available to students completing the program. Instruction and continued inquiry-based projects are designed to integrate key learning from previous CASE courses and have students apply them to real-world career situations through Supervised Agricultural Experience (SAE) projects or other internship/work-based learning opportunities. Students will be travelling off-site regularly in order to complete their Supervised Agricultural Experience (SAE) projects. The students will need to provide their own transportation. It is strongly recommended that students join SkillsUSA or Future Farmers of America (FFA), which enables students the opportunity to compete in a skill or trade and other program-related activities held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify.

**COURSE NOTE:** Concurrent enrollment in 8037 is also acceptable.

CREDIT: 1/2 TYPE: Academic GRADE: 12

**PREREQUISITE:** 8035 - Introduction to Agriculture, Food, & Natural Resources, 8036 - Principles of Agricultural Science-Animal (ASA) AND 8037 - Animal and Plant Biotechnology. Concurrent enrollment in 8037 is acceptable.

COURSE NOTE: Students enrolled in the CASE program beginning in the 2023-24 School year will take course number 8039 for 2 credits due to program's change in location from CHS to CTA.

## **Electricity**

Program	Course Number	Course Name	Credits
Electricity	8411	Electricity I	2
	8421	Electricity II	3

## **8411 Electricity I** (Electricity Level I is comprised of two courses: Foundations of Building and Construction Technology and Electrical I)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. Students in this course will be introduced to electrical theory and the principles of electricity. Students will learn about residential wiring, cable sizing, and devices used in a residential setting. The National Electric Code will be introduced as a practical wiring guide in accordance with generally acceptable wiring practices. Practical skills will be learned in a controlled lab environment, where students will work with their peers, under the supervision of an experienced electrician. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this course, students will complete OSHA-10 or OSHA-30 hour safety training which is a portable credential.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

**PREREQUISITE:** None

## **8421 Electricity II** (Electricity Level II is comprised of two courses: Electrical II and Construction Professions Capstone)

Students will continue the study of OHM's Law and related theory of AC and DC circuitry. Students focus on the National Electrical Code and field wiring in the construction workplace. This class requires a working knowledge of algebra and related math skills. Students will have the opportunity to meet with contractors and apprenticeship directors to become aware of available opportunities in the construction field after high school. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this course, students will complete OSHA-10 or OSHA-30 hour safety training which is a portable credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: 8411 - Electricity I

## Firefighter/Emergency Medical Tech

Program	Course Number	Course Name	Credits
Firefighter/Emergency	8994	Emergency Medical Technician (EMT)	3
Medical Tech	8998	Firefighting	3

Courses in this program may be offered in an alternating sequence annually due to the availability of instructors offered by the Maryland Fire and Rescue Institute (MFRI). All students who enroll in the complete pathway will have the opportunity to take BOTH courses and BOTH are required to be considered pathway completers. Students who wish to enroll in one course (Firefighting, but not EMT; EMT, but not Firefighting) in their senior year MAY be considered on a case-by-case basis as space and the availability of MFRI instructors allows. It is strongly recommended that students plan to complete both the EMT and Firefighting courses regardless of the sequence in order to ensure enrollment in both courses.

There will be a mandatory orientation meeting for all first-year students and their parents held in the summer prior to the start of school. Students must be an active member of a Volunteer Fire Department or Rescue Squad in Calvert County prior to this meeting. Therefore, all students wishing to complete either course within the program must plan to apply for membership to a local volunteer fire department no later than May 30<sup>th</sup> of the year preceding the course.

## 8994 Emergency Medical Technician (EMT)

The Fire Fighter/Emergency Medical Tech program exists through a partnership among Maryland Fire and Rescue Institute (MFRI), Calvert County Public Schools (CCPS), and the Calvert County Department of Public Safety. The program is taught at the Career and Technology Academy. In order to complete the program, students must take each of the one year courses, Firefighting and Emergency Medical Technician.

During the EMT portion of Fire and Rescue I, the majority of this content will be from the Emergency Medical Technician (EMT) course approved by MFRI. Major topics covered in this course include legal aspects of emergency care, infection control, patient assessment, the respiratory system, oxygen adjuncts and delivery, CPR, AED, bleeding control and management of soft tissue injuries, musculoskeletal injuries and management, spinal immobilization, pediatric and obstetric emergencies, crisis intervention, multiple casualty and triage management, ambulance operations, and EMS systems. This course is considered to be a college-level course and uses a college-level text. Students will be required to complete a significant portion of independent reading in the textbook for success in the course. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials.

12th grade students who are not planning on completing the Fire and Rescue program may take this course provided there is room after all of the students who are completing the program have secured a spot in the course.

**COURSE NOTE:** This program is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 11

**PREREQUISITE:** Students must be 16 years of age in the Fall of the year entering program. Must be able to become an active member of a Volunteer Fire Department or Rescue Squad in Calvert County

which will require the student to perform volunteer service as determined by the local VFD or Rescue Squad. A physical examination/fitness for duty certification are required for participation in this course

## 8998 Firefighting (Firefighting is comprised of two courses: Introduction to Firefighting and Advanced Firefighting)

Students will work to earn the MFRI Fire I, HAZMAT Operations, Rescue Tech, and Vehicle Machinery Extrication (VME) certifications. Content covered across the three certification courses include: department organization, communications, the incident command system, ropes and knots, fire behavior, safety, fire prevention, personal protective equipment, fire extinguishers, respiratory protection, ventilation, hoselines, forcible entry, search and rescue procedures, ladder and sprinkler systems, DOT guidebook, site management, container behavior, defensive control measures, personal protective equipment, detection, monitoring and sampling equipment, victim rescue and recovery, decontamination, terrorist and other criminal activity, management of rescue incident hazards, management of resources in a rescue incident, conducting searches, performance of ground support for helicopter activities, termination of a technical rescue operation, triage of victims, and planning for a vehicle or machinery rescue incident, performing ongoing incident size-up, establishing scene safety zones, establishing fire protection, stabilizing vehicles or machines, isolating potentially harmful energy sources, determining access and egress points, creating access and egress opening, disentangling victims, removing packaged victims, and terminating vehicle or machinery rescue incidents..

The Fire I certification is *required* in order to formally earn the HAZMAT, Rescue Tech, and VME certifications. Students who do not successfully pass the Fire I certification requirements may participate in course content, but will not be eligible to receive certifications for HAZMAT or Rescue Tech.

The firefighting courses include classroom instruction as well as formal on-site training at a MFRI-approved facility. On-site training will take place at the MFRI training center in LaPlata as well as at some of the fire departments in Calvert County. On days when the class attends the trainings in LaPlata, students will be transported between CTA and LaPlata by CCPS. Upon arriving at CTA, students who attend Huntingtown, Northern, or Patuxent High Schools will be transported to their home school by bus. On these days, students will not be arriving at the home school until approximately 4PM. Because of this, students will need to arrange a ride home from their high school on days which they travel to the training center in LaPlata. Students will be required to join SkillsUSA, at a cost of \$15.00, to be able to participate in regional and state competitions held throughout the year.

12<sup>th</sup> grade students who are not planning on completing the Fire and Rescue program and who have not completed the EMT course may take this course provided there is room after all of the students who are completing the program have secured a spot in the course.

**COURSE NOTE:** This program is taught at the Career & Technology Academy. There will be occasions when students will be required to attend some off-site trainings.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE:

Students must be 16 years of age in the Fall of the year entering program. Must be able to become an active member of a Volunteer Fire Department or Rescue Squad in Calvert County which will require the student to perform volunteer service as determined by the local VFD or Rescue Squad. A physical examination/fitness for duty certification are required for participation in this course

## **Graphic Arts**

Program	Course Number	Course Name	Credits
Graphic Arts	8611	Graphic Arts I	2
	8621	Graphic Arts II	3

**8611 Graphic Arts I** (Graphic Arts Level I is comprised of two courses: Fundamentals of Printing and Principles of Graphic Communications)

Students who take this Level I course will receive their English instruction at the Career and Technology Academy. First year students in Graphic Arts learn the basic principles of design, color theory, typography and layout, as well as Digital File Preparation and Output, offset Printing Principles, and Binding and Finishing techniques. Students will learn to use the Adobe Creative Suite software package including Photoshop, InDesign, and Illustrator through use of textbook assignments. The other portion of time is spent in the lab using the equipment to print and bind projects. As a certified PrintEd program, all students will have the opportunity to take the Printed exam, which can give them national recognition in the industry. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA Printing Safety course.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

8621 Graphic Arts II (Graphic Arts Level II is comprised of two courses: Advanced Graphic Communications and Graphic Communications Specialized Option) Students will take the learned skills from level I, and develop and refine design principles, and knowledge of the Adobe Creative Suite programs. They will gain understanding in color management, digital prepress, offset printing, binding and finishing. Hands-on instruction also includes; screen printing, vinyl lettering, dye-sublimation printing, and digital photography. Level II students also learn basic web design by creating a simple multiple page website using HTML. The student's final project is a digital portfolio. Students who complete this program qualify for up to six articulated credits at the College of Southern Maryland. Students will take at least two of the PrintED certification tests, for more information on PrintED, go to www.gaerf.org It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA Printing Safety course.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12 PREREQUISITE: Graphic Arts I (8611)

## **Home Improvement**

Program	Course Number	Course Name	Credits
Home Improvement	8871	Home Improvement I	2
	8881	Home Improvement II	3

**8871** Home Improvement I (Home Improvement Level I is comprised of two courses: Introduction to Construction and Foundation Topics in Building / Property Maintenance)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. Students acquire competencies in various technical trades. They receive instruction in the basic maintenance and repair skills required to service major mechanical appliances and building air conditioning, heating, plumbing, electrical, and other systems. Students are taught how to apply technical knowledge and skills to keep a building functioning and to service a variety of commercial, industrial, and mobile structures. This course assists students in preparation to be building property maintenance technicians and/or managers. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA-10 or OSHA-30 safety course.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

**8881 Home Improvement II** (Home Improvement Level II is comprised of two courses: Advanced Topics in Building / Property Maintenance and Building / Property Maintenance Capstone

Students will continue to perform competencies in various technical trades such as Carpentry, Plumbing/Heating/Air Conditioning, Electricity and Masonry. They will be provided with the skills and related information necessary to service a variety of commercial, industrial and mobile structures. A student who is a completer in Home Improvement has the entry level skills to maintain a building. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA-10 or OSHA-30 safety course.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion of Home Improvement I (8871).

#### **Interactive Media Production**

Program	Course Number	Course Name	Credits
Interactive Media	8631	Interactive Media Production I	2
Production	8641	Interactive Media Production II	3

**8631 Interactive Media Production I** (Interactive Media Level I is comprised of two courses: Interactive Media Production I and Interactive Media & Design I) Students who take this Level I course will receive their English instruction at the Career and Technology Academy. Students in this course will build an understanding of all aspects of the Arts, Media and Communication industry. Students will examine the opportunities and requirements of the major career pathways in this industry including: Graphic Design, Digital Media, and Interactive Media. As part of this

course, students will plan and design project ideas, illustrate art concepts and skills, including composition, lighting, color theory, drawing, and painting, work with digital media such as audio and video and work to integrate digital media, including combinations of electronic text, graphics, moving images, and sound into a structured digital computerized environment that allows people to interactive with the data for appropriate purposes. Students will also learn to create and generate new graphic images, use industry-standard software programs related to file management, electronic layout and design, and editing/creation, and develop solutions to communication problems through concept development and design application. Finally, students study the application of ethical practices in digital media including copyright, usability, and accessibility. During the Level I course, students begin the creation of an individual student portfolio which is completed during Level II. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

8641 Interactive Media Production II (Interactive Media production Level II is comprised of two courses: Interactive Media & Design and Interactive Media Capstone) In Interactive Media and Design II, students will continue to build on knowledge from Interactive Media I. Emphasis will be placed on group project development, project management, and individual portfolio development. Students will advance their knowledge and skills in multimedia design and production through project planning and product development. At the end of the course, teams present their projects to industry partners for feedback and professional review. This course equips students with the independent study skills that they will need in postsecondary education and careers in Interactive Media Production. During the Spring of course enrollment, students will be prepared to take Adobe Certified Associate Exams in the following applications: Adobe Illustrator, Dreamweaver, Flash, In Design, Photoshop, or Premiere Pro. The Adobe Certified Associate credential is widely recognized in the industry and post-secondary study. In the spring semester, students in this course can optionally earn Dual Enrollment Credit at CSM. Once enrolled at CSM, students can earn 3 transcripted credits for CSM's DMP 1010 Digital Media Production course upon completion of the Interactive Media Capstone course along with a required portfolio project. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12 PREREQUISITE: Interactive Media I (8631)

#### Naval Science/NJROTC

Established by the Congress of the United States in 1964, the Naval Junior Reserve Officers' Training Corps (NJROTC) Program teaches self-discipline, self-confidence, and leadership skills. The main objectives of this program are to promote patriotism, develop informed and responsible citizens, promote habits of orderliness and precision, develop respect for constituted authority, and develop a high degree of personal honor, individual discipline, and self- reliance.

The program includes classroom study in the areas listed in the course descriptions. In addition, physical fitness, personal appearance and good grooming habits, respectful conduct, and leadership training are stressed. Those who enroll in naval science courses join a unit and agree to wear the Navy uniform one full day a week and to comply with the standards of academic performance and personal conduct required of NJROTC cadets. All textbooks, regular uniforms, and training equipment are provided by the Navy at no cost to the student.

Satisfactory completion of the program gives students the life and career skills to significantly contribute to success in careers in government, private industry entrepreneurship and non-profit organizations. It

can also lead to advanced placement credit in the Senior ROTC program at an accredited college or university, or advanced rank in the armed forces.

Students in the program will be expected to take the Armed Services Vocational Aptitude Battery (ASVAB) exam for career exploration prior to completion of the Naval Sciences program as a CTE pathway.

Program	Course Number	Course Name	Credits
Naval Science/ NJROTC	7210	Naval Science I	1
	7220	Naval Science II	1
	7230	Naval Science III	1

#### 7210 Naval Science I

Students are introduced to both the NJROTC program and the study of naval science. Emphasis is placed on personal development and career planning; leadership skills; naval orientation; citizenship and American government; wellness; fitness, and first aid; geography and survival skills; and teamwork development. Opportunities are available to participate in community service, marksmanship, orienteering, drill, and athletics. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 7220 Naval Science II

Advanced leadership skills are practiced. Maritime History; Maritime Geography as it relates to national resources, landforms, climate, soil, bodies of water, people, governments, and military; Current Events, Naval History, Naval Operations; and Intelligence and National Security are studied. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Naval Science I (7210).

#### 7230 Naval Science III

Cadets practice advanced leadership skills and management techniques in the daily operation of the NJROTC unit, including the planning for and conducting of unit functions. Major areas of study include sea power and national security, naval operations, military and international law, ship design and organization, and maritime navigation. Opportunities are available to participate in community service, marksmanship, orienteering, drill, and athletics. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Successful completion of Naval Science II (7220).

## Plumbing, Heating, Ventilation, & Air Conditioning

Program	Course Number	Course Name	Credits
Plumbing, Heating,	8121	Heating, Ventilation, and Air Conditioning I	2
Ventilation, and Air Conditioning	8122	Heating, Ventilation, and Air Conditioning II	3

8121 Heating, Ventilation, Air Conditioning (HVAC) I (HVAC Level I is comprised of two courses: Foundations of Building and Construction Technology and HVAC I) Students who take this level 1 course will take their English instruction at the Career and Technology Academy. This course covers the general foundations of Building and Construction, and Introduction to HVAC, utilizing the CORE Curriculum from the National Center for Construction Education and Research (NCCER). This nationally recognized and portable credentialing will focus on theory in the class room, followed by practical hands-on application in the lab. Emphasis will be placed on safety, and the knowledge and use of hand and power tools, in the general construction area. HVAC focus areas will include: trade mathematics, blue print reading, scale drawings, trade terminology, soldering, brazing, swaging, flaring, copper and plastic pipe practices, ferrous and nonferrous piping, basic electricity, and an introduction to HVAC. All students taught, will be eligible to sit for industry standard's testing. Some of the certifications are NCCER Core, EPA 608 Type I, Type II, Type III, and Universal for refrigerant handling, and the Universal R-410A. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3. students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA-10 or OSHA-30 safety course.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

## **8122** Heating, Ventilation, Air Conditioning (HVAC) II (HVAC Level II is comprised of two courses: HVAC II and Construction Professions Capstone)

This course of study for HVAC level 2 continues utilizing the level 1 and level 2 HVAC curriculum from the National Center for Construction Education and Research (NCCER). This nationally recognized and portable credentialing will focus on theory in the class room, followed by practical hands on application in the lab. Students will learn load calculations using Manual J's and Right Suite Software. As well as airdistribution, flues, vents, intakes, service tech maintenance, alternating currents, basic electronics, electric heating, also introduction to control circuit trouble shooting, metering devices, compressors, heat pumps, leak detection, evacuation, recovery, charging, air quality control's, accessories and other optional equipment. Emphasis will be placed on concepts including planned maintenance, and trouble shooting of gas furnaces, heat pumps, heater packages, air-handlers, a/c units, and electronic controls. All students taught, will be eligible to sit for industry standard's testing. Some of the certifications are NCCER HVAC Level 1, and the Heating Electrical Air Conditioning Technology (H.E.A.T) program. H.E.A.T is an end of course assessment for high school HVAC students It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at https://cta.calvertnet.k12.md.us for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. herever possible, safety examinations themselves offer a portable, recognizable industry credential. In this program, students are offered the OSHA-10 or OSHA-30 safety course.

COURSE NOTE: This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion of Heating, Ventilation, Air Conditioning I (8121).

## **Project Lead The Way-Biomedical Sciences**

Program	Course	Course Name	Credits
	Number		
Project Lead the Way – Biomedical Sciences	8025	Principles of Biomedical Sciences	1
	8026	Human Body Systems	1
	8027	Medical Interventions	1
Ociciices	8028	Biomedical Innovation	1

During coursework in the Project Lead the Way – Biomedical Sciences program, students may have the opportunity to participate in clinical experiences in various healthcare settings that enhance the instructional program, but that are not required for successful program completion. In order to participate, students must meet criteria set forth by host sites for participation in clinical experiences. These *may* include completion of health testing (Tuberculosis), a background check, and/or flu, COVID-19, or other vaccinations. Qualifications are set by the partner facilities, not by CCPS.

### 8025 Principles of the Biomedical Sciences

Students investigate the human body systems and various health conditions including heart disease, diabetes, sickle-cell disease, hypercholesterolemia, and infectious diseases. They determine the factors that led to the death of a fictional person, and investigate lifestyle choices and medical treatments that may have prolonged the person's life. The activities and projects introduce students to human physiology, medicine, research processes and bioinformatics. This course is designed to provide an overview of all the courses in the Biomedical Sciences program and lay the scientific foundation for subsequent courses.

**COURSE NOTE:** Successful completion of or concurrent enrollment in Biology.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

PREREQUISITE: Successful completion or concurrent enrollment in Biology.

#### 8026 Human Body Systems

Students examine the interactions of body systems as they explore identity, communication, power, movement, protection, and homeostasis. Students design experiments, investigate the structures and functions of the human body, and use data acquisition software to monitor body functions such as muscle movement, reflex and voluntary actions, and respiration. Exploring science in action, students build organs and tissues on a skeletal manikin, work through interesting real world cases and often play the role of biomedical professionals to solve medical mysteries.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

PREREQUISITE: Successful completion of 8025 Principles of Biomedical Sciences.

#### **8027 Medical Interventions**

Students investigate a variety of interventions involved in the prevention, diagnosis and treatment of disease as they follow the life of a fictitious family. The course is a "How-To" manual for maintaining overall health and homeostasis in the body. Students explore how to prevent and fight infection; screen and evaluate the code in human DNA; prevent, diagnose and treat cancer; and prevail when the organs of the body begin to fail. Through these scenarios, students are exposed to a range of interventions related to immunology, surgery, genetics, pharmacology, medical devices, and diagnostics.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of 8026 Human Body Systems.

#### 8028 Biomedical Innovation

In this capstone course, students apply their knowledge and skills to answer questions to solve problems related to the biomedical sciences. Students design innovative solutions for the health challenges of the 21st century as they work through progressively challenging open-ended problems, addressing topics such as clinical medicine, physiology, biomedical engineering, and public health. They have the opportunity to work on an independent project and may work with a mentor or advisor from a university,

hospital, physician's office, or industry. Throughout the course students are expected to present their work to an adult audience that may include representatives from the local business and health care community.

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

**PREREQUISITE:** 8025 - Principles of the Biomedical Sciences and 8026 - Human Body Systems, and completion of or concurrent enrollment in 8027 - Medical Interventions

## **Project Lead The Way-Pathway to Engineering**

Program	Course	Course Name	Credits
	Number		
	8005	Introduction to Engineering Design (Prerequisite course)	1
Project Lead the	8006	Principles of Engineering	1
Way – Pathway to Engineering	8007	Digital Electronics	1
	8008	Aerospace Engineering	1
	8011	OR Civil Engineering and Architecture	
	8009	Engineering Design and Development	1

### 8005 Introduction to Engineering Design

This foundation course emphasizes the development of a design. Students use computer software to produce, analyze and evaluate models of projects solutions. They study the design concepts of form and function, then use state-of-the-art technology to translate conceptual design into reproducible products.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Successful completion of or concurrent enrollment in Algebra I.

### 8006 Principles of Engineering

This foundation course provides an overview of engineering and engineering technology. Students develop problem-solving skills by tackling real-world engineering problems. Through theory and practical hands-on experiences, students address the emerging social and political consequences of technological change.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

**PREREQUISITE:** Successful completion of Introduction to Engineering Design (8005) and successful completion of or concurrent enrollment in Geometry.

#### 8007 Digital Electronics

This foundation course introduces students to applied digital logic, a key element of careers in engineering and engineering technology. This course explores the smart circuits found in watches, calculators, video games and computers. Students use industry-standard computer software in testing and analyzing digital circuitry. They design circuits to solve problems, export their designs to a printed circuit auto-routing program that generates printed circuit boards, and use appropriate components to build their designs. Students use mathematics and science in solving real-world engineering problems.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of Principles of Engineering (8006) and successful completion of or concurrent enrollment in Algebra 2.

#### 8008 Aerospace Engineering

The pathway course introduces students to the world of aeronautics, flight, and engineering. Students in this course will apply scientific and engineering concepts to design materials and processes that directly measure, repair, improve, and extend systems in different environments.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of Principles of Engineering (8006) and successful completion of or concurrent enrollment in Algebra 2.

### 8009 Engineering Design and Development

In this capstone course, students work in teams to design and develop an original solution to a valid open-ended technical problem by applying the engineering design process. Students perform research to choose, validate, and justify a technical problem. After carefully defining the problem, teams design, build, and test their solutions while working closely with industry professionals who provide mentoring opportunities. Finally, student teams present and defend their original solution to an outside panel. This course is appropriate for 12th grade students.

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

**PREREQUISITE:** Successful completion of Digital Electronics (8006) and Aerospace Engineering (8007) and successful completion of or concurrent enrollment in Precalculus.

## 8011 Civil Engineering and Architecture

Civil Engineering and Architecture (CEA) is an elective course in the PLTW Engineering Pathway to Engineering Program. In CEA students are introduced to important aspects of building and site design and development. They apply math, science, and standard engineering practices to design both residential and commercial projects and document their work using 3D architectural design software. Utilizing the activity-project-problem-based (APB) teaching and learning pedagogy, students will progress from completing structured activities to solving open-ended projects and problems that require them to develop planning, documentation, communication, and other professional skills.

Through both individual and collaborative team activities, projects, and problems, students will solve problems as they practice common design and development protocols such as project management and peer review. Students will develop skill in engineering calculations, technical representation and documentation of design solutions according to accepted technical standards, and use of current 3D architectural design and modeling software to represent and communicate solutions.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of Principles of Engineering (POE) and successful completion or concurrent enrollment in Algebra 2.

## **Teacher Academy of Maryland (TAM)**

Program	Course	Course Name	Credits
	Number		
	5500	Human Growth and Development through Adolescence	1
Teacher Academy	5510	Teaching as a Profession	1
of Maryland (TAM)	5520	Foundations of Curriculum and Instruction	1
	5530	Education Academy Internship	1

CCPS has articulation agreements with several universities which result in students receiving college credits and/or scholarships for completing the TAM program. In order to be eligible for these credits, students must achieve an 80% or better in each of the four courses listed below and enroll in that particular university.

### 5500 Human Growth and Development Through Adolescence

This is an exciting first course in the Teacher Academy of Maryland (TAM) program because it appeals directly to what gets most prospective teachers interested in an education career – the joy of working with children. It is also a course that appeals to something fundamental to adolescents – studying and understanding themselves. This course focuses on human development from birth through adolescence. Emphasis is placed on theories of physical, cognitive, and psychosocial development, the effect of heredity and the environment, the role of caregivers and the family, health and safety concerns, and contemporary issues. Students explore special challenges to growth and development. Students will have opportunities for guided observation of children from birth through adolescence in a variety of settings to

help students further understand theories of human development. Students will begin to develop the components of a working portfolio to be assembled upon completion of the internship.

CREDIT: 1 TYPE: Academic GRADE: 10-12

### 5510 Teaching as a Profession

This is the second course in the Teacher Academy of Maryland (TAM) program. The course focuses on the profession of teaching - its history, purposes, issues, ethics, laws and regulations, roles, and qualifications. Emphasis is placed on identifying the current, historical, philosophical and social perspectives of American education, including trends and issues. Students will explore major approaches to human learning. Students will participate in guided observations and field experiences in multiple settings to help them assess their personal interest in pursuing careers in this field and to identify effective learning environments. Students will continue to develop the components of a working portfolio to be assembled upon completion of the internship.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of or concurrent enrollment in 5500 Human Growth and Development through Adolescence.

#### 5520 Foundations of Curriculum and Instruction

This course explores curriculum delivery models in response to the developmental needs of all children. Emphasis is placed on the development of varied instructional materials and activities to promote learning, classroom management strategies, and a supportive classroom environment. Students will explore basic theories of motivation that increase learning. Students will participate in guided observations and field experiences to critique classroom lessons in preparation for developing and implementing their own. Students will continue to develop the components of a working portfolio to be assembled upon completion of the internship.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of Human Growth and Development Through Adolescence (5500) AND Teaching as a Profession (5510).

#### 5530 Education Academy Internship

The internship is the culminating course of the Education Academy Program. Students will have an opportunity to integrate content and pedagogical knowledge in an educational area of interest. They will have an opportunity to extend and apply their knowledge about teaching in a classroom setting under the supervision of a mentor teacher. This internship may be with a teacher in their school or a neighboring elementary or middle school. The students will complete their working portfolio and present it for critique. Students are responsible for providing their own transportation to and from their internship.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of 5500-Human Growth and Development Through Adolescence AND 5510-Teaching as a Profession.

## Welding

Program	Course Number	Course Name	Credits
Welding	8911	Welding I	2
	8921	Welding II	3

## **8911 Welding I** (Welding Level I is comprised of two courses: Introduction to Construction and Foundation Topics in Welding)

Students who take this Level 1 course will receive their English instruction at the Career and Technology Academy. Students are introduced to the welding industry through basic units in welding safety, shielded

metal-arc welding, oxyacetylene cutting, and the operation of related power equipment. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 2 TYPE: Academic GRADE: 11

## **8921 Welding II** (Welding Level II is comprised of two courses: Advanced Topics in Welding and Welding Capstone)

Students are introduced to structural arc welding, innershield welding, gas arc welding (MIG), gas tungsten arc welding (TIG), and plasma cutting. Students who complete this program have the opportunity to earn AWS certification. Emphasis is upon the inspection and testing of welds, repair welding, fabrication and project construction, low pressure pipe welding, and aluminum and stainless steel welding. Students may acquire structural welding certification. It is strongly recommended that students join SkillsUSA, which enables students the opportunity to compete in a skill or trade at SkillsUSA competitions held throughout the year. This course has required fees and materials. Visit the CTA website at <a href="https://cta.calvertnet.k12.md.us">https://cta.calvertnet.k12.md.us</a> for most up to date costs for the program. Assistance in program fees available for students who qualify. Pursuant to Board Policy 1500.3, students in this course are required to successfully complete a safety examination to be eligible to participate in lab/shop activities. Participation in such activities may be required in order to obtain industry certification. Wherever possible, safety examinations themselves offer a portable, recognizable industry credential.

**COURSE NOTE:** This course is taught at the Career & Technology Academy.

CREDIT: 3 TYPE: Academic GRADE: 12

PREREQUISITE: Welding I (8911).

## **Business Education**

### 5000 Principles of Business Administration and Management

This is a required course in all four Business, Management, and Finance pathways. In this course you will learn the basic principles surrounding economics, management, marketing, accounting, business ethics, business law, business communication, and careers in business. Enjoy many on-line learning programs, listen to and learn from motivational guest speakers representing various fields in business.

CREDIT: 1 TYPE: Academic GRADE: 9-12

### 5030/5035 Office Systems Management (Word/PowerPoint)

The Office Systems Management (Word/PowerPoint) course provides students with a study of advanced business practices, information systems and computer applications. Students develop managerial and technical skills for business support operations through applied learning. Problem-solving skill development is incorporated throughout the course. Competencies include: applying emerging technologies in order to complete appropriate office operations; using advanced desktop publishing and word processing software in order to create business documents and professional presentations; exhibiting appropriate interpersonal knowledge of acceptable values and behaviors in order to become ethically responsible employees and developing an appreciation of diversity in the workplace. Industry standard office equipment and Microsoft Office software will be used in this course. When students complete this course, they will be able to obtain the advanced competencies to take the Microsoft Office Specialist exam for industry certification in MS Word and/or MS PowerPoint.

**COURSE NOTE:** Students wishing to complete the Business Administrative Services pathway should register for 5030. Students who are not planning on completing the Business Administrative Services pathway should register for 5035.

CREDIT: 1 TYPE: Academic GRADE: 10-12

## 5050 Principles of Accounting

This is a required course in all four Business, Management, and Finance pathways. This course provides students with the skills and knowledge necessary to manage and maintain a small company's financial resources in daily operating decisions. Students will learn to apply generally accepted accounting principles to determine the value of assets, liabilities, and owner's equity as they apply to various forms of business ownership. In addition, students will prepare, interpret, and analyze financial statements using manual and computerized systems for service and merchandising businesses. Upon completion of the course, students will also have a good understanding of payroll, payroll and sales tax liabilities and have the skills to manage a business checking account.

CREDIT: 1 TYPE: Academic GRADE: 10-12

#### 5065 Advanced Accounting

This course explores methods for using accounting data in planning, controlling, predicting, and evaluating business initiatives. Students learn to make business decisions which integrate tools such as cash flow analysis, cost, accounting, cost volume profit analysis, budgeting, and other quantitative methods. Software will be used to apply accounting principles learned in this class. This course will prepare students to enter the workforce and provide the tools for success in college. This course, along with Accounting I, is articulated with the College of Southern Maryland.

**COURSE NOTE:** Students wishing to complete the Accounting pathway should register for 5060. Students who are not planning on completing the Accounting pathway should register for 5065.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of Principles of Accounting (5050) with a 70% or higher AND completion of or concurrent enrollment in Principles of Business Administration and Management (5000).

#### 5100 Office Systems Management (Excel/Access)

The Office Systems Management (Excel/Access) course provides students with a study of advanced skills using Microsoft's leading business productivity software to create spreadsheets and databases. Students will be expected to think analytically, manipulate information, and use the computer as a

## Course Descriptions - Business Education

productivity tool through integrated application programs. Expertise in technology will contribute to students' future career mobility, advancement potential, compensation and job satisfaction. Industry standard office equipment and Microsoft Office software will be used in this course. When students complete this course, they will be able to obtain the advanced competencies to take the Microsoft Office Specialist exam for industry certification in MS Excel and/or MS Access.

CREDIT: 1 TYPE: Academic GRADE: 10-12

### 5165 Advanced Business Management

This course explores advanced topics such as major management theories and functions, operational aspects of management, human resource management, production management, accounting and marketing management, and international management. In this course, students will prepare a formal business plan for a small, service-based or goods-based business. This course prepares students to pass the College Board's CLEP (College Level Examination Program) exam in Principles of Management. The CLEP exam is recognized by close to 3,000 colleges and universities nationwide. Students earn three college credits by passing this exam. There is an \$80 test fee and a \$25 sitting fee required to take the exam at the College of Southern Maryland. More information is available about the CLEP exam at www.collegeboard.org/clep.

**COURSE NOTE:** Students wishing to complete the Business Management pathway should register for 5160. Students who are not planning on completing the Business Management pathway should register for 5165.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**PREREQUISITE:** Successful completion of 5000 Principles of Business Management with a 70% or higher and completion of OR concurrent enrollment in 5050 Principles of Accounting.

### 5230S/5230So Financial Literacy: Money Management

This course is being offered in a face-to-face or online environment.

The Financial Literacy: Money Management Course represents those standards of learning that are essential and necessary for all students. The implementation of the ideas, concepts, knowledge, and skills contained in the Financial Literacy: Money Management Course will enable students to implement those decision-making skills they must apply and use to become wise and knowledgeable consumers, savers, investors, users of credit, money managers, citizens, and members of a global workforce and society. The General Financial Literacy Course will incorporate concepts and skills from mathematics, language arts, social studies, applied technology, character education, and applied service learning. Using a "hands-on" instructional approach involving techniques such as problem solving, reasoning, simulation, and direct application of the concepts of this course to the world in which students live will empower them to incorporate the concepts of the General Financial Core into their lives. Students wishing to take this course online should use course number 5230So. Students taking this course online will have required face to face meetings, that may take place in-person or virtually, that will occur after school or on Saturdays. There will be six scheduled meetings and students will be required to attend at least four.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

## Course Descriptions - Business Education

## 5240S Computer Keyboarding for College and Careers

This course is for students who are either in a college preparatory pathway or a technical preparation pathway leading to postsecondary studies or career placement. Computer Keyboarding for College and Careers will provide students with the knowledge and skills to become competent computer operators. Students will become proficient in touch keyboarding and word processing skills. These skills will be used to produce a variety of professional and personal documents that can be used in college, future careers and the students' personal lives.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

## Course Descriptions – Computer Science

## **Computer Science**

Computer science courses are intended to provide students with the knowledge and skills necessary to effectively use computers. The computer science program offers students experiences in the study of computers and their capabilities, computer languages, programming techniques, problem solving skills and the use of the computer and appropriate software as a problem solving tool. The courses are offered on an elective basis.

#### 3505/35050 Foundations of Computer Science

This course is designed to introduce students to the field of computer science through an exploration of the conceptual ideas of computing. The course will help students understand why certain software tools and programming languages are utilized to solve particular problems. The goal is to develop in students the computational thinking practices of algorithm development, problem solving and programming within the context of real world challenges relevant to the rapidly changing world of 21st century computing. Students will also be introduced to topics such as interface design, limits of computers and societal and ethical issues.

As a result of this course, students will develop the knowledge, skills, and abilities to perform the following computational practices:

- Describe and analyze the effects of developments in computing, including the role of Cyber Security;
- Design and implement creative solutions and artifacts to solve real-world problems;
- Apply abstractions and models using appropriate programming languages;
- Analyze their computational work and the work of others to determine effectiveness in meeting client needs;
- Connect computation with other disciplines and the role of Information Technology (IT) professionals;
- Communicate thought processes (used in development) and results (product review); and
- Work effectively in teams to identify and develop computing solutions.

Foundations of Computer Science is a prerequisite course to a 3 course Career and Technology Education program of study called Computer Science. This course meets the graduation requirement for Technology Education.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### 3506 AP Computer Science Principles

This course advances students' understanding of the technical aspects of computing including: programming and algorithm design, computer system organization and operation, and data representation and information organization. Specific programming languages may include Processing, C++, and Java.

As a result of this course, students will:

Demonstrate proficiency in programming and algorithm design that requires the use of data abstraction to solve basic programming problems in multiple (or single) programming paradigms;

- Analyze computer systems including components, organization, and operation;
- Demonstrate in-depth knowledge of how computer systems work individually and collectively;
- Apply principles of data representation and information organization at the machine level for program analysis;
- Apply principles of data representation and information organization at the data structure level for program implementation;
- Apply principles of data representation and information organization at the problem representation and files and database levels for solution design;
- Analyze the interaction amongst systems for people for overall system design and effectiveness;
- Work effectively in teams in collaborative software development.

This course is the first course of a three course Career and Technical Education program of study called Computer Science. This course meets the graduation requirement for Technology Education if not also used as part of a CTE pathway.

# Course Descriptions – Computer Science

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA PREREQUISITE: 3505/3505o - Foundations of Computer Science

#### 3511 App Development

This course is designed to further a student's understanding of computer programming by gaining a solid knowledge of the Java programming language and then applying those skills by developing apps and games using Android® Studio App Inventor.

Students will start by creating increasingly complex programs in an integrated development environment (IDE) such as Eclipse®.

The purpose of the class is to not only teach students how to program, but also to prepare students for college or the workplace as they learn about how applications work and how to program them. The students will create actual apps that can be downloaded to their smartphones or tablets, and theoretically can be put out on the market. This course is the second course of a three course Career and Technology Education program of study called Computer Science.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: 3505/3505o - Foundations of Computer Science or 3506 AP Computer Science

Principles

# 3509/3519 AP Computer Science Coding

Students are taught how to write logically structured, well-documented computer programs. Major course emphases are programming methodology, algorithms, and data structures. Computer systems and the social implications of computing are also examined. The programming language used is JAVA, which is the only language employed on the Advanced Placement Computer Science examination. Since documentation plays a central role in this course, students must have good written communication skills. Similarly, prior to enrollment, students should be able to structure and develop a topic in a logical manner. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who enroll in this course are not required to take the national Advanced Placement examination. However, this course does prepare them for the "A" version of the Advanced Placement Computer Science examination. Students who complete an Advanced Placement course shall receive a weighted grade.

**COURSE NOTE:** Students wishing to complete the Computer Science CTE pathway should register for Course 3519. Students who are not planning on completing the Computer Science CTE pathway should register for Course 3509.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Successful completion of Academic Algebra 2 (3135) and AP Computer Science Principles (3506) with a grade of 80% or higher and teacher recommendation.

# **English**

# 1104 English 9

This course is designed to offer students experiences in reading and analyzing both literature and literary nonfiction texts. Students will also learn to write both informational and argument essays, as well as some narrative compositions and research assignments. Reading, writing, language, and speaking/listening skills are taught through thematic integrated units aligned with the Maryland College and Career-Ready (MCCR) Standards. This course is designed to help students prepare for the MCAP Assessment in English.

CREDIT: 1 TYPE: Academic GRADE: 9 NCAA

#### 1107 Honors English 9

This course is designed to offer students experiences in deep analysis of both literature and literary nonfiction texts, as well as composing narrative, informational, and argument writing. Rhetorical techniques and stylistic devices are studied, and research is emphasized. Thematic units of study aligned with the Maryland College and Career-Ready (MCCR) Standards. This course is designed to help students prepare for the MCAP Assessment in English.

CREDIT: 1 TYPE: Honors GRADE: 9 NCAA

#### 1204 English 10

This course focuses on the further development of analysis and interpretation of different types of literary works and literary nonfiction, and the writing of narrative, informational, and argument texts. Research processes and skills are emphasized. Reading, writing, language, and speaking/listening skills are presented through thematic integrated units aligned with the Maryland College and Career-Ready (MCCR) Standards. This course is designed to prepare students for the MCAP Assessment in English 10.

CREDIT: 1 TYPE: Academic GRADE: 10 NCAA

### 1207 Honors English 10

Different types of complex literary works and literary nonfiction are read and analyzed closely. Composition assignments and research activities focus on various types of writing and rhetorical situations. Reading, writing, language, and speaking/listening skills and processes are presented through integrated thematic units aligned with the Maryland College and Career-Ready (MCCR) Standards. This course is designed to prepare students for the MCAP Assessment in English 10.

CREDIT: 1 TYPE: Honors GRADE: 10 NCAA

#### 1304 English 11

In addition to literature and literary nonfiction works, foundational U.S. documents are examined and analyzed. The development of composition skills continues to focus on informational, narrative, and argument writing and research. The study of language supports building skills necessary for the SAT. Reading, writing, language, and speaking/listening skills are presented through integrated thematic units of study aligned with the Maryland College and Career-Ready (MCCR) Standards.

CREDIT: 1 TYPE: Academic GRADE: 11 NCAA

#### 1307 Honors English 11

Foundational U.S. documents, multicultural literature, and literary nonfiction are analyzed closely for content and style. Students explore various rhetorical components of informational, narrative, and argument writing. Daily routine writing and elements of research are practiced. The study of language supports building skills necessary for the SAT. Reading, writing, language, and speaking/listening skills are presented through integrated thematic units aligned with the Maryland College and Career-Ready (MCCR) Standards.

CREDIT: 1 TYPE: Honors GRADE: 11 NCAA

# 1309/13090 Advanced Placement English Language and Composition

This course is being offered in a face-to-face or online environment.

This course prepares students for the College Board's Advanced Placement Examination in English Language and Composition through a college-level class. Emphasis is on the analysis of rhetorical devices employed in nonfiction, including essays, articles, and speeches. Students continually write timed and un-timed essays on a variety of subjects. In addition to a weighted grade and the possibility of receiving college credit, students who successfully complete this course will earn their required high school English credit. Taught at the college level, this course affords advanced eleventh and twelfth grade students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade. Students may be required to complete a summer assignment. Use course number 13090 if you wish to take this course online.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11 or 12 NCAA

**PREREQUISITE:** Attainment of a grade of 80% or higher average in all prior required English courses, enrollment in Honors English during the prior school year, and the recommendation of the most recent departmental instructor.

#### 1404 College and Career Ready English 12

Students will study fiction and informational works from several literary periods while continuing to develop and refine their writing skills in informational, narrative, and argument writing. Several writings in various modes will be required. Reading, writing, language, speaking and listening skills will be taught through thematic units aligned with the Maryland College and Career-Ready (MCCR) Standards.

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

### 1406 Honors Composition and Rhetoric

The focus for this course is the refinement of students' writing skills in composing college-level essays. During the first semester, students will receive further assistance in developing their critical reading and comprehension skills. During the second semester, students will focus on planning, organizing and developing a variety of compositions. In addition to enhancing their literacy skills, students will also refine their research and documentation techniques. The rigor and delivery of instruction for this course will mirror that of a community college course, and instructional materials will be aligned with those used at the College of Southern Maryland (CSM). Students who successfully complete the first semester of this course, as determined by class performance and CSM requirements, will be given the opportunity in the second semester to register for dual enrollment with CSM for their version of a parallel course. Students who choose this option will earn CSM college credits for successful completion of the second semester course.

CREDIT: 1 TYPE: Honors GRADE: 11 or 12 NCAA

PREREQUISITE: Completion of English 10

# 1408 Honors Composition and Literature (offered in the 2024 – 2025 school year and beyond)

This course builds on the planning, organizing, and critical analysis skills learned in Honors Composition and Rhetoric or AP English Language and Composition. Students use literature (short fiction, poetry, drama, and novels) as the basis of their critical analysis to extend, deepen, and illuminate their own experiences and connections with the larger world and contemporary issues. Students further master the conventions of written Standard American English, information literacy skills, and research and documentation techniques including conducting online and print research and documenting sources. By the end of the course, students demonstrate their ability to write unified, coherent essays that are nearly free of grammatical, mechanical, and structural errors. The rigor and delivery of instruction for this course will mirror that of a community college course, and instructional materials will be aligned with those used at the College of Southern Maryland (CSM). Students who successfully complete the first semester of this course, as determined by class performance and CSM requirements, and who have previously earned CSM 1010 credit through successful completion of Honors Composition and Rhetoric or earning a score

# Course Descriptions - English

of 3 or more on the AP English Language and Composition exam, will be given the opportunity in the second semester to register for dual enrollment with CSM for their version of a parallel course. Students who choose this option will earn CSM college credits for successful completion of the second semester course.

CREDIT: 1 TYPE: Honors GRADE: 12 NCAA

**PREREQUISITE:** Completion of English 11 (score of 3 or higher on AP Lang. exam or CSM credit earned in 1406 required for CSM credit eligibility in 1408)

#### 1409/14090 Advanced Placement English Literature and Composition

This course is being offered in a face-to-face or online environment.

An intense examination of English literature, from the Anglo-Saxon period to the present, is conducted. Prominent literary movements are studied. In addition to lyrics, satires, and essays, novels by Dickens, and Hardy, and dramas by Sophocles, Shakespeare, Shaw, and Beckett are read. Advanced techniques of analytical writing are taught. Composition assignments include themes in which tone, prosody, and style are analyzed. Taught at the college level, this course affords advanced twelfth-grade students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade. Students may be required to complete a summer assignment. Use course number 1409o if you wish to take this course online.

CREDIT: 1 TYPE: Advanced Placement GRADE: 12 NCAA

**PREREQUISITE:** Attainment of a grade of 80% or higher average in all prior required English courses, enrollment in Honors English during the prior school year, and the recommendation of the most recent departmental instructor.

#### 1500 Journalism I

Students receive an introduction to the organization and function of all aspects of the media, including newspapers, magazines, yearbooks, the Internet and broadcasting. Specific instruction is given in interviewing, researching, and writing news stories, sports stories, feature stories, editorials and entertainment reviews. Copy editing, advertising, broadcasting and principles of publication design and production are covered. Attention is given to the ethics and law of the media. Some practical experience in scholastic journalism may be included. The course is a prerequisite to joining the school newspaper, yearbook or broadcasting staffs.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Successful completion of an eighth grade English Language Arts course with a grade of C or higher.

#### 1510 Journalism II: Broadcasting

This class produces the daily in-school television news and information program. Students learn concepts and skills in television production through classroom instruction and hands-on work in a laboratory setting. Experiences include script writing, video photography, videotape editing, directing, performing, reporting and producing a daily television news and information program. Students are graded for performing all roles in the production and for taped reports and other material prepared for the program. Students are responsible for all aspects in the creation of the broadcast.

CREDIT: 1 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** Successful completion of Journalism I (1500) or Theatre I (6500) or instructor's recommendation.

### 1520 Journalism II: Newspaper

Students receive both theoretical training and practical experience in journalism through the production of the school newspaper. Experiences include news writing, feature-story writing, sports writing, interviewing, word processing, creating layouts using desktop publishing software, proofreading and editing copy using computers, taking and scanning photographs and using digital photo software to edit and process photos. Students assign stories, research them, input them into computers, take digital

# Course Descriptions - English

photos, create camera-ready layout pages for the publication, and are responsible for all aspects of operating the newspaper.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Journalism I (1500) or instructor's recommendation.

#### 1530 Journalism II: Yearbook

Students receive both theoretical training and practical experience in journalism through the production of the school yearbook. Opportunities are provided for experiences in writing copy for the publication, interviewing, word processing, creating layouts using desktop publishing software, proofreading and editing copy using computers, taking and scanning photographs and using digital photo software, business, advertising, promotion and publication management. Students are assigned pages and sections of the book, input materials into computers, take photos, create camera-ready layout pages for the publication, and are responsible for all aspects of creating the yearbook.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Journalism I (1500) or instructor's recommendation.

#### 1540 Journalism III: Advanced Broadcasting

Students gain knowledge and experience in broadcast journalism by serving as editorial leaders of the daily in-school television news and information program. Students learn concepts and skills in television production through classroom instruction and hands-on work in a laboratory setting. Experiences include writing and editing the daily script, planning and overseeing video photography, videotape editing, directing, performing, reporting and producing a daily television news and information program. Students organize and oversee all aspects of the production including creation of taped reports and other material for the program. This course may be taken a second time, but the granting of credit is contingent upon continuous growth in the subject.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of Journalism II: Broadcasting (1510) and Journalism III instructor's recommendation and determination that the student will hold a production leadership post on the broadcast staff.

# 1550 Journalism III: Advanced Newspaper

Students receive both theoretical training and practical experience in journalism by serving as student leaders in the production of the school newspaper. Students in Journalism III will take the class concurrently with Journalism II students and will serve as editors of the publication. Experiences include assigning stories and managing student reports, writing and editing copy using computers, word processing, creating and editing layouts using desktop publishing software, taking and scanning photographs and using digital photo software to edit and process photos. Students in this course are expected to serve both as managers and student leaders of the publication. This course may be taken a second time, but the granting of credit is contingent upon evidence of continuous growth in the subject.

CREDIT: 1 TYPE: Academic GRADE: 12

**PREREQUISITE:** Successful completion of Journalism II: Newspaper (1520) and Journalism III instructor's recommendation and determination that the student will hold an editorial leadership post on the publication staff.

#### 1560 Journalism III: Advanced Yearbook

Students receive both theoretical training and practical experience in journalism by serving as student leaders in the production of the school yearbook. Students in Journalism III will take class concurrently with Journalism II students and will serve as editors of the publication. Experiences include assigning stories and managing student staff, writing and editing copy using computers, word processing, creating and editing layouts using desktop publishing software, taking and scanning photographs using digital photo software, handling advertising and yearbook business. Students in this course are expected to serve both as managers and student leaders of the publication. This course may be taken a second time, but the granting of credit is contingent upon evidence of continuous growth in the subject.

CREDIT: 1 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion of Journalism II: Yearbook (1530) and Journalism III instructor's

# Course Descriptions - English

recommendation and determination that the student will hold an editorial leadership post on the publication.

# 1570S Creative Writing

This course is designed for students who have a sound knowledge of basic writing skills and who wish to exercise their imaginations by writing stories, plays, and poems. This course may be repeated for credit with the instructor's approval.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

PREREQUISITE: English 9

#### 1590 Introduction to Film

While developing the skills necessary to analyze a film, the predominant literary art form of the modern world, students are introduced to the art of the motion picture. The history of film from the beginnings to contemporary times is traced. The principal focus of this course is on techniques employed by various directors in different time periods to translate a story from script to film. Students write analyses of different aspects of films, works of major directors, and movements in the film industry.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Successful completion of the most recent English class with a grade of 70% or higher.

# **Family and Consumer Science**

# 6610 Nutrition Technology

This course helps students understand the basics of nutrition across the life span and the technological systems that affect the food supply. In addition, students explore the relationship between diet and nutrition-related health problems and disease. Students evaluate the accuracy of nutrition information from a variety of sources in order to make decisions regarding food choices. In planning and preparing nutritious meals, students have an opportunity to utilize a variety of kitchen equipment and computers to analyze diets and recipes. Careers in the nutrition and food service industries will be explored. This course is recommended to students who are interested in pursuing a career in buffet catering and/or child development. Cooking opportunities will be limited.

CREDIT: 1 TYPE: Academic GRADE: 10-12

#### 6620 Cultures and Cuisines

Students focus on their own eating experiences as they gain confidence in culinary skills through the selection and preparation of health foods from their own and other cultures. Using the USDA Food Pyramid, students analyze the commonalities and uniqueness of eating patterns across cultures while studying the history and geography of those areas. Computer generated dietary analysis, recipe conversions, and shopping lists assist students as they learn current cooking techniques and food presentation ideas from diverse culinary traditions. Culinary history is explored as students work with herbs, spices and ingredients from cultures represented in their studies. Careers relating to ethnic cuisines in the food industry and global food economics are investigated.

CREDIT: 1 TYPE: Academic GRADE: 10-12

# **Fine Arts**

Participation in the Fine & Performing Arts provides all students with the opportunity to develop a wide variety of college and career ready skills that will serve them well in their post-secondary life, no matter their future career or course of study. Additionally, the arts provide students the opportunity to experience that which makes us uniquely human; the ability to have an aesthetic experience. Calvert County Public Schools offers coursework in the areas of Dance, Music, Theatre, and Visual Art in order to allow students to pursue the area(s) in which they have the greatest interest.

# **Dance**

The high school dance program is designed to provide opportunity for students of all levels of ability to gain skills, knowledge and appreciation of the art form of dance as an active participant. Courses are available for students with no prior dance training or experience. Students with previous dance experience have the opportunity to participate in advanced level coursework based upon results of an audition with the instructor. Public performances will be an integral part of this course of study, and will include opportunities for students to perform individually, or in groups of varying sizes.

#### 6000 Dance I

This course focuses on placement, alignment, dance positions and beginning dance technique in ballet, jazz, tap, and modern dance. Body strength and flexibility are emphasized. Students study physiology, dance theory and history, terminology and critique, and choreography. Students are required to wear appropriate dance attire, dance shoes, and costumes. Dance attire purchased through the school will not exceed \$90.00. Public performance is a required component of this course.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 6010 Dance II

This course focuses on more extensive work in body placement and alignment, flexibility and strength, and dance technique in ballet, jazz, tap and modern dance. Continued study of dance history, physiology, dance theory, choreography, dance vocabulary, and dance critique occurs. This course may be repeated for credit with the instructor's approval. Students are required to wear appropriate dance attire, dance shoes, and costumes. Dance attire purchased through the school will not exceed \$90.00. Public performance is a required component of this course.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Successful completion of Dance I (6000) with a grade of 70% or higher or the recommendation of the instructor after an audition and placement evaluation.

#### Music

The high school music program is a highly varied program. Music instruction is provided in all schools to help students gain skills, knowledge, and appreciation as active participants in the art of making music. Opportunities are provided for students to sing, play instruments, read, listen, create, interpret music, and accumulate knowledge and values at the various levels of skill appropriate to their capabilities.

Opportunities for individual, small group, and large group instruction are available.

Performing groups may be organized according to the musical experience and ability of students. The names of these organizations will vary from school to school.

Advanced courses are offered for any students who wish to continue to develop their musical skills.

# 6300 Music Theory

Music theory is for music students who wish to enhance their understanding of the fundamentals of music, including the relationship to music history. Students study ear-training, sight-singing, the elements of music, and music analysis. Composition is an outgrowth of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Ability to read music and instructor's recommendation.

#### 6309 Advanced Placement Music Theory

Advanced Placement Music theory is for serious music students who wish to enhance their understanding of the fundamentals of music, including the relationship to music history. Students study ear-training, sight-singing, the elements of music, and music analysis. Composition is an outgrowth of this course. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12

**PREREQUISITE:** Successful completion of 6300 Music Theory in the previous academic year or a successful passing of the AP Music Theory course pre-test with 80% or higher.

#### 6310 Chorale

This course is designed for ninth-grade students who have middle school choral performance experience and for tenth, eleventh, and twelfth-grade students whose choral background is limited. In addition to the introduction to four-part singing, the development of choral techniques includes intonation, balance within and among sections, choral blend, diction, and sight reading. Interpretation and expression are emphasized, and students perform choral music from various historical periods and cultural backgrounds. Performance etiquette and listening skills are refined. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

#### 6320 Chorus I

In this course designed for the beginning singer, students become familiar with basic vocal production techniques, including posture, breathing, diction, and vowel placement. Emphasis is placed on intonation, balance, blend, interpretation, and expression. The repertoire may include folk, jazz, and modern musical themes. Students learn to appreciate music from various cultures. They acquire an understanding of appropriate concert and audience etiquette. Public performance is a required component of this course.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 6340 Chamber Chorus

This course is designed for a small, highly selective group of advanced singers, who perform the chamber music of all periods. Vocal techniques as well as the historical and theoretical aspects of chamber music are studied. Students are required to possess both a high degree of musicianship and the ability to sing independently. Public performance is a required component of this course. The nature of the Chamber Chorus repertoire necessitates that all students attend every performance. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

#### 6350 Music Theatre

Works from the musical stage and other selected music are performed. Choreographed movement, advanced musicianship, theatre terminology, and stage deportment are studied. Both individual and ensemble performances constitute a major part of this course. Consequently, attendance at all performances is required, and public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

#### 6360 Concert Chorus

Through the refinement of choral techniques, advanced singers explore the wide range of serious choral literature for the advanced mixed ensemble written during the time from the Renaissance through the Twentieth Century. Both solo and small ensemble participation are encouraged. Public performance is a required component of this course, and a rigorous performance schedule is maintained. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Previous experience and recommendation of the instructor after an audition and/or consultation with the previous teacher.

### 63700 Music Appreciation online

Music Appreciation is an online course that introduces students to the history, theory, and genres of music, from the most primitive surviving examples, through the classical to the most contemporary in the world at large. The first semester presents the rich modern traditions, including: gospel, folk, soul, blues Latin rhythms, rock and roll, and hip-hop. This online course explores the interface of music and social movements and examines how the emergent global society and the Internet is bringing musical forms together in new ways from all around the world. This course is only offered online.

CREDIT: 1 TYPE: Academic GRADE: 12

#### 6400 Concert Band

This course is designed to help advance students' music skills through sectional or individual technical training and through ensemble rehearsals. Students acquire technical skills and play developmental music literature. They also study the fundamentals of music theory. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Previous small-group instrumental lessons and/or small-group ensemble experience.

# 6410 Symphonic Band

This course is designed for student-musicians who have had instrumental training and some experience in larger ensemble rehearsals. Students study a wide variety of music literature. They increase their knowledge of music theory, ensemble intonation and balance, the proper rendition of scales and rhythms, and other aspects of music scores. It is expected that students will practice on a daily basis. As members of the Symphonic Band, students play for selected concerts, assemblies, parades, and other community and school events. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** At least two years of previous instrumental experience and the recommendation of the instructor after an audition. To enroll in this course, a student and his or her parent or guardian will be required to sign a contract with the school in which course expectations are outlined.

#### 6420 Wind Ensemble

The Wind Ensemble consists of the most experienced instrumentalists who play a variety of music literature. Advanced music concepts are discussed. Students increase their knowledge of music theory, ensemble intonation and balance, the proper rendition of scales and rhythms, and other aspects of music

scores. They explore and develop those skills that are basic to careers in music. It is expected that students will practice on a daily basis and audition for honors bands. As members of the Wind Ensemble, students play for concerts, assemblies, and other community and school events. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Previous advanced instructional experience and recommendation of the instructor after an audition. To enroll in this course, a student and his or her parent or guardian will be required to sign a contract with the school in which course expectations are outlined.

#### 6430 Jazz Ensemble

Jazz Ensemble is designed for students with advanced music skills. The following types of music are studied: popular, swing, jazz, and rock. Creativity, improvisation, and refined aural skills are fostered. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

### 6440 String Orchestra

This course is designed for student-musicians who have had instrumental training and some experience in larger ensemble rehearsals. Students study a wide variety of music literature and increase their knowledge of music theory, ensemble intonation and balance. They explore and develop those skills that are basic to careers in music. It is expected that students will practice on a daily basis and audition for honors orchestras. As members of the orchestra, students play for selected concerts, assemblies and other school and community events. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Teacher recommendation and 2 years previous instrumental instruction.

#### 6445 Advanced Orchestra

The Advanced String Orchestra consists of the most experienced instrumentalists who play a variety of literature. Advanced music concepts are discussed. Students increase their knowledge of music theory, ensemble intonation and balance, the proper rendition of scales and rhythms, and other aspects of music scores. They explore and develop those skills that are basic to careers in music. It is expected that students will practice on a daily basis and audition for honors bands. As members of the Advanced String Orchestra, students play for concerts, assemblies, and other community and school events. Public performance is a required component of this course. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Two years previous instrumental instruction, and recommendation of the instructor after an audition.

### 6450 Brass Ensembles: Duets, Trios, Quartets and Quintets

These courses for small instrumental groups of like instruments are designed to develop music skills. Performing usually without a conductor, each member of the ensemble is responsible for maintaining the steady flow of the music. These courses may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

### 6470 Percussion Ensembles: Duets, Trios, Quartets, & Quintets

These courses for small instrumental groups of like instruments are designed to develop music skills. Performing usually without a conductor, each member of the ensemble is responsible for maintaining the steady flow of the music. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Recommendation of the instructor after an audition and/or consultation with the previous teacher.

#### 6475 Symphony Orchestra

This ensemble is designed for students with advanced music skills. These students study all styles of music, with concentration on the symphonic orchestra literature. The main focus of this group is to offer the opportunity to perform as a Full Symphony Orchestra. Students will study and perform music in a full orchestra setting, as well as chamber-type ensembles. It is expected that students will practice on a daily basis and audition for honor band and orchestra. As members of the Symphony Orchestra, students will play for both band and orchestra concerts, assemblies, and other community and school events. After school rehearsals may be a requirement. Students may be required to pay for uniforms (Concert Black), class fees and field trips. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Recommendation of current teacher and/or consultation with the previous teacher.

#### 6480S Guitar I

In this course designed for the beginning guitarist, students become familiar with the fundamentals of guitar. Students will study notation and chord progressions, as it applies to classical, traditional, folk, and popular music (including rock and roll). Students have the opportunity to perform.

**COURSE NOTE:** Students must provide their own acoustic guitar with case.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 6485S Guitar II

In this course designed for students with prior guitar experience. Musicians will explore advanced chords, scales, and notations as applied to folk, jazz, classical, and popular music. Throughout the class, students will acquire higher-level musicianship through ensemble and solo performance. This course may be repeated for credit.

**COURSE NOTE:** Students must provide their own acoustic guitar with case.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Completion of Guitar I with a passing grade of 60% or higher.

#### 6490S Class Piano I

This beginner level course will prepare students on the basics of piano playing technique, music theory, composition, musical analysis, and music history as it relates to piano. Students will learn a variety of styles and techniques through performance on the piano. Students will also survey music from a global perspective.

Credit: .05 Type: Academic Grade: 9-12

# 6495S Class Piano II

Class Piano II focuses on piano playing technique, music theory, composition, musical analysis, and music history as it relates to piano building on skills and knowledge from Class Piano I. Students will learn a variety of styles and techniques through performance on the piano. Students will also survey music from a global perspective. This course may be repeated for credit.

Credit: .05 Type: AcademicGrade: 9-12

Prerequisite: Completion of Class Piano I with a passing grade of 60% or higher.

#### **Theatre**

The high school theatre program is designed to provide opportunity for students to participate in all facets of theatre, to include technical theatre (lighting, sound engineering, set design, costume design, stage management), as well as acting and directing. Students participating in the upper level theatre courses may be required to participate in after-school theatre productions to facilitate application of concepts and skills being learned within the theatre classroom.

#### 6500 Theatre I

Students receive an introduction to the theatre through a study of the following topics: voice and movement, improvisation, pantomime and/or mime, character analysis, costuming, make-up, and set design. Students critically analyze aspects of play productions.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 6510 Theatre II

Students receive both theoretical training and practical experience in the theatre through the production of a play. Opportunities are provided to experience major responsibilities for a drama departmental production. Examples of such experiences include set design, costume design, stage management, and acting and/or directing assignments. Students receive instruction in various advanced techniques of acting, the history of the theatre, the interrelationship of the fine arts, and the critical analysis of dramatic literature from different literary periods. Students may also write scenes and entire plays. As a part of course expectations, students are sometimes required to participate in after-school drama activities. This course may be repeated for credit with the instructor's approval.

CREDIT: 1 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** Successful completion of Theatre I (6500) with a grade of 70% or higher or instructor's recommendation.

# 6520 Advanced Acting I

This course is an intensive study into theatrical performance. The students will study various acting methods, including: Meisner, Stanislavski, Hagen, and Spolin. Students will also study different genres of theatre and the special acting styles needed to perform in each. Such styles will include: Shakespeare, Brecht, Restoration, Avant Garde, and Realism. Students will undertake an extensive study of the development of voice, movement, and imagination. Scene work, monologues, and workshop activities are a major focus of this class.

CREDIT: 1 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** Theatre II (6510) or concurrent enrollment in Theatre II **COREQUISITES:** If you take this course, you must also take 6510 - Theatre II

#### 6530 Advanced Acting II

In this course, students further develop their repertoire of acting methodology and continue their study of various genres of theatre and acting styles. Advanced scene work and audition skills will be emphasized.

CREDIT: 1 TYPE: Academic GRADE: 11-12 PREREQUISITE: Advanced Acting I (6520)

### 6540 Advanced Acting III

In this course, students will perfect audition techniques, character development studies and vocal and movement skills. Students will be given numerous opportunities to participate in scholarship auditions and acting workshops. Students will also explore today's performing arts world focusing on careers, leaders and traits.

**CREDIT:** 1 **TYPE:** Academic **GRADE:** 12 **PREREQUISITE:** Advanced Acting II (6530)

#### 6550 Stagecraft

Students enrolling in this course will study the design and construction of theatre sets and related stage items, as well as stage lighting. They will also become familiar with audiovisual equipment, costuming,

and publicity. Students will be given the opportunity to design for major school productions or student-directed shows. Renderings, drawings, presentations, and portfolios are a major focus of the class. This course may be repeated for credit.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Theatre II (6510) or concurrent enrollment in Theatre II.

### 6570S Improvisational Theatre

Through improvisational technique students will increase their ability to communicate and work collectively. Small and large group improvisations will allow students to develop and share their identity through voice, body, intellect, and imagination. Small and large group improvisations will allow students to develop their and share their identity through voice, body, intellect, and imagination. Students will develop the ability to process and communicate information in the moment through both short and long form improvisations. Students will learn the core fundamentals and principles of improvisation, focusing on various activities that encourage trust, interaction, agreement, and active listening.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

### **Visual Arts**

The high school visual art program offers students the opportunity to work with a variety of media, including but not exclusive to painting, drawing, ceramics, sculpture, photography, and mixed media. Advanced coursework is offered for students wishing to deepen their level of skill in specific fields, and students may pursue advanced placement coursework in drawing, two-dimensional design, and three-dimensional design.

The prerequisite for ALL Visual Arts courses, except Photography, is the successful completion of Art and Design (6100) with a grade of 70% of higher. This prerequisite may be waived if a student has successfully completed a middle school art class with a grade of 80% or higher, or has the recommendation of their art teacher.

#### 6100 Art and Design

The student acquires a basic knowledge of various art media and the skills necessary to work with these media. The various elements of drawing, painting, sculpture, and ceramics are stressed. The student works with all the basic media in the visual arts and becomes acquainted with the procedures and functions of art in a classroom environment.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 6110 Drawing and Painting

Students draw and paint with the following media: pencil, oil pastel, charcoal, pen and ink, watercolor, ink wash, oil, tempera, and acrylic. The focus is upon landscapes, figures, and still-life conceptualizations.

CREDIT: 1 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** Successful completion of Art and Design (6100) with a grade of 70% or higher or recommendation of the previous teacher.

### 6120 Advanced Drawing and Painting

Through intense practice both in class and at home, students refine perceptual and technical skills developed in Drawing and Painting (6110). Through frequent class critiques, students become more familiar with the visual language of drawing and painting.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Drawing and Painting (6110) with a grade of 70% or higher.

#### 6130 Sculpture

This course focuses on the production of representational and non-representational sculpture in several of the following media: clay, plaster, wood, papier-mâché, wire, and wax.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Successful completion of Art and Design (6100) or recommendation of the previous

teacher.

#### 6135 Advanced Sculpture

This course focuses on mastering the production of realistic and representational sculpture forms in several of the following media: clay, plaster, wood, papier mache, wire, and wax. Through intense practice with these mediums, students refine perceptual and technical skills developed in Sculpture (6130). Students also become more familiar with the language of sculpture through frequent class critiques and assessments.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Sculpture I (6130) with a grade of 70% or higher.

#### 6140 Ceramics

Students learn techniques for clay preparation, hand-building, throwing, glazing, and kiln firing.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Successful completion of Art and Design (6100) or recommendation of the previous

teacher.

#### 6150 Advanced Ceramics

This course provides more advanced study for students with a particular interest in three-dimensional art. Additional wheel experience is offered and emphasis is placed upon a variety of glazing techniques.

CREDIT: 1 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** Successful completion of Ceramics I (6140) with a 70% or higher.

### 6180 Photography Black and White & Digital

This course provides an understanding of the camera and its operations, film developing, projection printing, lighting, photographic composition. Students will receive instruction on the use of a regular 35mm SLR camera and the development of black and white film as well as the use of a 35mm DSLR digital camera, scanner, computer images and software, and printers. Owning a 35mm SLR or DSLR camera is not necessary, but very helpful. Much work will be done outside the classroom, where the skills and techniques learned in the course will be applied. Students are responsible for fees to cover the cost of consumable supplies and materials that will not exceed \$20 and may need a jump drive or other media storage for class.

CREDIT: 1 TYPE: Academic GRADE: 10-12

### 6190 Advanced Photography Black and White and Digital

This course provides an in-depth study of black-and-white photography, as well as expand upon the student's previous knowledge of the digital camera, computer, software and output devices by creating projects which include studio lighting for portrait and still life, photo-journalism, and creative darkroom techniques. The skills and techniques learned in this course are applied, to a significant extent, outside the photography classroom. Students are responsible for fees to cover the cost of consumable supplies and materials that will not exceed \$20 and may need jump drive or other media storage for class.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Successful completion of Photography (6180) with a grade of 70% or higher.

#### 6200 Studio Art

This course is offered for the exceptionally talented student who would like to do intensive work in a particular art discipline. In this course, guidance will be offered to help prepare the student to enter a crafts school, fine arts school, or the fine arts department of a university. A portfolio may be prepared for the College Board's Advanced Placement Studio Art evaluation. Students may be required to pay a fee or purchase materials depending upon their area of interest.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Recommendation of an art instructor.

# 6209 Advanced Placement Studio - Drawing

This course is designed to address a very broad interpretation of drawing. This might include drawing, painting, printmaking, and mixed media, as well as abstract and observational works. This course addresses the following learning outcomes: the ability to (1) conduct a sustained investigation through practice, experimentation, and revision, guided by questions; (2) skillfully synthesize materials, processes, and ideas; and (3) articulate, in writing, information about one's work. Portfolios presented to the College Board include the following: Selected Works (40% of total score); 5 physical works or high quality printed reproductions of physical works that each demonstrate the synthesis of materials, process, and ideas using drawing skills. Sustained Investigation (60% of total score): 15 digital images of works of art and process documentation that demonstrate sustained investigation through practice, experimentation, and revision. Students will be expected to provide their own supplies and materials. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if their portfolios meet entrance standards, and if they attend one of the many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12

**PREREQUISITE:** Art and Design (6100) and Drawing and Painting (6110) or Advanced Drawing and Painting (6120). Students must submit a preliminary art portfolio for approval by the AP art instructor. This portfolio will serve as a basis for the AP portfolio and must be approved for both quality and quantity to assure that the AP portfolio requirements can be completed in 1 year of AP study.

#### 6219 Advanced Placement Studio - Two Dimensional Design

Students will be asked to demonstrate proficiency in two-dimensional design using a variety of art forms. These could include, but are not limited to, graphic design, typography, digital imaging, photography, collage, fabric design, weaving, illustration, painting, and printmaking. This course addresses the following learning outcomes: the ability to (1) conduct a sustained investigation through practice, experimentation, and revision, guided by questions; (2) skillfully synthesize materials, processes, and ideas; and (3) articulate, in writing, information about one's work. Portfolios presented to the College Board include the following: Selected Works (40% of total score); 5 physical works or high quality printed reproductions of physical works that each demonstrate the synthesis of materials, process, and ideas using drawing skills. Sustained Investigation (60% of total score): 15 digital images of works of art and process documentation that demonstrate sustained investigation through practice, experimentation, and revision. Students will be expected to provide their own supplies and materials. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if their portfolios meet entrance standards, and if they attend one of the many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

**CREDIT:** 1 **TYPE:** Advanced Placement **GRADE:** 11-12

**PREREQUISITE:** Art and Design (6100) and Drawing and Painting (6110) or Advanced Drawing and Painting (6120). Students must submit a preliminary art portfolio for approval by the AP art instructor. This portfolio will serve as a basis for the AP portfolio and must be approved for both quality and quantity to assure that the AP portfolio requirements can be completed in 1 year of AP study.

#### 6229 Advanced Placement Studio - Three Dimensional Design

This course is designed to address a very broad interpretation of three-dimensional design and sculptural issues in depth and space. These might include traditional sculpture, architectural models, apparel, ceramics, three-dimensional fiber arts or metal work, among others. This course addresses the following learning outcomes: the ability to (1) conduct a sustained investigation through practice, experimentation, and revision, guided by questions; (2) skillfully synthesize materials, processes, and ideas; and (3) articulate, in writing, information about one's work. Portfolios presented to the College Board include the following: Students will be expected to provide their own supplies and materials. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if their portfolios meet entrance standards,

and if they attend one of the many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12

**PREREQUISITE:** Art and Design (6100) and Ceramics I (6140) or Sculpture (6130). Students must submit a preliminary art portfolio for approval by the AP art instructor. This portfolio will serve as a basis for the AP portfolio and must be approved for both quality and quantity to assure that the AP portfolio requirements can be completed in 1 year of AP study.

### 6239 Advanced Placement – Art History

The Advanced Placement Art History course welcomes students into the global art world as active participants, engaging with its forms and content as they research, discuss, read, and write about art, artists, art making, and responses to and interpretations of art. The study of art history invites students to discover the diversity in and connections among forms of artistic expression throughout history and from around the globe. The course framework includes two essential components: Art Historical Thinking Skills and Course Content. Art Historical Thinking Skills are central to the study and practice of art history. These skills will help students learn to think and act like art historians. Course Content is organized into commonly taught units of study that provide a suggested sequence for the course, and detail required content and conceptual understandings that college and universities typically expect students to master to qualify for credit and/or placement. This content is grounded in big ideas, which are crosscutting concepts that building conceptual understanding and spiral throughout the course. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if their portfolios meet entrance standards, and if they attend one of the many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 9-12

# **Mathematics**

To graduate, a student must earn four credits in high school mathematics including one credit in algebra and one credit in geometry. Because of the demands of an increasingly technological society, it is required that every student study mathematics each year of high school.

Students are strongly encouraged to select courses from the advanced program upon attainment of the prerequisite skills; a comprehensive four-year plan of studies should include provisions for this goal. The selection of the appropriate mathematics program for each student should be based on: (a) individual needs, (b) ability, and (c) attainment of the necessary prerequisites for the desired course. Students seeking to qualify for admission to Maryland colleges and universities should have credits in Algebra 1, Geometry, Algebra 2 and one Math elective.

Math courses taken during the student's senior year in high school should be reflective of student's post-high school goals and student's past degree of rigor.

# 3122S Academic Algebra 1 Lab

This is an additional period of Algebra support designed for Academic Algebra 1 students that would benefit from additional previewing, scaffolding, examples, and explorations within the content. The student will receive the algebraic concepts credit required for graduation as well as 0.5 math elective credit. Topics covered include linear, quadratic, polynomial, and exponential functions, equations, inequalities and systems, as well as modeling with statistics and other mathematics. This course is designed to prepare students for the Algebra I MCAP Assessment. Students may repeat this course one time for credit, taking the course twice throughout the year as a year-long rather than semester of support.

CREDIT: 0.5 TYPE: Academic GRADE: 9 (0.5 unit of math)

#### 3125 Academic Algebra 1

This course is the foundation for all higher mathematics courses. Any student planning to enroll in either a college or a post-secondary technical program should elect this course. Topics covered include linear, quadratic, polynomial, and exponential functions, equations, inequalities and systems, as well as modeling with statistics and other mathematics. This course is designed to prepare students for the Algebra I MCAP Assessment.

CREDIT: 1 TYPE: Academic GRADE: 9 NCAA

### 3135 Academic Algebra 2

This course is a continuation of the development of concepts and problem-solving methods begun in Academic Algebra 1 and continued in Academic Geometry. Advanced algebraic operations, techniques for problem-solving, and the practical application of mathematical theory are stressed. Any student planning to enroll in either a college or a post-secondary technical program should elect this course. Topics covered include arithmetic and geometric sequences, and quadratic, polynomial, rational, radical, exponential, logarithmic, and trigonometric relations, equations and functions.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

**PREREQUISITE:** Academic Algebra 1 (3125/3725) or Comprehensive Algebra (3123/3723), and Geometry (3204). Concurrent enrollment in Geometry (3204) and Academic Algebra 2 (3135) is permitted with teacher recommendation.

#### 3137 Honors Algebra 2

Topics covered include arithmetic and geometric sequences, and quadratic, polynomial, rational, radical, exponential, logarithmic, and trigonometric relations, equations and functions. An emphasis is placed on applying algebra to logarithmic and trigonometric situations. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended. This course may be taken concurrently with Honors Geometry.

CREDIT: 1 TYPE: Honors GRADE: 9-12 NCAA

**PREREQUISITE:** –Geometry (3204) or Honors Geometry (3207). Concurrent enrollment in Geometry (3204) and Academic Algebra 2 (3135) is permitted with teacher recommendation.

#### 3204 Geometry

This course is structured to emphasize basic knowledge of plane geometry and its properties, correct terminology, definitions, and proofs, formalizing geometry learned in middle grades. Significant work is done in this course to apply and extend understandings of algebraic reasoning and manipulations in order to prepare students for college and career readiness. Topics that are studied include angles, lines, triangles, quadrilaterals, and circles; congruence, similarity, and transformation; right triangle relationships and trigonometry; and two- and three-dimensional modeling. This course may be taken concurrently with Algebra 2.

CREDIT: 1 TYPE: Academic GRADE: 10 NCAA

**PREREQUISITE:** Successful completion of Academic Algebra 1 (3125/3725) or Comprehensive Algebra (3123/3723).

# 3207 Honors Geometry

This course provides for the development of mathematical systems through an axiomatic approach using inductive and deductive reasoning. Significant work is done in this course to apply and extend understandings of algebraic reasoning and manipulations in order to prepare students for college and career readiness. Topics that are studied include angles, lines, triangles, quadrilaterals, and circles; congruence, similarity, and transformation; right triangle relationships and trigonometry, extending to the unit circle; and two- and three-dimensional modeling. This course is designed to develop a basic understanding of axiomatic theory proof, formalizing geometry learned in middle grades. course may be taken concurrently with Honors Algebra 2.

CREDIT: 1 TYPE: Honors GRADE: 9-10 NCAA

**PREREQUISITE:** Completion of Algebra 1 (3125) with a grade of 90% or higher and teacher recommendation.

#### 3301 Accelerated Algebra II/Pre-Calculus

This honors level course differs from the standard and honors Algebra 2 courses in that it contains content from Pre-Calculus, and is designed to prepare students to go directly into AP Calculus 1. The additional content, when compared to the standard course, demands a much faster pace for instruction and learning. Because the demands of this course are very high, students should alternatively consider taking Honors Geometry and Honors Algebra 2 concurrently, followed by Honors Pre-Calculus when designing four-year plans, in order to have an increased amount of time and depth with the standards of the courses. Topics covered include quadratic, polynomial, rational, exponential, and logarithmic functions, equations, and relationships, as well as statistics, trigonometry, and modeling. Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland in a section of a parallel course. Students who choose this option will earn college credits for successful completion of this course.

CREDIT: 1 TYPE: Honors GRADE: 10-11 NCAA

**PREREQUISITE:** Student must pass Algebra 1 with a 90% or higher, have Algebra 1 MCAP score of 760 or higher, and successfully pass Honors Geometry (3207).

#### 3304 Advanced Mathematics

This course is designed to develop a better understanding of mathematics that are not always included in traditional core pathways. Topics include data manipulation, analysis, and communication; information visualization; logic and interpretation of statistics; advanced probability and counting techniques; and mathematical modeling. A capstone requires students to apply learning to applications such as finance, business, and marketing; environmental impact, medical and behavioral sciences, and coding,

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

PREREQUISITE: Successful completion of or concurrent enrollment in Academic Algebra 2 (3135).

# 3305 Academic Pre-Calculus with Trigonometry

This course is designed to develop a better understanding of mathematical systems. Topics studied include exponential and logarithmic functions, complex numbers, trigonometric identities and formulas, circular functions and their inverses, and polynomial functions. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended. Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland in a section of a parallel course. Students who choose this option will earn college credits for successful completion of this course.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of both Academic Algebra 2 (3135) and Geometry (3204). Concurrent enrollment in Academic Pre-Calculus with Trigonometry (3305) and Math Analysis (3430) is permitted with teacher recommendations. In this case, placement in Honors Pre-Calculus with Trigonometry (3307) should be considered as an alternate placement.

#### 3307 Honors Pre-Calculus with Trigonometry

This course provides a strong foundation in precalculus concepts, techniques, and applications to prepare students for more advanced studies in mathematics. Topics studied include exponential, logarithmic, polynomial, and trigonometric functions and their inverses, algebra and geometry, circular functions, complex numbers, and linear systems. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator. TI-84+ CE is recommended. Students who enroll in this course will be given the opportunity to register for dual enrollment with the College of Southern Maryland in a section of a parallel course. Students who choose this option will earn college credits for successful completion of this course.

CREDIT: 1 TYPE: Honors GRADE: 10-12 NCAA

**PREREQUISITE:** Successful completion of Honors Algebra 2 (3137) and Honors Geometry (3207) with a grade of 80% or higher or teacher recommendations.

#### 3409/3409o Advanced Placement Calculus 1

This course is being offered in a face-to-face or online environment.

Concurrent enrollment in Math Analysis (3430) is permitted for twelfth-grade students who have attained a grade of 80% or higher in Academic Pre-Calculus with Trigonometry (3305). Topics studied include techniques of differentiation and integration of algebraic and trigonometric functions as well as their applications. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

Use course number 3409o if you wish to take this course online.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of Honors Precalculus with Trigonometry (3307) with a grade of 80% or higher or successful completion of Academic Pre-Calculus with Trigonometry (3305) and Math Analysis (3430) with a grade of 80% or higher and or recommendation of the most recent departmental instructor.

#### 3419 Advanced Placement Calculus 2

Topics studied include limits, continuity, differentiation, integration (advanced techniques), sequences, and series. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an advanced placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of Advanced Placement Calculus 1 (3409)

### 3420 Statistics

This course is designed to introduce students to the major concepts and tools for collecting, analyzing, and drawing conclusions from data. Topics studied include exploring data, planning a study, anticipating patterns, and an introduction to using statistical inference. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

PREREQUISITE: Successful completion of or concurrent enrollment in Academic Algebra 2 (3135).

#### 3429/3429o Advanced Placement Statistics

This course is being offered in a face-to-face or online environment.

This course is designed to introduce students to the major concepts and tools for collecting, analyzing, and drawing conclusions from data. Topics studied include exploring data, planning a study, anticipating patterns, and using statistical inference. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

Use course number 34290 if you wish to take this course online.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Successful completion of Honors Geometry (3207) and Honors Algebra 2 (3137) with a grade of 80% or higher, or successful completion of Academic Pre-Calculus (3305) with a grade of 80% or higher.

#### 3430 Math Analysis

This course serves as a higher math elective. Topics to be studied include: set theory, algebra of vectors, fields, sequences and series, functions, complex numbers, polynomial functions, exponential and logarithmic functions, probability and limits. Students are required to have a graphing calculator that meets or exceeds the capabilities of a TI-84+ graphing calculator; TI-84+ CE is recommended.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of Academic Pre-Calculus (3305) or Honors Pre-Calculus (3307) with a grade of 80% or higher. Concurrent enrollment in Academic Pre-Calculus with Trigonometry (3305) and Math Analysis (3430) is permitted with teacher recommendations. In this case, placement in Honors Pre-Calculus with Trigonometry (3307) should be considered as an alternate placement.

#### **3439 Calculus 3**

This course is a continuation of Advanced Placement Calculus 2 and is an introduction to multivariable calculus. Topics include vectors and the geometry of space, vector-valued functions, multivariable functions and their geometry, partial differentiation, multiple integration in rectangular, cylindrical and spherical coordinates and vector analysis that includes Green, Stokes and the Divergence Theorems.

The rigor and delivery of instruction for this course will mirror that of a community college course, and textbooks will be those used at the College of Southern Maryland. Students who successfully complete the first semester of this course, as determined by class performance and College of Southern Maryland requirements, will be given the opportunity in the second semester to register for dual enrollment with the College of Southern Maryland for their version of a parallel course. Students who choose this option will earn CSM college credits for successful completion of the second semester course.

CREDIT: 1 TYPE: Honors GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of Advanced Placement Calculus 2 (3419)

# Naval Science/NJROTC

The NJROTC program is available to students as a Career & Technical Education (CTE) graduation pathway. To meet CTE pathway graduation requirements, students must successfully complete Naval Science I, Naval Science II, and Naval Science III in order to be designated as CTE completers through NJROTC. Students who are able are encouraged to take Naval Science IV as a further benefit to future career possibilities.

Satisfactory completion of the program gives students the life and career skills to significantly contribute to success in careers in government, private industry entrepreneurship and non-profit organizations. It can also lead to advanced placement credit in the Senior ROTC program at an accredited college or university, or advanced rank in the armed forces.

Established by the Congress of the United States in 1964, the Naval Junior Reserve Officers' Training Corps (NJROTC) Program teaches self-discipline, self-confidence, and leadership skills. The main objectives of this program are to promote patriotism, develop informed and responsible citizens, promote habits of orderliness and precision, develop respect for constituted authority, and develop a high degree of personal honor, individual discipline, and self- reliance.

The program includes classroom study in the areas listed in the course descriptions. In addition, physical fitness, personal appearance and good grooming habits, respectful conduct, and leadership training are stressed. Those who enroll in naval science courses join a unit and agree to wear the Navy uniform one full day a week and to comply with the standards of academic performance and personal conduct required of NJROTC cadets. All textbooks, regular uniforms, and training equipment are provided by the Navy at no cost to the student.

Cadets interested in competing for admission to the U.S. Naval Academy, U.S. Military Academy (West Point) or the U.S. Air Force Academy are required to obtain a nomination. NJROTC is a nominating source and cadets are eligible to compete for a nomination from their NJROTC unit. Units also provide significant assistance in competing for four-year college ROTC scholarships.

The student who elects to take naval science incurs no military obligation. However, successful completion of three years or more of naval science allows entry into the armed forces at up to two pay grades higher than other enlistees.

To broaden each cadet's horizons, frequent field trips are made to visit various military bases, ships, and other government installations of interest. Cruises and visits aboard Navy ships provide practical, hands-on training experiences.

Extracurricular activities include interscholastic competition at the local, regional, and national levels in academics, marksmanship, orienteering, drill team, and color guard. Selected cadets may attend special advanced training or educational opportunities.

Some NJROTC units offer cadets the opportunity to compete in an Air Force Cyber Defense competition called CyberPatriot, a national Cyber Education program created to inspire K-12 students toward careers in cybersecurity or other science, technology, engineering, and mathematics disciplines critical to our nation's future.

To enroll in any NJROTC unit, a student must be of good moral character and physically fit. He or she must agree to accept and maintain the high standards of behavior and personal appearance required of cadets.

#### 7210 Naval Science I

Students are introduced to both the NJROTC program and the study of naval science. Emphasis is placed on personal development and career planning; leadership skills; naval orientation; citizenship and

# Course Descriptions - Naval Science

American government; wellness; fitness, and first aid; geography and survival skills; and teamwork development. Opportunities are available to participate in community service, marksmanship, orienteering, drill, and athletics. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 7220 Naval Science II

Advanced leadership skills are practiced. Maritime History; Maritime Geography as it relates to national resources, landforms, climate, soil, bodies of water, people, governments, and military; Current Events, Naval History, Naval Operations; and Intelligence and National Security are studied. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training. This course is the second of three courses required to complete the NJROTC CTE program.

CREDIT: 1 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Naval Science I (7210).

#### 7230 Naval Science III

Cadets practice advanced leadership skills and management techniques in the daily operation of the NJROTC unit, including the planning for and conducting of unit functions. Major areas of study include sea power and national security, naval intelligence, naval operations, military and international law, ship design and organization, and maritime navigation. Opportunities are available to participate in community service, marksmanship, orienteering, drill, and athletics. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training. This is the third required course to complete the NJROTC CTE program.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Successful completion of Naval Science II (7220).

#### 7240 Naval Science IV

Advanced leadership and ethics development accomplished through seminar discussions. Cadets practice advanced leadership skills and management techniques in the daily operation of the NJROTC unit including the planning for and conducting of unit functions and activities. Opportunities are available to participate in community service, marksmanship, orienteering, drill, and athletics. Students are required and agree to wear the Navy uniform one full day a week. Students are also required to dress out and participate in physical fitness training. Students enrolled in the NJROTC CTE pathway are encouraged to continue beyond the required third course into Naval Science IV. However, completion of this course is not required within the CTE pathway.

CREDIT: 1 TYPE: Academic GRADE: 12

PREREQUISITE: Successful completion of Naval Science III (7230).

# Physical Education/Health and Wellness

The Physical Education program at the high school level provides a format for the greater development of personal health, fitness, and wellness. Students are challenged to increase their personal well-being by choosing a PE course that best fits their needs, interests, and abilities. Each of the following courses embeds the standards of the Maryland State Curriculum and National Standards for Physical Education. Therefore, students may select from any of the following activity-based courses to complete the mandatory ½ credit graduation requirement for Physical Education: Unified Physical Education, Team Sports, Lifetime Activities, Weight Training and Physical Conditioning I, and Fitness Fusion. Students wishing to take additional Physical Education classes may choose to take a level two course, Sport Education: Basketball, or the Movement, Mindfulness, and Mental Health course for elective credit.

Students are required to have appropriate physical education attire to participate in all activity courses.

### 7008S Unified Physical Education

This course combines students of all abilities to participate in developmentally appropriate activities including lifetime activities, physical fitness, and sport. Students work together to increase competence and confidence in a variety of motor skills and movement patterns. Through ongoing leadership opportunities, members of this course will be empowered to help and create a more inclusive and accepting school environment for all students. This course meets the graduation requirement for physical education.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 7010S/7010So Health I

This course is being offered in a face-to-face or online environment.

Health I fulfills the first 0.5 credit of the State of Maryland's graduation requirement for health. This course is designed for students to learn and demonstrate health skills necessary to promote personal, family, and community well-being. Through health skills, including analyzing influences, accessing valid information, communicating effectively, decision-making, goal setting, and managing personal wellness, students acquire functional knowledge about the following core health concepts: mental and emotional health; personal wellness; alcohol, tobacco, and other drugs; family life and human sexuality\*; disease prevention; and safety and injury prevention. Practicing health-related skills in authentic situations, developing health-enhancing behaviors, and reducing the risk of injury, illness, disease, or premature death are the ultimate goals of the course.

\*Parents are encouraged to communicate with the health educator and school to review the family life and human sexuality portion of the course to determine if the family wishes to opt-out of portions of the curriculum.

Successful completion of Health I is a prerequisite for Health II which is the second 0.5 credit required for graduation, beginning with students who entered ninth-grade in the 2021-2022 school year and beyond. Health I is developmentally appropriate for students in grades 9-10.

The Health I course is offered online by using course 7010So for registration. Students registered for online health have required face to face meetings, that may take place in-person or virtually, occurring after school or on Saturdays. There are six scheduled classes throughout the semester, and students are required to attend at least four.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 7115S Health II

Health II is an extension of learning and skill-development from Health I. It is an MSDE graduation requirement allowing students to participate in developmentally appropriate health-related learning activities to reinforce essential skills, attitudes, and behaviors to empower students to live happy, healthy,

# Course Descriptions - Physical Education/Health and Wellness

productive lives. Students engage in a variety of learning opportunities requiring inquiry and problem-solving skills specific to health content and scenarios, emphasizing lifelong positive health-related attitudes and behaviors that promote self-reliance, management, and regulation. Health II expands student perspective from self to community to gain a better understanding of public health issues related to mental and emotional health, nutrition, environmental health, safety and injury prevention, substance abuse, family life and human sexuality\*, and disease prevention and control.

\*Parents are encouraged to communicate with the health educator and school to review the family life and human sexuality portion of the course to determine if the family wishes to opt-out of portions of the curriculum.

Successful completion of Health I is a prerequisite for this course. This 0.5 credit course is required for graduation and is developmentally appropriate for students in grades 11-12. A full credit of health I and Health II) is required for students who entered ninth grade in the 2021-2022 school year and beyond.

Credit: 0.5 Type: Academic Grade: 11-12 PREREQUISITE: Health I (7010S/7010So)

# 7020S Team Sports

Team sports is a sport-based physical activity class designed around competitive team sports such as flag football, soccer, basketball, floor hockey, broomball, volleyball, handball, and speedball. Students will learn about cardiovascular fitness, muscular endurance, skill-related fitness components, tactical concepts of sports, and sportsmanship. Students interested in improving cardiovascular fitness by participating in active sports and competitive play on a daily basis should register for the team sports class. This course meets the graduation requirement for physical education.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

# 7025S Team Sports II

The Team Sports II class focuses on similar motor skills and movement patterns of the level I class with an emphasis on more advanced cognitive topics related to fitness principles, motor movement, physical health, personal and social responsibility, nutrition, and technology. The purpose of the level II course is to build upon the psychomotor, cognitive, and affective domains of physical education to help students understand and value physical activity, exercise, and movement.. This course may be repeated for credit.

**CREDIT:** 0.5 **TYPE:** Academic **GRADE:** 9-12 **PREREQUISITE:** Level one of any PE course

### 7041S Lifetime Activities

The Lifetime Activities course exposes students to a variety of physical activities that can be done alone, with a partner, or in a small group. The activities taught in this class allow students to improve health, happiness, and skill development in a variety of movement opportunities designed to be safe and enjoyable for all people, ages, abilities, and interest levels. Students will learn the physical and mental health benefits of movement while developing competency in a variety of motor skills necessary for leisure sports and activities. Physical activities include bowling, disc golf, pickleball, softball, ultimate, badminton, and more. This course meets the graduation requirement for physical education.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 7046S Lifetime Activities II

The Lifetime Activities II class focuses on similar motor skills and movement patterns of the level I class with an emphasis on more advanced cognitive topics related to fitness principles, motor movement, physical health, personal and social responsibility, nutrition, and technology. The purpose of the level II course is to build upon the psychomotor, cognitive, and affective domains of physical education to help students understand and value physical activity, exercise, and movement. This course may be repeated for credit.

# Course Descriptions - Physical Education/Health and Wellness

**CREDIT**: 0.5 **TYPE**: Academic **GRADE**: 9-12 **PREREQUISITE**: Level one of any PE course

# 7050S Weight Training and Physical Conditioning I

Weight training is a muscular strength-based class designed to improve muscular strength and power through exercises done in a weight room. In this class, students will learn about the benefits of muscular strength and endurance, the major muscle groups of the body, the principle of overload, and proper nutrition. There are ample opportunities to increase strength, flexibility, speed, and power in this course. Students interested in working out in a weight room facility on a daily basis should register for the weight training class. This course meets the graduation requirement for physical education.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

# 7060S Weight Training and Physical Conditioning II

The Weight Training II class focuses on similar motor skills and movement patterns of the level I class with an emphasis on more advanced cognitive topics related to fitness principles, motor movement, physical health, personal and social responsibility, nutrition, and technology. The purpose of the level II course is to build upon the psychomotor, cognitive, and affective domains of physical education to help students understand and value physical activity, exercise, and movement. This course may be repeated for credit.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

PREREQUISITE: Successful completion of Weight Training I

#### 7085S Fitness Fusion

This course is designed to improve health-related fitness components including cardio-respiratory endurance, muscular strength and endurance, and flexibility. The course focuses on content such as aerobic vs. anaerobic conditioning, target heart rate zone, the skeletal system, the FITT principle, proper training concepts such as progression and overload, and the physical and mental benefits to exercise, physical activity, and fitness. Students can expect to be engaged in activities that improve heart and lung capacity, overall strength and muscular endurance, joint flexibility and mobility, and mindfulness. Students will experience benefits to physical health; stress and self-management techniques; boosts in energy, confidence, and body image; and personalized goal setting and fitness planning. This course meets the graduation requirement for physical education.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 7086S Fitness Fusion II

This course is designed to improve health-related fitness components including cardio-respiratory endurance, muscular strength and endurance, and flexibility. The content covered in the level 2 course focuses on the skills necessary to adopt a healthy and active lifestyle for college or career. The content includes the relationship between nutrition, physical activity, and body composition; analyzing and applying technology as a tool for supporting healthy, active lifestyles; designing and implementing a strength and conditioning program; developing and maintaining a personalized fitness portfolio; and identifying and overcoming barriers to exercise and fitness. Students can expect to be engaged in activities that improve heart and lung capacity, overall strength and muscular endurance, joint flexibility and mobility, and mindfulness. Students will experience benefits to physical health; stress and self-management techniques; boosts in energy, confidence, and body image; and personalized goal setting and fitness planning. This course may be repeated for credit.

**CREDIT:** 0.5 **TYPE:** Academic **GRADE:** 9-12 **PREREQUISITE:** Level one of any PE course

#### 7100S Basic Athletic Training I

Students enrolled in the course will have a basic understanding of sports medicine and athletic training. The curriculum includes information about facilitating an athletic training room, emergency preparedness, pre and post season conditioning, nutrition and athletes, sports psychology, and assessment and evaluation of sports injuries. The course also requires demonstrations of skills related to injury evaluation

# Course Descriptions - Physical Education/Health and Wellness

as well as prevention and treatment of athletic injuries. Students are required to obtain 10-15 observation hours beyond the school day as assigned by the instructor.

This course **does not** meet the graduation requirements for PE.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Physical Education graduation requirement.

# 7110S Basic Athletic Training II

Students enrolled in the course will continue their basic understanding of sports medicine and athletic training. The curriculum includes information about injury assessment and management with a focus on kinesiology, basic first aid knowledge and skills, and injury prevention. The course has a strong emphasis on anatomy and physiology to assist the student in understanding and identifying various structures and functions of the body. Students are required to obtain 10-15 observation hours beyond the school day as assigned by the instructor.

This course **does not** meet the graduation requirements for PE.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

PREREQUISITE: Successful completion of Basic Athletic Training I

# **Preparatory Courses**

# 1010S College Entrance Exams Preparation

This course is designed for college-bound students who would like intensive preparation for college entrance exams such as the SAT or ACT. Other components of this course include reading, writing, critical thinking and problem solving skills. Students will learn skills for filling out college applications and other requirements such as writing essays, etc. Students who enroll in this course are required to purchase a consumable textbook.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

**PREREQUISITE:** Completion of or concurrent enrollment in Geometry.

#### 1025S Seminar for Advanced Studies

Seminar for Advanced Studies is designed to teach and reinforce various skills and strategies associated with college-level and Advanced Placement courses. Students will develop skills related to writing, reading comprehension, critical-thinking, note-taking, studying, organization, and time management. In addition, students will develop academic and personal goals to help ensure long-term success in their college or career setting. This course may be repeated one time for credit.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

**PREREQUISITE:** None

# 1040S Honors Writing for Advanced Courses and College

This course emphasizes preparation for college-level, Advanced Placement, and honors-level academic writing. The material covered in this class will help students who are planning on attending college and/or taking high-level courses in high school to gain confidence when undertaking writing assignments in any of their academic courses. Students will learn how to think critically about the ideas and language of others, as well as how to articulate their own responses in writing. Students will learn the basic structures of academic writing and will learn how to vary/expand that structure to fit most all academic writing assignments. Students will also learn how to the language used to convey their ideas will appropriately change as they develop a thesis, articulate support for ideas, and express these ideas through the process of drafting, work-shopping, revising, and editing responses to higher-order questions and prompts.

**CREDIT:** 0.5 **TYPE:** Honors **GRADE:** 9-12

**PREREQUISITE**: Successful completion of most recent English and social studies courses with a grade average of 70% or better and teacher recommendation.

# 1050S Strategies for Self Determination

This course provides the opportunity for students to obtain the skills needed to independently manage self-determination and interpersonal skills that are not explicitly taught in the course of a school day. The course will address units of study in the areas of understanding self-determination, being self-aware, developing interpersonal skills, communicating effectively with others, decision making, developing social awareness, and self-advocacy. The majority of instruction will be provided in a classroom based setting and students will be provided the opportunity to apply skills learned in a community setting, as opportunities arise.

**CREDIT:** 0.5 **TYPE:** Academic **GRADE:** 9-12

#### 1055S Strategies for Daily Living

This course provides the opportunity for students to obtain the skills needed to independently manage activities of daily living that are not explicitly taught in the course of a school day. The skills addressed include: managing basic personal finances; selecting and managing a household; caring for personal needs; buying, preparing, and consuming food; utilizing recreational facilities and engaging in leisure activities; and choosing and accessing transportation. The majority of instruction will be provided in a

# Course Descriptions - Preparatory Courses

classroom based setting and students will be provided the opportunity to apply skills learned in a community setting, as opportunities arise.

CREDIT: 0.5 TYPE: Academic GRADE: 9-12

#### 1060 Social Skills

This course is specifically designed for students who require explicit instruction in social emotional, interpersonal, and social communication skills. The main topics which will be addressed include emotional self-management, awareness of self and others, interpersonal skills, emotional self-care, and social awareness.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 1101S Freshman Seminar

Freshman Seminar is a course designed to promote a successful transition between middle school and high school. The course provides students with opportunities for academic enrichment and assistance, as well as the chance to improve organizational and communication skills. In addition, part of the course is dedicated to a discussion of college and career choices. This is a pass/fail course which is not calculated into a student's grade point average. This course may be repeated one time for credit.

CREDIT: 0.5 TYPE: Academic GRADE: 9

### 2590S Honors Introduction to Philosophical Thought

This course provides students with an introduction to some of the major problems, methods and insights of philosophy with readings from both classical and contemporary sources. This course will also examine the ideas of philosophers who have been most influential in the history of analytical thought. Students will begin to recognize the enduring nature of some of the world's most pressing problems, as well as the intellectual foundation of proposed solutions. Additionally, students will examine many of the problems of social and political philosophy through an analysis, comparison and critical examination of various views concerning the nature of individuality and society and the relationship between the two.

CREDIT: 0.5 TYPE: Honors GRADE: 9-12

**PREREQUISITE:** Successful completion of most recent English and social studies courses with a grade average of 70% or better or teacher recommendation.

# **Science**

Three science credits earned after a student leaves grade 8 are required for high school graduation. Students seeking attendance in the University of Maryland College system must complete 3 credits of laboratory-approved science courses. All courses offered in the science program have laboratory experiences as an integral component and meet the University of Maryland admission standard. The Next Generation Science Standards (NGSS) state that students should select a balance of courses with life, physical, and earth science topics. Course selection should be based upon future and immediate needs of students and information provided in the course descriptions. After receiving instruction in Biology, students will take the Life Science Maryland Integrated Science Assessment (LS MISA) which is required for graduation. The science program includes:

#### 4104 Earth Science

Earth Science is the study of Earth and its atmosphere. In this course, students will develop an understanding of three core ideas: Earth's Place in the Universe; Earth's Systems; Earth and Human Activity. This course focuses on the dynamic forces which shape Earth. Students study and observe the geologic, meteorologic, astronomic, and oceanic processes that have shaped Earth and make it unique in its solar system, and the universe.

CREDIT: 1 TYPE: Academic GRADE: 11,12 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) and Matter and Energy (4606) or Chemistry (4307)

#### 4107 Honors Earth Science

Earth Science is the study of Earth and its atmosphere. In this course, students will develop an understanding of three core ideas: Earth's Place in the Universe; Earth's Systems; Earth and Human Activity. This course focuses on the dynamic forces which shape Earth. Students complete an in-depth study of the geologic, meteorologic, astronomic, and oceanic processes that have shaped Earth and make it unique in its solar system. Current issues related to society and earth science are explored.

CREDIT: 1 TYPE: Honors GRADE: 11,12 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) and Matter and Energy (4606) or Chemistry (4307) Accelerated PhysChem (4408) with an average science grade of 80% or higher.

#### 4204 Biology

Biology is the study of living organisms, including their structure, functioning, evolution, distribution, and interrelationships. In this course, students will develop an understanding of four core ideas: From Molecules to Organisms, Ecosystems, Heredity, and Biological Evolution. Students will study the following topics: biochemistry, cells and cell processes, genetics, evolution, ecology, and current issues of biology. Laboratory work is an integral part of this course. Biology counts as a Life Science course. A student final course grade will be comprised of the student's four marking period grades, which will comprise 80% of the grade and the 20% derived from the Life Science Maryland Integrated Science Assessment (LS MISA). To meet the Maryland graduation requirement for this course, a student must receive a passing grade once their course and MCAP grades are calculated together.

CREDIT: 1 TYPE: Academic GRADE: 9,10 NCAA

#### 4207 Honors Biology

Biology is the study of living organisms, including their structure, functioning, evolution, distribution, and interrelationships. In this course, students will develop an understanding of four core ideas: From Molecules to Organisms, Ecosystems, Heredity, and Biological Evolution. Students will study the following topics: biochemistry, cells and cell processes, genetics, evolution, ecology, and current issues of biology. Laboratory work is an integral part of this course. A student final course grade will be comprised of the student's four marking period grades, which will comprise 80% of the grade and the 20% derived from the Life Science Maryland Integrated Science Assessment (LS MISA). To meet the Maryland graduation requirement for this course, a student must receive a passing grade once their course and MCAP grades are calculated together.

# Course Descriptions - Science

CREDIT: 1 TYPE: Honors GRADE: 9,10 NCAA

PREREQUISITE: Recommended completion of Accelerated 8/Algebra I or Algebra I and an average

science grade of 80% or higher or teacher recommendation.

# 4209 Advanced Placement Biology

The two main goals of AP Biology are to help students develop a conceptual framework for modern biology and an appreciation of science as a process. Primary emphasis in an AP Biology course will be on developing an understanding of concepts rather than on memorizing terms and technical details. Topics covered include cells, heredity, evolution, organisms and populations. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

PREREQUISITE: Completion of Honors Chemistry (4307) with an 80% or higher or Accelerated

PhysChem (4408) with a 75% or higher.

COREQUISITES: If you take this course, you must also take Biology Laboratory (4210)

# 4210 Biology Laboratory

Students will conduct laboratory experiments in the areas of biological chemistry, physiology, and ecology. Unlike Advanced Placement Biology (4209), this course shall be weighted according to the traditional high school grading scale. Together with Advanced Placement Biology (4209) this course constitutes one (1) laboratory science course. It may not be counted as a separate laboratory science course. It does not fulfill one of the three Maryland State Board of Education high school graduation requirements in science. However, students who complete this course successfully earn one elective credit in science which will fulfill the additional required credit to promote rigor.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**COREQUISITES:** If you take this course, you must also take Advanced Placement Biology (4209)

#### 4307 Honors Chemistry

Chemistry is the branch of physical science that studies the composition, structure, properties, and change of matters. Topics in this class will include matter, bonding, gas laws, stoichiometry, solutions, reactivity, and descriptive chemistry. Extensive laboratory work is an essential component of this class. Students will develop an understanding of four core ideas: Matter and Its Interactions, Motion and Stability, Forces and Interactions, Energy, and Waves.

CREDIT: 1 TYPE: Honors GRADE: 10-12 NCAA

**PREREQUISITE:** Completion of Academic Algebra I (3125) with a grade of 80% or higher and completion of Biology (4204 or 4207) with a 80% of higher.

# 4309 Advanced Placement Chemistry

This course includes the following topics: structure of matter, reactions, thermodynamics, kinetics, equilibrium, and descriptive chemistry. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

PREREQUISITE: Completion of Chemistry (4307) with a grade of 80% or higher or Accelerated

PhysChem (4408) with a grade of 75% or higher and completion of Algebra II.

COREQUISITES: If you take this course, you must also take Chemistry Laboratory (4310)

# 4310 Chemistry Laboratory

Investigations will be based on experimental procedures. A well-organized collection of laboratory reports will be required. In laboratory work, students will use sophisticated equipment. Students will conduct laboratory experiments in the areas of electro-chemistry, organic chemistry, and physical chemistry. Unlike Advanced Placement Chemistry (4309), this course shall be weighted according to the traditional high school grading scale. Together with Advanced Placement Chemistry (4309), this course constitutes one (1) laboratory science course. It may not be counted as a separate laboratory science course. It does not fulfill one of the three Maryland State Board of Education high school graduation requirements in science. However, students who complete this course successfully earn one elective credit in science which will fulfill the additional required credit to promote rigor.

CREDIT: 1 TYPE: Academic GRADE: 11-12

COREQUISITE: Concurrent enrollment in in Advanced Placement Chemistry (4309)

### 4407 Honors Physics

Physics is the branch of physical science that involves the study of matter and energy and their interactions. In this class, the student will first review pertinent mathematical skills and scientific measurement. Other units will focus on mechanics, heat, waves and sound, electricity and magnetism, light, atomics, and nucleonics. Laboratory exercises are based upon principles studied. Students will develop an understanding of four ideas: Matter and Its interactions, Motion and Stability, Forces and Interactions, Energy, and Waves.

CREDIT: 1 TYPE: Honors GRADE: 10-12 NCAA

**PREREQUISITE:** Completion of Geometry (3204 or 3207) with 70%, completion of Chemistry with an 80% or higher and concurrent enrollment in Algebra 2.

### 4408 Accelerated PhysChem

This is an accelerated chemistry and physics course designed to prepare students to enroll in AP Science courses. The structure, pacing, and student accountability of the course will mirror that of an AP science course. Students will spend one semester studying the chemistry topics of the atom, bonding, reactivity, gas laws, and solutions. The other semester will be used to investigate the physics principles of kinematics, dynamics, electrodynamics, electromagnetism, light and waves. Students will develop an understanding of four ideas: Matter and Its interactions, Motion and Stability, Forces and Interactions, Energy, and Waves.

CREDIT: 1 TYPE: Honors GRADE: 10-11 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) with a grade of 80% or higher and completion of Geometry (3207) with a 70% or higher.

#### 4419 AP Physics C: Mechanics

Students are given opportunities to develop such skills as: reading and understanding scientific and technical information; describing and explaining phenomena through the use of idealized models and the application of relevant principles; and using advanced mathematical reasoning in physics situations. Students will conduct laboratory experiments in the areas of mechanics, Newton's Laws, and kinematics. These concepts will be analyzed using mathematical applications up to and including Calculus. Taught at the college level, this course affords students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

**PREREQUISITE:** Completion of Honors Physics (4407), AP Physics 1 (4439), or Accelerated PhysChem (4408) and completion or concurrent enrollment in AP Calculus 1 (3409).

#### 4429 AP Physics C: Electricity & Magnetism

Students are given opportunities to develop such skills as: reading and understanding scientific information; describing and explaining phenomena through the use of idealized models and the

# Course Descriptions - Science

application of relevant principles and definitions; and using basic mathematical reasoning in physics situations. Students will conduct laboratory experiments in the areas of electricity, magnetism, and electrostatics. These concepts will be analyzed using mathematical applications up to and including Calculus. Taught at the college level, this course affords students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete and Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

**PREREQUISITE:** Completion of Honors Physics (4407), AP Physics 1 (4439), or Accelerated PhysChem (4408) and completion or concurrent enrollment in AP Calculus 1 (3409).

# 4439 AP Physics 1

This is a rigorous, college-level course in which the following topics are examined: Newtonian mechanics (including rotational dynamics and angular momentum); work, energy and power; and mechanical waves and sound with an introduction to simple electric circuits. Laboratory work is an integral part of this course. Taught at the college level, this course affords students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive weighted credit.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) with a grade of 80% or higher and completion of Geometry (3204, 3207) with at 80% or higher, and concurrent enrollment in Algebra II.

# 4449 AP Physics 2

AP Physics 2 is an algebra-based, introductory college-level physics course that explores topics such as fluid statics and dynamics; thermodynamics with kinetic theory; PV diagrams and probability; electrostatics; electrical circuits with capacitors; magnetic fields; electromagnetism; physical and geometric optics; and quantum, atomic, and nuclear physics. Through inquiry-based learning, students will develop scientific critical thinking and reasoning skills. Taught at the college level, this course affords students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive weighted credit.

**CREDIT:** 1 TYPE: Advanced Placement **GRADE:** 11-12 **NCAA PREREQUISITE:** Completion AP Physics 1 (4439) and Algebra 2.

### 4507 Honors Environmental Science

This course explores the science of the environment with emphasis on ecology, human interactions and impacts, and sustainability. This course examines the interdependence of biotic and abiotic factors in the environment, nutrient and energy recycling within the ecosystem, the management of biological and physical resources, and current issues related to society and the environment. Laboratory work and field experience constitute an integral part of this course.

CREDIT: 1 TYPE: Honors GRADE: 11-12 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) and Matter and Energy, or Chemistry, or Accelerated PhysChem with an average science grade of 80% or higher.

# 4509 Advanced Placement Environmental Science

This is a rigorous, college-level course in which the following topics are examined: ecosystems, human populations, pollution, human health, renewable and nonrenewable resources, environmental quality, global issues and environmental decision-making. Taught at the college level, this course affords advanced students an opportunity to earn, in addition to high school credit, college credit and/or

# Course Descriptions - Science

appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade. \*\*Successful completion of Earth Science is desirable, but not required.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11,12 NCAA

**PREREQUISITE:** Completion of Biology (4204 or 4207) and Chemistry (4307) with a grade of 80% or higher or Accelerated PhysChem (4408) with a grade of 75% or higher.

**COREQUISITES:** If you take this course, you must also take Environmental Science Laboratory (4510)

#### 4510 Environmental Science Laboratory

Students will conduct laboratory experiments in the areas of plate tectonics, soils, populations, energy, pollution, and waste management. Students must be able to conduct both guided and independent scientific investigations. Unlike Advanced Placement Environmental Science (4509), this course shall be weighted according to the traditional high school grading scale. However, students who complete this course successfully earn one elective credit in science which will fulfill the additional required credit to promote rigor.

CREDIT: 1 TYPE: Academic GRADE: 11-12

**COREQUISITES:** If you take this course, you must also take Advanced Placement Environmental

Science (4509)

# 4604 Matter and Energy

Matter and Energy will focus on the fundamentals of Physics and Chemistry. In this course, students will develop an understanding of four core ideas: Matter and Its Interactions, Motion and Stability, Energy, and Wave Properties. The Physics portion of the class will focus on introductory physics concepts including mechanics (forces and motion), energy, electricity, and magnetism. The Chemistry portion of the class will focus on introductory chemistry, topics including structure and properties of atoms, elements, mixtures and compounds, chemical reactions, periodic table, atomic and nuclear structure. Science and engineering practices and crosscutting concepts will be stressed throughout the class.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA PREREQUISITE: Completion of Biology (4204 or 4207)

# **Social Studies**

#### 2104 Modern World History

Students study the development of modern institutions and social organization to understand the contemporary world. Instruction is focused on the contributions of various cultures and the events and ideas that have shaped the nations and political systems of the modern world. The course emphasis is on world history, from the Age of Exploration to the present.

CREDIT: 1 TYPE: Academic GRADE: 11 NCAA

#### 2107 Honors Modern World History

Students study the development of modern institutions and social organization to understand the contemporary world. Instruction is focused on the contributions of various cultures and the events and ideas that have shaped the nations and political systems of the modern world. The course emphasis is on world history, from the Age of Exploration to the present. Students conduct both group and individual research. An extended research project culminating in a research paper or History Fair project will be assigned. Advanced writing opportunities will be provided.

CREDIT: 1 TYPE: Honors GRADE: 11 NCAA

### 2509 Advanced Placement World History

This course provides students with the analytic skills and factual knowledge necessary to analyze the problems and concepts of World History. Students learn to evaluate historical materials, determine their relevance to a given interpretive problem and judge their importance. Presenting college level material, this course offers students the opportunity to earn, both high school and college credit if they earn a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. A summer reading assignment and/or project may be assigned. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Attainment of a grade of 70% or higher average in all prior required Social Studies courses or the recommendation of the most recent departmental instructor.

#### 2204 United States History

The principle focus of this course is the period 1890 to the present. Students will learn to think critically about the economic, political, social, and diplomatic history of the United States. Students will be engaged in research and writing activities.

CREDIT: 1 TYPE: Academic GRADE: 9 NCAA

#### 2207 Honors United States History

The principle focus of this course is the period 1890 to the present. Students will learn to think critically about the economic, political, social, and diplomatic history of the United States. An extended research project culminating in a research paper or History Fair project will be assigned. Advanced writing opportunities will be provided.

CREDIT: 1 TYPE: Honors GRADE: 9 NCAA

### 2209 Advanced Placement United States History

This course provides students with the analytic skills and factual knowledge necessary to analyze the problems and issues of American History. Students evaluate historical materials, determine their relevance and judge their reliability. Presenting college level material, this course offers students an opportunity to earn both high school and college credit if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Summer reading and/or projects may be assigned. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 9-12 NCAA

**PREREQUISITE:** Students must earn a grade of 80% or higher in their 8<sup>th</sup> grade Social Studies courses or most recent social studies course and the recommendation of the most recent departmental instructor. Rising 9<sup>th</sup> grade students interested in taking Advanced Placement United States History, must meet the following requirements to qualify to take the course:

- Complete the <u>9th Grade AP United States History Interest Form.</u>
- Attend an information session presented by an AP United States History Teacher or the Supervisor of Social Studies explaining the rigor of an Advance Placement course. This presentation will occur at the student's middle school.
- Provide student's and parent's signatures acknowledging the rigor and requirements of the AP United States History course.

#### 2304 American Government

In this course, constitutional government, democratic principles, political behavior, and citizens' rights and responsibilities in a democracy are studied as they pertain to national, state, and local governments. The impact of social, economic, international, and political issues on contemporary society are also examined. A student final course grade will be comprised of the student's four marking period grades, which will comprise 80% of the grade and the 20% derived from the Maryland Comprehensive Assessment Program (MCAP) Government Assessment. To meet the Maryland graduation requirement for this course, a student must receive a passing grade once their course and MCAP grades are calculated together.

CREDIT: 1 TYPE: Academic GRADE: 10 NCAA

#### 2307 Honors American Government

Constitutional government, democratic principles, politics, and political behavior are studied in this course as they pertain to the local, state, and federal levels of government. There is an examination of the impact of major economic, social, and environmental problems. Instruction emphasizes the use of primary sources. An extended research project will be assigned. A student final course grade will be comprised of the student's four marking period grades, which will comprise 80% of the grade and the 20% derived from the Maryland Comprehensive Assessment Program (MCAP) Government Assessment. To meet the Maryland graduation requirement for this course, a student must receive a passing grade once their course and MCAP grades are calculated together.

CREDIT: 1 TYPE: Honors GRADE: 11 NCAA

#### 2309 Advanced Placement United States Government and Politics

This course will give students the opportunity to analyze government and politics in the United States. This course involves both the study of general concepts used to interpret U.S. politics and the analysis of specific case studies. It also requires familiarity with the various institutions, groups, beliefs, and ideas that constitute U.S. political reality. Topics to be covered include: Constitutional Underpinnings of U.S. Government, Political Beliefs and Behaviors, Political Parties and Interest Groups, Institutions of the National Government, Public Policy, and Civil Rights and Civil Liberties. Students will be expected to learn facts and concepts and understand typical political processes. Furthermore, students are guided to use specific information to critically evaluate general propositions about government and politics, as well as to present basic data relevant to government and politics in sustained written arguments. A summer reading assignment and/or project may be assigned. Presenting college level material, this course affords advanced students an opportunity to earn both high school and college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade. A student final course grade will be comprised of the student's four marking period grades, which will comprise 80% of the grade and the 20% derived from the Maryland Comprehensive Assessment Program (MCAP) Government Assessment. To meet the Maryland graduation requirement for this course, a student must receive a passing grade once their course and MCAP grades are calculated together.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Attainment of a grade of 70% or higher average in all prior required Social Studies courses or the recommendation of the most recent departmental instructor.

#### 2519 Advanced Placement European History

This course is designed to provide students with the analytic skills and factual knowledge necessary to analyze the problems and concepts of European History. Students are expected to demonstrate a basic knowledge of the chronology of major events and trends from approximately 1450 to 1970, that is, from the High Renaissance to the recent past. Presenting college material, this course offers students an opportunity to earn both high school and college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. A summer reading assignment and/or project will be assigned. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Attainment of a grade of 70% or higher average in all prior required Social Studies courses or the recommendation of the most recent departmental instructor.

#### 2520 ICONS Global Studies

Students will participate in the International Communications and Negotiations Simulation program. Developed by the University of Maryland and supported by Maryland Initiatives in International Education, ICONS is a worldwide, computer assisted simulation that thrusts students into the world of high-level international negotiations. Students debate and negotiate issues such as global warming, biodiversity, communicable diseases, human rights, international trade, nuclear arms control, and conventional arms control. When students are not engaged in the ICONS simulation, they will follow a course of study in Global Issues which requires them to research and think critically about the issues which face the world.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

#### 2521 Advanced Placement Human Geography

AP Human Geography is equivalent to an introductory college-level course in human geography. The course introduces students to the systematic study of patterns and processes that have shaped human understanding, use, and alteration of Earth's surface. Students employ spatial concepts and landscape analysis to examine socioeconomic organization and its environmental consequences. They also learn about the methods and tools geographers use in their research and applications. The curriculum reflects the goals of the National Geography Standards. This course offers students an opportunity to earn both high school and college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. A summer reading assignment and/or project will be assigned. Students who complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 10-12 NCAA

**PREREQUISITE:** Attainment of a grade of 70% or higher average in all prior required Social Studies courses or the recommendation of the most recent departmental instructor.

#### 2530S African American Studies

This course explores the causes, character, and consequences of the African American experience and its influence on the African American community, the United States, and the world. Beginning with a historical, geographical, social, political, economic, and cultural understanding of the African continent, the course provides an overview that introduces students to the African American experience.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12 NCAA

#### 2540 Psychology

This course explores individual and group behaviors in terms of psychological principles and concepts. Experiments are conducted to help illustrate these principles. Important historical developments in

psychology as well as the most recent psychological theories are examined. Students are provided with the opportunity to understand the elements of hypothesis evaluation in this social science through research projects which will include surveys, data collections, interpretations, and explanations based on psychological principles and concepts.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

#### 2549/2549o Advanced Placement Psychology

This course is offered in a face-to-face or online environment.

This course introduces students to the systematic and scientific study of behavior and mental processes of human beings and other animals. Students are exposed to the psychological facts, principles, and phenomena associated with each of the major subfields within psychology, as well as methods, statistical approaches psychologists use in their science and practice. The aim in this course is to provide the student with a learning experience equivalent to that obtained in most college introductory-level psychology courses. Independent research projects and presentations are expected. This course offers students an opportunity to earn both high school and college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. A summer reading assignment and/or project will be assigned. Students who successfully complete an Advanced Placement course shall receive a weighted grade. Use course number 25490 if you wish to take this course online.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

**PREREQUISITE:** Attainment of a grade of 70% or higher average in all prior required Social Studies courses or the recommendation of the most recent departmental instructor.

#### 2550 Sociology

This course explores society, social processes, and social reforms and their effects on individuals and groups. Selected sociological principles are illustrated through case studies from life situations. A unit on social psychology includes topics such as group behavior, pressure to conform, and hidden influences.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

#### 2560S Cultural Anthropology

This course is an introduction to cultural anthropology. It is recommended for students who are interested in studying the development and interaction of different cultures. Students will study a variety of societies to learn the many ways men and women live and work in their environments. Cultural Anthropology is considered a complementary course with Archaeology.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12 NCAA

#### 2565S Archeology

This course is an introduction to the field of archaeology and physical anthropology. It is recommended for students who are interested in methods of archaeological excavation, theories of human development and historical study. Archaeology is considered a complementary course with Anthropology.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12 NCAA

#### 2580S/2580 Women's History

This course provides an in-depth study of the impact of women on the history of the United States and the world. Students will analyze the growth of women's rights and the development of a more co-equal status with men. This course may be repeated for credit. Use 2580 if you wish to take this course for a full year/credit.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12 NCAA

#### 2585S Sports and Society

This course will examine the influence of sport on our contemporary global society. Exploring issues of race, class, education, coaching, gender, and the overall impact of the multi-billion dollar industry sport has become. Students will explore how these aspects of society have been affected by sport, from a

global scale to the community level. The course will draw on the fields of sociology, psychology, and history. Resources will include quest speakers, video, articles, and texts.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

#### 2595S History of the North American Indian

This course will focus on North American Indian cultures as they existed before European contact and the manor is which they were impacted by European settlement and, in turn, impacted those who migrated from Europe. The course will provide a general overview of North American Indian history, culture, philosophy, religion, music, art, literature, tribal governance, and sovereignty. Students will examine relations between Indians and European settlers and their descendants, including historical and contemporary issues that affect Native peoples today.

CREDIT: 0.5 TYPE: Academic GRADE: 10-12

#### 2700 Community Service —Independent Study

This course affords students the opportunity to earn one (1) elective credit each year of high school by participating in a community service program after school hours. Between July 1 and June 30, all course requirements must be fulfilled. Students must spend a minimum of 132 clock hours participating in a community service. Each participant is required to keep a journal about his or her community service experiences. The journal will be reviewed periodically. \*Students who complete this program successfully may earn one general education elective credit, but this course may not be used to fulfill one of the graduation credit requirements in social studies. In addition, this course does not replace any of the classes that are to be scheduled during regular school hours.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 2710S Service Learning Independent Study

Students completing this independent study course will earn (1) general elective credit by completing a service-learning activity or project during the school day. All projects/activities will be scored on a pass/fail basis and must have the prior approval of the service learning coordinator for that school before implementation. Successful completion of this course fulfills the service-learning requirement for graduation. This course may be repeated one time for credit.

CREDIT: 0.5 TYPE: Academic GRADE: 11-12

#### 5179 AP Microeconomics

AP Microeconomics gives students a thorough understanding of the principles of economics, placing particular emphasis on the study of national income and price-level determination. Students will develop familiarity with economic performance measures, the financial sector, stabilization policies, economic growth, and international economics. Specific topics to be explored are basic economical concepts, nature and functions of product markets, factor markets, market failure and role of the government. This course offers students an opportunity to earn both high school and college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of the many colleges or universities that recognize students' participation in the College Board's Advanced Placement Program. A summer reading assignment and/or project will be assigned. Students who successfully complete an Advanced Placement course shall receive a weighted grade.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

# **Technology Education**

#### 8000/80000 Foundations of Technology

This course is being offered in a face-to-face or online environment.

This course prepares students to understand and apply technological concepts and processes to authentic situations. Students study the nature and technological issues of the "designed world". Group and individual activities engage students in creating ideas, developing innovations, and engineering practical solutions. Technology content, resources, and on-line activities allow students to apply science, mathematics, and engineering practices throughout the year.

Use course number 8000o if you wish to take this course online.

CREDIT: 1 TYPE: Academic GRADE: 9-12

#### 8005 Introduction to Engineering Design

This foundation course emphasizes the development of a design. Students use computer software to produce, analyze and evaluate models of projects solutions. They study the design concepts of form and function, then use state-of-the-art technology to translate conceptual design into reproducible products.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Successful completion of or concurrent enrollment in Algebra I.

#### 8010 Core Technologies & The Design World

This course focuses on engineering design and development. In this course, students will demonstrate knowledge of skills related to the core technologies (biotechnology, electrical, electronics, fluids, materials, mechanical, optical, structural and thermal) which are the building blocks of the design world by studying their functions and applying them in common technology systems. In addition, students will demonstrate knowledge of the major enterprises that produce the goods and services which include medical, agricultural, biotechnology, energy and power and information and communication. Students who successfully complete this course earn one (1) advanced technology education credit.

**CREDIT:** 1 **TYPE:** Academic **GRADE:** 10-12 **PREREQUISITE:** Foundations of Technology (8000).

#### 8020 Technology Design and Development

In this course students will demonstrate knowledge and process of engineering design and development through research and development, invention and innovation, problem solving and using and maintaining technological product systems. Students who successfully complete this course earn one (1) advanced technology education credit.

CREDIT: 1 TYPE: Academic GRADE: 11-12

PREREQUISITE: Core Technologies & The Design World (8010).

# World Language and ESOL

All students are encouraged to select one or more world languages in the course of their educational studies. Students seeking admission to Maryland colleges and universities must complete a minimum of two credits of the same world language. Ninth grade students who have completed one or more credits of world language in middle school should enroll in the next sequential course of their chosen world language.

#### **French**

#### 1710 French I

This course serves as the foundation for the development of a student's proficiency in the language. Emphasis is given both to developing the basic language skills of listening, speaking, reading, and writing, and to introducing a student to the culture and daily living practices of the native speakers of the language.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### 1720 French II

Students improve their language proficiency through the functional use of language in authentic situations in this course. Listening, speaking, reading, and writing skills are stressed. Vocabulary is gained, in part, through assigned readings.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

PREREQUISITE: Successful completion of French I (1710) with a grade of 70% or higher.

#### 1730 French III

Language skills are expanded to include a variety of structures in this course. Literary forms are examined. Contemporary topics based on Francophile societies are studied to develop oral proficiency and cultural awareness.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

PREREQUISITE: Successful completion of French II (872) or (1720) with a grade of 70% or higher.

#### 1740 French IV

This course emphasizes the effective use of oral and written language to meet survival and social demands. Diverse literary forms are examined. Selections depicting culture and civilization are studied.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

PREREQUISITE: Successful completion of French III (1730) with a grade of 70% or higher.

#### 1750 Advanced French

This advanced-level course emphasizes continued language development together with more intensive study of culture, civilization, and literature.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of French IV (1740) with a grade of 70% or higher.

#### 1759 Advanced Placement French Language and Culture

Designed for students with exceptional ability in French, this course includes aural/oral skills, reading comprehension, grammar, and composition. Taught at the college level, this course affords advanced eleventh or twelfth-grade students an opportunity to earn, in addition to high school credit, college credit and/or appropriate placement at the college level if they attain a specific score on a national standardized examination, and if they attend one of many colleges or universities which recognize students' participation in the College Board's Advanced Placement Program. Students who complete an Advanced Placement course shall receive a weighted grade.

# Course Descriptions – World Language and ESOL

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of French IV (1740) with a grade of 80% or higher or the

instructor's recommendation.

#### German

#### 1610 German I

This course serves as the foundation for the development of a student's proficiency in the language. Emphasis is given both to developing the basic language skills of listening, speaking, reading, and writing, and to introducing a student to the culture and daily living practices of the native speakers of the language.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### 1620 German II

In this course, students improve their language proficiency through the functional use of language in authentic situations. Listening, speaking, reading, and writing skills are stressed. Vocabulary is gained, in part, through assigned readings.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

PREREQUISITE: Successful completion of German I (1610) with a grade of 70% or higher.

#### 1630 German III

In German III, language skills are expanded to include a variety of structures. Literary forms are examined. Contemporary topics based on Germanic societies are studied to develop oral proficiency and cultural awareness.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of German II (1620) with a grade of 70% or higher.

#### 1640 German IV

This course emphasizes the effective use of oral and written language to meet survival and social demands. Diverse literary forms are examined. Selections depicting culture and civilization are studied.

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

PREREQUISITE: Successful completion of German III (1630) with a grade of 70% or higher.

#### Latin

#### 1910 Latin

This course is an elective, designed to introduce students to foundational Latin, which provides a better awareness of the English Language. The basics of Latin grammar are taught, and a basic working vocabulary is developed. Course objectives include the following: to translate elementary Latin; to recognize English derivatives; to understand English grammar better; to appreciate the development and structure of language in general; and to appreciate Roman culture.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### Russian

#### 1990 Russian I

Russian is being offered face to face at Huntingtown High School. Based upon enrollment, it may be offered virtually or concurrently in other high schools. Students would need to complete two years of Russian study to complete the world language requirement toward a college prep completer program for graduation. This course serves as the foundation for the development of a student's proficiency in Russian. Emphasis is given to developing the basic language skills of listening, speaking, reading, and

# Course Descriptions – World Language and ESOL

writing, and to introducing a student to the culture and daily living practices of the native speakers of the language.

CREDIT: 1 TYPE: Academic GRADE 9-12 NCAA

#### 1995 Russian II

Russian II is being offered face to face at Huntingtown High School. Based upon enrollment, it may be offered virtually or concurrently in other high schools. In this course, students improve their language proficiency through the functional use of language in authentic situations. Listening, speaking, reading, and writing skills are stressed. Vocabulary is gained, in part, through assigned readings.

CREDIT: 1 TYPE: Academic Grades 10-12 NCAA

#### **Spanish**

#### 1810 Spanish I

This course serves as the foundation for the development of a student's proficiency in the language. Emphasis is given both to developing the basic language skills of listening, speaking, reading, and writing, and to introducing a student to the culture and daily living practices of the native speakers of the language.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### 1820 Spanish II

In Spanish II, students improve their language proficiency through the functional use of language in authentic situations. Listening, speaking, reading, and writing skills are stressed. Vocabulary is gained, in part, through assigned readings.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

**PREREQUISITE:** Successful completion of Spanish I (1810) with a grade of 70% or higher.

#### 1830 Spanish III

In this course, language skills are expanded to include a variety of structures. Literary forms are examined. Contemporary topics based on Hispanic societies are studied to develop oral proficiency and cultural awareness.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

PREREQUISITE: Successful completion of Spanish II (873) or (1820) with a grade of 70% or higher.

#### 1840 Spanish IV

Emphasis is on the effective use of oral and written language to meet survival and social demands in Spanish IV. Diverse literary forms are examined. Selections depicting culture and civilization are studied.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

PREREQUISITE: Successful completion of Spanish III (1830) with a grade of 70% or higher.

#### 1850 Advanced Spanish

This advanced-level course emphasizes continued language development together with more intensive study of culture, civilization, and literature.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

PREREQUISITE: Successful completion of Spanish IV (1840) with a grade of 70% or higher.

#### 1859 Advanced Placement Spanish Language and Culture

This course will follow the same guidelines as AP French (1759) listed above.

CREDIT: 1 TYPE: Advanced Placement GRADE: 11-12 NCAA

**PREREQUISITE:** Successful completion of Spanish IV (1840) with a grade of 80% or higher or the instructor's recommendation.

# Course Descriptions – World Language and ESOL

#### 1600 English to Speakers of Other Languages

This course is designed for students who are bilingual or whose first language is other than American English. Students will gain listening, speaking, reading and writing skills to acquire and improve basic interpersonal communication skills (BICs). In addition, students will receive support with language components necessary in content area coursework: Cognitive Academic Language Proficiency skills (CALPs). Students may earn multiple credits for this course.

CREDIT: 1 TYPE: Academic GRADE: 9-12

PREREQUISITE: Placement into course based on English Language Proficiency Assessment score.

#### American Sign Language

#### 1950 American Sign Language I

American Sign Language (ASL) is the language used by the majority of Deaf Americans. ASL is a visual-spatial language rather than a spoken one. The communication emphasis is on expressive skills (signing) and receptive skills (watching and comprehending) in order to understand and communicate with others. ASL has its own grammar, structure, and specific features that pose a challenge to learn, just like other spoken languages. In this course, students will learn vocabulary and grammatical structures of American Sign Language to conduct basic conversations with fluency, and explore deaf culture in order to gain a sensitivity to the culture of the deaf community. The course will include the origins of the language, the alphabet and finger spelling, and include vocabulary topics such as numbers, greetings, farewells, personal information, classroom objects and school vocabulary, clothing and colors, daily activities, family and friends, and places and locations.

CREDIT: 1 TYPE: Academic GRADE: 9-12 NCAA

#### 1960 American Sign Language II

Students improve their language proficiency through the functional use of language in authentic situations. Expressive and receptive skill fluencies are enhanced through continued study of culture, vocabulary, and grammar. Vocabulary topics include sports and activities, daily routines, foods, household activities, clothing, characteristics and descriptions of people, the natural world and environment, animals, hometown and community, and occupations and fields of study.

CREDIT: 1 TYPE: Academic GRADE: 10-12 NCAA

#### 1970 American Sign Language III

This course is a continuation of ASL II, expanding the emphasis on more complex ASL grammar and sentence structure, vocabulary development, and Deaf culture. ASL III focuses on having students express increasingly complex concepts while showing some spontaneity. Goals for students include comprehending and responding with increasing accuracy, having greater understanding when viewing the language signed at normal rates, conversing easily within limited situations, and demonstrating cultural awareness.

CREDIT: 1 TYPE: Academic GRADE: 11-12 NCAA

#### 1980 American Sign Language IV

This course continues the study of ASL III, where students continue work on developing intermediate communication skills and will concentrate on production skills. Students will develop more precise skills and competencies by using appropriate variations of ASL vocabulary.

CREDIT: 1 TYPE: Academic GRADE: 12 NCAA

# COURSE SEQUENCE CHARTS

# Course Sequence Chart – Social Studies CCPS Course Sequence and Pathways for High School Social Studies

#### **Required Courses for Graduation**

Grade 9	Grade 10	Grade 11
US HISTORY	AMERICAN GOVERNMENT	WORLD HISTORY
Standard	Standard	Standard
Honors	Honors	Honors
AP	AP	AP

#### **Criminal Justice Pathway**

Course 1 (10 <sup>th</sup> Grade)	Course 2 (11 <sup>th</sup> Grade)	Course 3 (11 <sup>th</sup> Grade)	Course 4 (12 <sup>th</sup> Grade)
American Criminal	Juvenile Justice	Criminal Law	Criminal Investigation
Justice System			

#### **Elective Social Studies Courses**

AP Economics	African American Studies	Psychology
AP European History	Cultural Anthropology	Sociology
AP Human Geography	History of the North	Sports and Society
AP Psychology	American Indian	Women's History
Archaeology	ICONS Global Studies	

# Course Sequence Charts

# Course Sequence Chart – Mathematics CALVERT COUNTY PUBLIC SCHOOLS MATHEMATICS SEQUENCE

#### Option 1

School Level	Sequence
Elementary School	• Math Pre-K – 5
Middle School	<ul><li>Math 6</li><li>Math 7</li><li>Math 8</li></ul>
High School	<ul> <li>Algebra 1</li> <li>Geometry (may be taken concurrently with Algebra 2)</li> <li>Algebra 2 (may be taken concurrently with Geometry)</li> <li>Advanced Mathematics, Statistics, or Academic PreCalculus</li> </ul>

#### Option 2

School Level	Sequence
Elementary School	• Math Pre-K – 5
Middle School	<ul> <li>Honors Math 6</li> <li>Accelerated Math 7/8</li> <li>Accelerated Math 8/Algebra 1</li> </ul>
High School	<ul> <li>Honors Geometry (may be taken concurrently with Honors Algebra 2)</li> <li>Honors Algebra 2 (may be taken concurrently with Honors Geometry)</li> <li>Honors PreCalculus</li> <li>AP Statistics, AP Calculus 1, or AP Calculus 2*</li> </ul>

These are the sequences of courses that are experienced by most students. Speak to your school counselor about other course sequences.

<sup>\*</sup>Students can reach Calculus 2 or other advanced options by taking Geometry and Algebra 2 concurrently, or by taking Accelerated Algebra II/Pre-Calculus.

# Course Sequence Chart - Science HIGH SCHOOL SCIENCE PLACEMENT GUIDELINES

Science Graduation Course Requirements:

Three (3) credits, designed to develop scientific literacy with all courses integrating the application of the science and engineering practices, crosscutting concepts, and each containing a laboratory component, including the following:

- One credit in life science aligned to the Maryland Comprehensive Assessment for Life Science; and
- One credit in physical science (including chemistry, physics, or integrated physical science); and
- One credit in earth/space science OR a course with the topics of earth/space science integrated

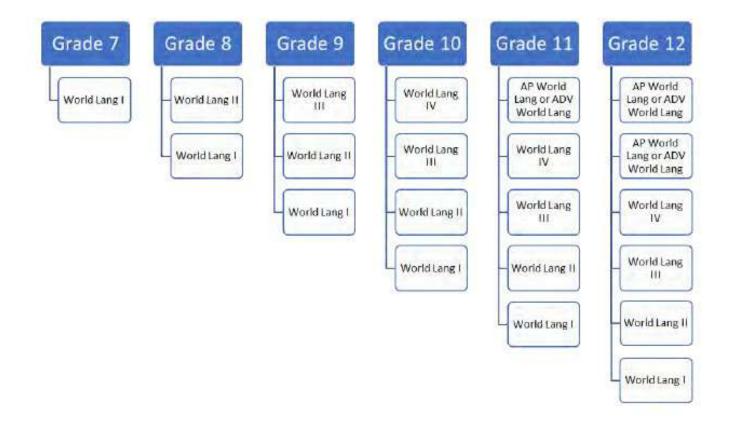
AND take the LS MISA at the completion of Biology

Grade 9	Grade 10	Grade 11 and/or Grade 12
Life Science (Required 9 <sup>th</sup> Grade course) The Life Science Maryland Integrated Science Assessment will be administered at the end of Biology	Physical Science (Student may take any option as long as prerequisites are met)	Earth Science Course OR Courses Integrated with Earth Science topics (Student may take any option as long as prerequisites are met)
4204 - Biology	4307 - Honors Chemistry	4104 – Earth Science
4207 – Honors Biology	4309 – AP Chemistry	4107 - Honors Earth Science
	4407 - Honors Physics	4209 – AP Biology
	4408 - Accelerated PhysChem	4307 - Honors Chemistry
	4419 – AP Physics C: Mechanics	4309 – AP Chemistry
	4429 -AP Physics C: Electricity & Magnetism	4407 - Honors Physics
	4439 – AP Physics 1	4408 - Accelerated PhysChem
	4449 – AP Physics 2	4419 – AP Physics C: Mechanics
	4604 – Matter and Energy	4429 -AP Physics C: Electricity & Magnetism
		4439 – AP Physics 1
		4449 – AP Physics 2
		4507 – Honors Environmental Science
		4509 - AP Environmental Science

# Course Sequence Charts

# **Course Sequence Chart – World Language**

#### CALVERT COUNTY PUBLIC SCHOOLS 7 - 12 WORLD LANGUAGE SEQUENCE



# **FOUR YEAR PLAN**

#### **CALVERT COUNTY PUBLIC SCHOOLS**

#### Class of 2027 FOUR YEAR PLAN

lame: —————			Student Number: ————		— High School: ————		
Last	First				· ·· <b>3</b> ·	· • · · · · · · · · · · · · · · · · · ·	
Course Title Grade 9	Course T	itle	Grade 10	Course Title	Grade 11	Course Title	Grade 12
English 9:	English 10	D:		English 11:		English 12:	
U.S. History	Governm	ient		World History			
Science 1:	Science 2	2:		Science 3:			
Math:	Math:			Math:		Math:	
*Students must be enrolled in	a math class	each year they	attend high s	school.		L	
REQUIRED CREDITS: 24		MCAP, Attenda	ance and Servic	e Learning Requirements			
4 English 4 Mathematics			e expected to mee				
<ul><li>3 Social Studies</li><li>3 Science</li><li>½ Physical Education</li></ul>		Comprehensive Assessment Program requirements for English 10, Life Science, American Government, and Algebra.  Students are expected to meet attendance, service learning and all local school system requirements.			Student Signa	ture	Date
1 Health 1 Fine Art							
1 Technology Education ½ Financial Literacy 2 World Language (must be same language) OR 3 or 4 Credits by completing a state-approved career & technology program 1 Additional credit in area of personal interest 1 - 3 Elective credits			h school pathwa	•	_ Parent Signati	ure	Date
		<ul><li>College Pr</li><li>Career and</li></ul>	·	ication (CTE) Program:	Counselor's S	ignature	Date
		o College Pr	rep and CTE				

## **Index of Courses**

Academic Algebra 1 (3125), 88 App Development (3511), 47, 71 Academic Algebra 1 Lab (3122S), 88 Apprenticeship Maryland Related Technical Instruction (8680), 39 Academic Algebra 2 (3135), 88 Apprenticeship Maryland Wok-based Learning Experience I (8681), Academic Pre-Calculus with Trigonometry (3305), 90 Academy of Health Professions I (8061), 36 Apprenticeship Maryland Work-based Learning Experience II (8682), Academy of Health Professions II Track A (8071), 36 39 Academy of Health Professions II Track B (8072), 37 Apprenticeship Maryland Work-based Learning Experience III (8683), Accelerated Algebra II/Pre-Calculus (3301), 89 40 Accelerated PhysChem (4408), 103 Archeology (2565S), 109 Advanced Accounting (5060), 38 Art and Design (6100), 84 Advanced Accounting (5065), 67 Basic Athletic Training I (7100S), 97 Advanced Acting I (6520), 83 Basic Athletic Training II (7110S), 98 Advanced Acting II (6530), 83 Biology (4204), 101 Advanced Acting III (6540), 83 Biology Laboratory (4210), 102 Advanced Business Management (5160), 42 Biomedical Innovation (8028), 62 Advanced Business Management (5165), 68 Brass Ensembles: Duets, Trios, Quartets and Quintets (6450), 81 Advanced Ceramics (6150), 85 Calculus 3(3439), 91 Advanced Drawing and Painting (6120), 84 Career Exploration and Job Skills: Alternate Standards Framework Advanced French (1750), 112 (0986), 11Advanced Mathematics (3304), 89 Career Research and Development (8650), 43 Advanced Orchestra (6445), 81 Career Research and Development Seminar (8660), 43 Advanced Photography Black and White and Digital (6190), 85 Carpentry I (8271), 44 Advanced Placement - Art History (6239), 87 Carpentry II (8281), 44 Advanced Placement Biology (4209), 102 CCNA and CyberOps Associate (8452), 46 Ceramics (6140), 85 Advanced Placement Calculus 1 (3409/3409o), 90 Advanced Placement Calculus 2 (3419), 90 Chamber Chorus (6340), 79 Chemistry Laboratory (4310), 103 Advanced Placement Chemistry (4309), 102 **Advanced Placement English Language and Composition** Chorale (6310), 79 Chorus I (6320), 79 (1309/1309o), 73 **Advanced Placement English Literature and Composition** Civil Engineering and Architecture (8011), 64 (1409/1409o), 74 Class Piano I (6490S), 82 Advanced Placement Environmental Science (4509), 104 Class Piano II (6495S), 82 Advanced Placement European History (2519), 108 College and Career Ready English 12 (1404), 73 Advanced Placement French Language and Culture (1759), 112 College Entrance Exams Preparation (1010S), 99 Advanced Placement Human Geography (2521), 108 Community Access and Independent Living Skills: Alternate Advanced Placement Music Theory (6309), 79 Standards Framework (0985), 11 Advanced Placement Psychology (2549/2549o), 109 Community Service —Independent Study (2700), 110 Advanced Placement Spanish Language and Culture (1859), 114 Computer Keyboarding for College and Careers (5240S), 69 Advanced Placement Statistics (3429/3429o), 91 Concert Band (6400), 80 Advanced Placement Studio - Drawing (6209), 86 Concert Chorus (6360), 80 Advanced Placement Studio - Three Dimensional Design (6229), 86 Core Technologies & The Design World (8010), 111 Advanced Placement Studio - Two Dimensional Design (6219), 86 Cosmetology I (8360), 48 Advanced Placement United States Government and Politics (2309), Cosmetology II (8371), 48 Creative Writing (1570S), 76 Advanced Placement United States History (2209), 106 Criminal Investigation (2630), 51 Advanced Placement World History (2509), 106 Criminal Law (2620), 50 Advanced Sculpture (6135), 85 Culinary Arts I (8511), 51 Advanced Spanish (1850), 114 Culinary Arts II (8521), 52 Aerospace Engineering (8008), 63 Cultural Anthropology (2560S), 109 African American Studies (2530S), 108 Cultures and Cuisines (6620), 77 Dance I (6000), 78 Agriculture Business, Research, and Development (8038/8039), 53 American Criminal Justice System (2600), 49 Dance II (6010), 78 Digital Electronics (8007), 63 American Government (2304), 107 American Sign Language I (1950), 115 Drawing and Painting (6110), 84 American Sign Language II (1960), 115 Earth Science (4104), 101 American Sign Language III (1970), 115 Education Academy Internship (5530), 65 American Sign Language IV (1980), 115 Electricity I (8411), 54 Animal and Plant Biotechnology (8037), 53 Electricity II (8421), 54 AP Computer Science Coding (3509/3519), 71 Emergency Medical Technician (EMT) (8994), 55 Engineering Design and Development (8009), 64 AP Computer Science Coding (CTE Pathway) (3519/3509), 47 AP Computer Science Principles (3506), 46, 70 English 10 (1204), 72 AP Microeconomics (5179), 110 English 11 (1304), 72 AP Physics 1 (4439), 104 English 9 (1104), 72 AP Physics 2 (4449), 104 English to Speakers of Other Languages (1600), 115 AP Physics C: Electricity & Magnetism (4429), 103 English: Alternate Standards Framework (0981), 10 AP Physics C: Mechanics (4419), 103 Environmental Science Laboratory (4510), 105

## **Index of Courses**

Latin (1910), 113

Financial Literacy: Money Management (5230S/5230So), 68 Lifetime Activities (7041S), 96 Firefighting (8998), 56 Lifetime Activities II(7046S), 96 Fitness Fusion (7085S), 97 Math Analysis (3430), 91 Fitness Fusion II (7086S), 97 Math: Alternate Standards Framework (0983), 10 Foundations of Computer Science (3505, 70 Matter and Energy (4604), 105 Foundations of Curriculum and Instruction (5520), 65 Medical Interventions (8027), 62 Foundations of Technology (8000/80000), 111 Modern World History (2104), 106 Music Appreciation online (6370o), 80 French I (1710), 112 French II (1720), 112 Music Theatre (6350), 80 French III (1730), 112 Music Theory (6300), 79 French IV (1740), 112 Naval Science I (7210), 60, 93 Freshman Seminar (1101S), 100 Naval Science II (7220), 60, 94 Geometry (3204), 89 Naval Science III (7230), 60, 94 German I (1610), 113 Naval Science IV (7240), 94 Nutrition Technology (6610), 77 German II (1620), 113 German III (1630), 113 Office Systems Management (Excel/Access) (5100), 42, 67 German IV (1640), 113 Office Systems Management (Word/PowerPoint) (5030/5035), 41, 67 Graphic Arts I (8611), 57 Percussion Ensembles: Duets, Trios, Quartets, & Quintets (6470), 82 Graphic Arts II (8621), 57 Photography Black and White & Digital (6180), 85 Guitar I (6480S), 82 Principles of Accounting (5050), 38, 41, 42, 67 Guitar II (6485S), 82 Principles of Agricultural Science-Animal (ASA) (8036), 53 Health I (7010S/7010So), 95 Principles of Business Administration and Management (5000), 37, Health II (7115S), 95 41, 42, 67 Heating, Ventilation, Air Conditioning (HVAC) I (8121), 61 Principles of Engineering (8006), 63 Heating, Ventilation, Air Conditioning (HVAC) II (8122), 61 Principles of the Biomedical Sciences (8025), 62 History of the North American Indian (2595S), 110 Psychology (2540), 108 Home Improvement I (8871), 58 Russian I (1990), 113 Home Improvement II (8881), 58 Russian II (1995), 114 Honors Algebra 2 (3137), 88 Science: Alternate Standards Framework (0984), 10 Honors American Government (2307), 107 Sculpture (6130), 84 Honors Biology (4207), 101 Seminar for Advanced Studies (1025S), 99 Honors Chemistry (4307), 102 Service Learning Independent Study (2710S), 110 Honors Composition and Literature (1408), 73 Service Technician I (Brakes, Steering, and Suspension) (8941), 40 Honors Composition and Rhetoric (1406), 73 Service Technician II (8951), 41 Honors Earth Science (4107), 101 Social Skills (1060), 100 Honors English 10 (1207), 72 Social Studies: Alternate Standards Framework (0982), 10 Honors English 11 (1307), 72 Sociology (2550), 109 Honors English 9 (1107), 72 Spanish I (1810), 114 Honors Environmental Science (4507), 104 Spanish II (1820), 114 Honors Geometry (3207), 89 Spanish III (1830), 114 Honors Introduction to Philosophical Thought (2590S), 100 Spanish IV (1840), 114 Sports and Society (2585S), 109 Honors Modern World History (2107), 106 Honors Physics (4407), 103 Stagecraft (6550), 83 Honors Pre-Calculus with Trigonometry (3307), 90 Statistics (3420), 91 Honors United States History (2207), 106 Strategies for Daily Living (1055S), 99 Honors Writing for Advanced Courses and College (1040S), 99 Strategies for Self Determination (1050S), 99 Human Body Systems (8026), 62 String Orchestra (6440), 81 Human Growth and Development Through Adolescence (5500), 64 Studio Art (6200), 85 ICONS Global Studies (2520), 108 Symphonic Band (6410), 80 Improvisational Theatre (6570S), 84 Symphony Orchestra (6475), 82 Interactive Media Production I (8631), 58 Teaching as a Profession (5510), 65 Team Sports (7020S), 96 Interactive Media Production II (8641), 59 Introduction to Agriculture, Food, & Natural Resources (8035), 52 Team Sports II (7025S), 96 Introduction to Engineering Design (8005), 63, 111 Technology Design and Development (8020), 111 Theatre I (6500), 83 Introduction to Film (1590), 76 Introduction to Network Engineering (8441), 45 Theatre II (6510), 83 Jazz Ensemble (6430), 81 Unified Physical Education (7008S), 95 Journalism I (1500), 74 United States History (2204), 106 Journalism II: Broadcasting (1510), 74 Weight Training and Physical Conditioning I (7050S), 97 Journalism II: Newspaper (1520), 74 Weight Training and Physical Conditioning II (7060S), 97 Journalism II: Yearbook (1530), 75 Welding I (8911), 65 Journalism III: Advanced Broadcasting (1540), 75 Welding II (8921), 66 Journalism III: Advanced Newspaper (1550), 75 Wind Ensemble (6420), 80 Journalism III: Advanced Yearbook (1560), 75 Women's History (2580S/2580), 109 Juvenile Justice (2610), 50 Work-Based Learning Experience (8665), 43