

# CLARION AREA JR/SR HIGH SCHOOL

# **2017-18 ACADEMIC GUIDE**

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www.clarion-schools.com

### **GRADUATION REQUIREMENTS**

**Minimum Graduation Requirements** include successful completion in grades 9-12 of the following courses and other listed criteria. Final grades of 69 or higher must be earned in order to gain course credit.

- **A. Science:** 3 full year courses to include biology
- **B.** Math: 3 credits to include topics in algebra
- **C. Math or Science:** 1 additional credit in math or science (Career Center students do not need this additional math or science credit.)
- **D. English:** 4 credits
- E. Social Studies: 4 credits
- **F.** Arts & Humanities: 2 credits in art, music, language, or an English or Social Studies elective
- G. Health: ½ credit senior high health
- **H. Physical Education:** 1 credit to include 4 years of participation
- I. Twenty-four (24) credits: minimum credits required to receive diploma
- **J.** Six (6) course credits plus physical education each year: minimum course load; exceptions may be granted to 5<sup>th</sup> year seniors with approval of principal
- K. High School Project: successful completion as per project guidelines
- L. Completion of the requirements for Keystone Exams set by PA School Code Currently, three exams are in place for the class of 2019 and beyond: Algebra 1, Biology, and Literature.

**Student Schedules** will be distributed at the end of each school year. An appointed time in the summer will be provided for students to make changes. **After this opportunity**, <u>only limited</u> schedule changes will be permitted during a five school day drop/add period.

The ninth grade is considered the beginning of high school. All courses taken in grades 9-12 are recorded by title and performance (grade) on a high school transcript. This document then becomes the official record. Absences and tardies are also included on this permanent record.

Required courses that are failed MUST be made up. Arrangements must be made through the counseling office.

Promotion and Retention: In grades 9-12, promotion shall be based on units of credit which may be earned by successful completion of specific courses. Promotion to grade 10 requires a minimum of four (4) units of credit. Promotion to grade 11 requires a minimum of ten (10) credits. Promotion to grade 12 requires a minimum of sixteen (16) units of credit or the ability to schedule sufficient courses to complete all graduation requirements by the end of the twelfth grade.

Seniors must pass all classes required for graduation in order to participate in graduation ceremonies and activities.

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### **CLARION AREA HIGH SCHOOL PROJECT**

Using both the written and spoken word, students will demonstrate the ability to research, analyze, synthesize, and apply information relevant to their educational and career goals. They will do this through both curricular and self-directed activities.

#### **CURRICULAR REQUIREMENTS**

- CAREER RESEARCH PROJECT (10<sup>th</sup> grade): Based on assessment inventories, journal reflections, and exploration, students will research a career path. They will use a graphic organizer to record and document their findings.
- **RESUME** (11<sup>th</sup> grade): Develop a polished resume detailing strengths and experiences. Students are responsible for keeping this resume up to date for the senior year college and scholarship application process.
- **RECOMMENDATION LETTER (12<sup>th</sup> grade):** Write a letter recommending YOU either for admission to a particular university or for a job.
- **SENIOR CAREER EXPO** (12<sup>th</sup> grade): Create a display table of your career choice for the career fair that the senior class hosts for underclassman.

#### **SELF-DIRECTED ACTIVITIES**

- Participate in two postsecondary planning activities such as meeting with college representatives, military recruiters, business/ trade/tech school representatives, or prospective employers. Students are responsible for obtaining the appropriate affidavit to document attendance.
- **Volunteer for twelve hours** in an <u>approved</u> organization, activity, or project. Students must receive written permission from administration or guidance for any volunteer work that is not on the approved list. *Students are responsible for obtaining the appropriate affidavits to document participation.*
- **Job-shadow** in a field of interest for a minimum of 5 hours. It is the responsibility of the student to arrange this. If the shadowing is done during a school day, an approval form must be submitted to the high school office before the shadowing date. *Students are responsible for obtaining the appropriate affidavit to document participation*.
- Thank You Letter Students are responsible for writing a thank you letter to their job shadow host and must have a copy of this in their portfolio. The letter should be well written and include specifics of the experience.
- **High School Transcript** Students will be responsible for securing and reviewing a copy of their high school transcripts. The transcript includes final grades for all courses taken since 9<sup>th</sup> grade as well as attendance information for each year.

\*\*Students not completing all requirements by the set deadline in the Fall will have 5 additional volunteer hours added.

# GRADING POLICIES CLARION AREA JUNIOR-SENIOR HIGH SCHOOL

## **GRADING SCALE**

A: 93-100 B: 85-92 C: 77-84 D: 69-76 F: 0-68

# P = Pass, F = Fail, M = Medical Excuse, I = Incomplete, WF = Withdrawal Failure

- For the first half of a course, no grade lower than 60 may be given.
- Grades in weighted courses will earn four (4) extra points. Weighted courses are marked with an asterisk (\*).
- Honor Roll will require at least 4 credits with an average of 90 with no failures, no incomplete grades, and no grade lower than 77.
- Principal's list will require at least 4 credits with all A's (grades at or above 93) and no incomplete grades.
- National Honor Society eligibility will require a minimum QPA of 92.
- For a course repeated at CAHS, only the higher grade will be recorded on the transcript.
- Physical Education is not factored into QPA calculations.
- Incomplete grades must be made up no later than two weeks after the end of the nine-week grading period.
- Courses dropped after the 5 day drop/add period will be recorded on the transcript as Withdrawal Failure (WF)

#### YEARLY COURSE LOAD

Current board policy states, students in grades 9-12 will be required to enroll in six credits plus physical education each year. A minimum of 24 credits is required to graduate.

#### EXTRA CREDIT POLICY

No extra credit shall be provided for a student without approval from a building level administrator. Grades in each class should reflect each student's progress toward mastering the standards, anchors, and eligible content. By providing the option of approval from the principal, teachers retain the ability to address unique situations.

#### **FAILED COURSES**

- If a student fails a course and repeats the actual course at Clarion Area, the failing grade will be deleted and a new cumulative grade point average will be recalculated.
- Students in grades 9-12 who fail one of Clarion Area's courses and need the credit to satisfy a graduation requirement can elect to enroll in a Credit Recovery course approved by the district. These abbreviated courses are intended just for that purpose and are limited to two courses per year. Students must earn a minimum of 60% final grade to be eligible for credit recovery.
- If a Credit Recovery course is used, the failed course, which was used to calculate the cumulative grade point average, will remain on the student transcript. The credit recovery course will be listed as such (CR English I) and the score will be recorded as a P/F. Although the earned credit will be recorded to satisfy the number required for graduation, no grade will be calculated into the cumulative grade point average.
- The following guidelines will be used for students in grades 7-8 who need course recovery for promotion to the next grade level. Current policy states that students need to pass 3 of their 4 major subjects English, World Geography, Math, Science for promotion and that a student can only recover 2 courses a year. Students may take credit recovery courses approved by the district.

#### DISTANCE LEARNING

• Courses offered at Clarion Area cannot be replaced by Distance Learning courses.

#### **DUAL ENROLLMENT COURSES**

- Students may take Dual Enrollment Courses at Clarion University to use as elective courses here at Clarion Area. If students intend to use the credit here, they must submit a DUAL ENROLLMENT COMMITMENT FORM prior to the start of the university class.
- Grades will be assigned for Dual Enrollment classes based on the Letter Grade to Numeric conversion provision provided in our current grading policy. The exceptions to this practice would be a letter from the instructor to guidance assigning a higher grade.

- The reporting and calculating of CUP's Dual Enrollment courses will be treated as semester classes at Clarion Area. Because a Dual Enrollment course grade is not available until the second quarter of each semester, guidance will enter the final grade into the second quarter slot of each semester as well as into the final grade slot.
- Once a student commits to including a Dual Enrollment course for Clarion Area credit (by submitting a COMMITMENT FORM to guidance) he/she cannot elect to have it removed. If the student drops the course at CUP, a W for Withdrawal will appear on the Clarion Area transcript.

#### INDEPENDENT STUDIES

• Independent Studies may be an option for special situations and must receive approval from the committee panel.

#### SENIOR YEAR AT CLARION UNIVERSITY

- A student who wishes to complete his/her senior year as a full time student (12 credits/semester) at a college or university should first meet with the principal and guidance counselor. Final approval will come from the superintendent. Guidance will provide the student with a credit check, detailing the courses needed to fulfill Clarion Area's graduation requirements.
- Students who enroll in at least two credits at Clarion Area while completing the balance of the senior year requirements at a college or university may participate in Clarion Area's graduation ceremony.

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# Two distinctions are available to Clarion Area students at commencement. With both of these, the student wears a bright orange sash during the ceremony.

#### HONORS DIPLOMA CRITERIA

In addition to completing the other graduation requirements, an **HONORS DIPLOMA** will be awarded to any student who attains a minimum weighted grade point average of 95, receives no final course grade lower than an 85 and completes the following prescribed courses:

ENGLISH SOCIAL STUDIES

English I U.S. History I English II U.S. History II

AP Language Civics

AP Literature AP Government

Speech

<u>MATHEMATICS</u> <u>SCIENCE</u>

Algebra I Academic Biology

Algebra II Acd Chemistry **or** Acd Earth & Space

Academic Geometry Physics

Pre-Calculus One of the following:

Calculus AP Chemistry

Advanced Biology

Advanced Earth & Space

College Physics

FOREIGN LANGUAGE ARTS AND HUMANITIES

Three-year sequence of a Two or more courses in the

Foreign language Fine or Practical Arts

Students graduating with an Honors Diploma sit at the front of the group, have their names listed at the top of the program, and receive a larger diploma after the regular diplomas are handed out.

#### **GRADUATING WITH HONORS**

Regardless of the courses they take, students who complete their courses with a cumulative weighted grade point average of 95 will **GRADUATE WITH HONORS.** Their achievement is noted with an asterisk on the program.

#### 2017-18 PROPOSED COURSES

#### **COURSE TITLE CREDIT COURSE TITLE CREDIT FOREIGN LANGUAGES LANGUAGE ARTS** FRENCH I 1 **ENGLISH I** 1 1 **ENRICHED ENGLISH I\*** 1 FRENCH II 1 FRENCH III\* **ENGLISH II** 1 FRENCH IV\* 1 **ENRICHED ENGLISH II\*** 1 SPANISH I 1 1 **ENGLISH III SPANISH II** 1 AP ENG LANG & COMP\* 1 **SPANISH III\*** 1 **ENGLISH IV** 1 1 **SPANISH IV\*** 1 AP ENG LIT AND COM\* SPEECH/ORAL ENGLISH 0.5 **BUSINESS & TECHNOLOGY** LAYOUT APPLICATIONS 1 1 PRODUCTS & PROCESSES FILM STUDIES 0.5 **ADV PRODUCTS & PROCESSES** 1 **SHAKESPEARE** 0.5 1 DRAFTING SHAKESPEARE II 0.5 **ENGINEERING TECHNOLOGY** 1 **CREATIVE WRITING** 0.5 1 **MULTI-MEDIA DIGITAL PHOTOGRAPHY** 0.5 **SOCIAL STUDIES US HISTORY I** 1 **ADV COMPUTER APPLICATIONS** 0.5 **US HISTORY II** 1 **CAREERS** 0.25 1 **CIVICS ECONOMICS** 0.5 **FINE ARTS WORLD HISTORY** 0.5 **BASIC ART** 1 **AP GOV & POLITICS\*** 1 **DRAWING** 1 0.5 **PSYCHOLOGY** 1 STUDIO ART **SOCIOLOGY** 0.5 STUDIO ART II 1 1 **SENIOR HIGH CHOIR NATURAL SCIENCES** 1 **VOCAL THEORY ENVIRONMENTAL SCIENCE** 1 1 **INSTRUMENTAL MUSIC** 1.5 ACADEMIC BIOLOGY **GUITAR** 1 **ADVANCED BIOLOGY\*** 1.5 **CINEMA MUSIC** 1 ACADEMIC EARTH SCIENCE 1 **ADVANCED EARTH & SPACE** 1 PHYSICAL EDUCATION

**ELECTIVES ARE HIGHLIGHTED** 

1.5

1.5

1

1.5

1

0.5

1

**ACADEMIC CHEMISTRY** 

**CONCEPTUAL PHYSICS** 

**ANATOMY & PHYSIOLOGY** 

ORGANIC CHEMISTRY

COLLEGE PHYSICS\*

**AP CHEMISTRY\*** 

PHYSICS\*

1

0.25

0.5

**SPORTS SCIENCE** 

**HEALTH II** 

PHYSICAL EDUCATION

#### **MATHEMATICS**

PRE-ALGEBRA	1
ALGEBRA 1-A	1
ALGEBRA 1-B	1
ACADEMIC ALGEBRA I	1
ACADEMIC ALGEBRA II	1
GEOMETRY CONCEPTS	1
ACADEMIC GEOMETRY	1
PRE-CALCULUS	1
CALCULUS*	1
STATISTICS	1
INTERMIATE STATISTICS	1
CONSUMER MATH	1
DISCRETE MATHEMATICS	0.5
SAT PREP MATH	0.5

#### **CLARION COUNTY CAREER CENTER**

ALLIED HEALTH SCIENCE	3.5
AUTOMOTIVE TECHNOLOGY	3.5
COMPUTER NETWORK/INFO	
TECH	3.5
CONSTRUCTION TECHNOLOGY	3.5
COSMETOLOGY STYLING	
ACADEMY	3.5
CULINARY ARTS & HOSPITALITY	3.5
DIESEL TECHNOLOGY	3.5
POLICE SCIENCE	3.5
WELDING & FABRICATION	3.5

HIGH SCHOOL PROJECT	P/F
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<sup>\*</sup>DENOTES WEIGHTED COURSE

1/26/2017

## **2017-18 COURSE DESCRIPTORS**

#### **ENGLISH/LANGUAGE ARTS**

#### **ENGLISH I (1 credit)**

Ninth grade English 1 is one of the first courses for which students earn credit. The year is devoted to analyzing literature, primarily classic epics, a novel, selected short stories, a Shakespearean tragedy, and selected poetry and essays. The focus is on recognizing literary devices and their impact on the pieces of literature. Engaged reading strategies to help insure comprehension and retention of reading pieces will be utilized and writing pieces will be completed to further demonstrate a higher level of thinking about the themes and characterizations, etc. in the reading. Research skills with focus on MLA format and accurate documentation will be one part of the writing process used with one unit.

#### **ENRICHED ENGLISH I (1 credit) weighted**

The enriched class is designed to challenge ninth grade students to think more deeply, write with more style and complexity, and read more independently from demanding, accelerated pieces of literature. The year is devoted to analyzing literature, primarily classic epics, a novel, selected short stories, a Shakespearean tragedy, and selected poetry and essays. They will independently read books from college-bound reading lists and then produce a written piece, using researched sources to substantiate their impressions as they analyze these pieces for literary devices used and their effectiveness, characterize main characters, select key passages, and investigate background for the books. Using the writing process, they will develop writing pieces that demonstrate all the genre of writing as well as their own creativity and ability to employ sophisticated style and depth on writing skills.

#### **ENGLISH II (1 credit)**

Units of study include short stories with emphasis on analysis of types of irony among texts, a creative essay written in the voice of a character, and a unit of poetry including writing original poems as well as analyzing and responding to published poetry. Additional units included: Career Research with an MLA-formatted research paper, a study of Medieval Romances of King Arthur, *To Kill A Mockingbird* and an analysis of theme development and characterization, the memoir *Night* with an analysis of the author's use of irony and imagery, and the drama, *Twelve Angry Men*.

#### **ENRICHED ENGLISH II (1 credit) weighted**

This advanced English course focuses on development of skills in reading and writing, with a focus on the elements of writing and exposure to the various genres of literature. Focus will also be given to the interpretation and analysis of literary texts, both fiction and nonfiction. Enriched English is an intensive program that challenges students to read attentively and thoroughly, draw analytical conclusions based on such readings, and communicate these conclusions in written and oral form. Needless to say, it is expected that reading assignments will be done promptly and thoughtfully. Much will be asked of each student as it pertains to personal responsibility. We will study many titles throughout the year. Titles include *but are not limited to* the following:

Fahrenheit 451, Lord of the Flies, To Kill a Mockingbird, Watership Down, Julius Caesar, Anthem, Night, Antigone, and Selections from Prentice Hall Literature: Timeless Voices, Timeless Themes

#### **ENGLISH III (1 credit)**

This course will focus on American literature and its relationship with American culture throughout the history of our country. In the reading and analysis of these works, the focus will be on how each relates to our culture. The literary works that students will be analyzing may include, but are not limited to, the following: A Separate Peace, The Catcher in the Rye, The Glass Menagerie, The Crucible, The Old Man and the Sea. Selections from the literary anthology, Glencoe Literature: American Literature

# ADVANCED PLACEMENT ENGLISH LANGUAGE AND COMPOSITION (1 credit) weighted

The AP Language and Composition engages students in the analysis of "prose written in a variety of rhetorical contexts and in becoming skilled writers who compose for a variety of purposes" (College Board 7). The course teaches students "to read primary and secondary sources carefully, to synthesize material from these texts in their own compositions and to cite sources using conventions recommended by professional organizations such as the Modern Language Association (MLA)" (College Board 7). Course readings feature expository, analytical, personal and argumentative texts from a variety of authors and historical contexts. Students will work with essays, letters, speeches, images as well as imaginative literature. Students will be exposed to a variety of expository writing and gain insight as to what makes effective writing effective. Students will engage with the readings and activities offered in these texts to improve their writing through responses and imitation techniques. In order to gain insight and engage in canonical American literature, students will read the following: The Adventures of Huckleberry Finn, The Catcher in the Rye, The Great Gatsby, The Crucible, The Glass Menagerie, A Raisin in the Sun, A Separate Peace as well as various selections from Glencoe Literature.

#### **ENGLISH IV (1 credit)**

This year long course consists of the study of English literature from the Middle Ages to the 20<sup>th</sup> century. Students will read, study, and interpret various works, including poetry, novels, plays, short stories, and essays. Writing assignments will focus on essays and four multi-draft papers, one of which will be research-based. As part of the senior project requirement, students will write a recommendation letter.

# ADVANCED PLACEMENT ENGLISH AND LITERATURE COMP (1 credit) weighted

This weighted course engages students in the careful reading, critical analysis, and intensive study of imaginative literature, including representative works from various genres and periods. Through the close reading of selected texts, students deepen their understanding of the ways writers use language to provide both meaning and pleasure for their readers. As they read, students consider a work's structure, style, and themes as well as smaller-scale elements such as the use of figurative language, imagery, symbolism, and tone. Writing assignments will focus on the critical analysis of literature and will include essays in exposition and argument, and personal narrative.

#### SPEECH/ORAL ENGLISH (1/2 credit)

Speech class helps students to develop effective communication skills. Students enrolled in this course will be expected to identify, analyze, develop and evaluate communication skills needed for professional and social success in interpersonal situations, group interactions, and personal professional presentations. Each student will be required to give numerous oral presentations to the class.

#### FILM STUDIES (1/2 credit)

Through viewing and discussing both classic and modern films, students explore all aspects of literature such as themes, characters and motifs. Students also investigate relevant ideas like the complexities of human relationships focusing on the family, on their peers and on themselves. Additionally, with each film the particular time period and its effects on various cultures are explored.

#### SHAKESPEARE (1/2 credit)

This course is intended to give students an introduction to William Shakespeare's major dramatic works by classification. The focus of the course is to lend an understanding of Shakespeare's language to readers. This course is an elective, and not a traditional academic course; therefore, the focus is on engagement with the plays. This course hopes to engage readers in Shakespeare's language and understand what they are reading.

In-class group readings will focus on the goals of understanding and engagement with the story. Questions are encouraged and discussions on the content and purpose of what the class is reading are essential to the class's purpose. Shakespeare wrote for the theater, and the theater is a visual art. Shakespeare's audiences didn't read the play before seeing it. Theater going is an active experience, and I hope to make the course an active experience for students so that hopefully I will not hear the terrible words, "I hate Shakespeare," or at least, "I don't understand Shakespeare."

#### **SHAKESPEARE II (1/2 credit)**

This course is intended to further expose students to William Shakespeare's major dramatic works by classification.

#### **CREATIVE WRITING (1/2 credit)**

Creative Writing aims to allow students a creative outlet for the writing skills. This course is designed to guide students in creative writing through experience in three genres: short story, poetry, and creative non-fiction. The course includes analysis of literary models (professional writings in each genre), individual and class criticism of work in a workshop mode, and lecture on and discussion of literary techniques in each genre.

#### **LAYOUT APPLICATIONS (1 credit)**

This course is designed to provide opportunities for yearbook staff members to learn about and develop skills in writing, design, photography, technology, business, organization, communication, management, and leadership. The students' ultimate responsibility is to produce, market, and sell the high school yearbook.

#### **SOCIAL STUDIES**

#### U.S. HISTORY I (1 credit)

This course begins by studying the events that led up to the Civil War and extends to cover the Great Depression. Students will not only be learning facts about this period in history, but will endeavor to make connections between the past and their own lives. They will discover how the history of the United States impacts the way they live and the way they fit into their global community. Independent projects, researched writings, and class discussions, as well as exams, will serve as the basis for learning new material and demonstrating proficiency.

#### U.S. HISTORY II (1 credit)

The purpose of this course is to cover American history from Roosevelt's New Deal era in the 1930's's to the present. Over the course of the 20<sup>th</sup> century, historians have expanded their inquiry beyond the analysis of great events and great leaders to include an examination of the contributions of all members of society to America's story. This class will draw on political history, social history, geography, literature, and economics to paint a more complete and accurate picture of America's history.

#### **WORLD HISTORY (1/2 credit)**

World Cultures is taught in the senior year at Clarion. It is a semester long course of study. The objective of the course is to engage the students in critical thinking through the study of other cultures both past and present. History and geography play a large role in the class as well as literature and film analysis. Students will be required to synthesize and evaluate historical resources as well look for continuity and change in different historical cultures. Students will also evaluate and analyze differing interpretations of historical events. Synthesizing historical research will play a major role as well. Students can expect lecture/discussion formats as well as a significant amount of small group discussions and projects. Individual class participation is paramount in this class.

#### CIVICS (1 credit)

Civics is a yearlong course involving American government and contemporary problems. This study serves as a reference for acquainting students with the many and varied problems that confront contemporary society. This course is a forum for fusing learning acquired from other courses within the social studies areas and is offered as a yearlong course. Critical thinking through writing will be a central theme in this class as well as evaluation, analysis and synthesis of modern problems in current American culture.

#### ECONOMICS (1/2 credit)

This semester long course for seniors covers a variety of topics dealing with personal finance culminating in a final budget. The goal of Economics is to provide students with real world scenarios to help them succeed financially in life. When students leave this course, they should have a foundation for financial stability.

# ADVANCED PLACEMENT U.S. GOVERNMENT & POLITICS (1 credit) weighted

This weighted course has been developed to expose students to the theories and everyday practices of our government. The students will explore the way the government operates and how politics shape public policy. Ultimately, the course is designed to help each individual student pass the AP Exam for U.S. Government and Politics. For all intents and purposes, the class will be taught on a college level. As a result, a substantial amount of reading and preparation will be required for every class. In the end, the students will be expected go beyond a basic analysis of how the government works. This course will teach and develop critical thinking skills by creating an environment in which the students will process the inner workings of the American political system, as well as maturing into the rights and responsibilities of that accompanying U.S. citizenship.

#### PSYCHOLOGY (1/2 credit)

Psychology is the systematic study of individual human behavior and experience. The purpose of this course is to introduce students to the content, terminology, methodology, and application of the discipline. Specifically, this course focuses on individual behavior and why an individual thinks, feels, and reacts to certain stimuli. Major emphases will be placed on research methods, stages in childhood and adolescence, how the brain works, altered states of consciousness,

psychological testing, forensic psychology, and psychological disorders. Students will also conduct a large scale social psychology experiment as their final project.

#### SOCIOLOGY (1/2 credit)

Sociology is the science of society, social institutions, and social relationships or more specifically the systematic study of the development, structure, interaction, and collective behavior of organized groups of human beings. The purpose of this course is to introduce students to the content, terminology, methodology, and application of the discipline.

#### **NATURAL SCIENCES**

#### **ENVIRONMENTAL SCIENCE (1 credit)**

This course focuses on the application of biological, chemical, and physical principles to the study of the physical environment and the solution of environmental problems, including subjects such as controlling environmental pollution and degradation; the interaction between human society and the natural environment; and natural resources management. Includes instruction in biology, chemistry, physics, geosciences, climatology, statistics, and mathematical modeling.

#### **ACADEMIC BIOLOGY** (1 ½ credits)

Academic Biology is an integrated biology curriculum emphasizing basic science skills with a mix of ecology, biochemistry, cellular diversity, cellular metabolism, cellular reproduction, human genetics, the genetic code, and evolution. Several laboratory exercises are included throughout the course. A variety of learning styles are considered in lessons, projects, and assessments. Standards and assessment anchors are addressed, as well as encouraging creativity and critical thought in students. The course prepares students for the Biology Keystone Exam.

#### ADVANCED BIOLOGY (1 1/2 credits) weighted

Advanced Biology is an integrated biology curriculum with a mix of biochemistry, cellular diversity, cellular metabolism, cellular reproduction, genetics, molecular biology, microbiology, and biological connections to human anatomy & physiology. Current research and technology are incorporated throughout the course. A variety of learning styles are considered in lessons, projects, and assessments. Standards and assessment anchors are addressed, as well as encouraging creativity and critical thought in our students.

Prerequisite: Academic Chemistry Grade of B or better

#### **ANATOMY & PHYSIOLOGY (1/2 credit)**

Anatomy and Physiology is a college-level, elective course designed for juniors and seniors wishing to pursue a career in the medical field. The goal of this course is to provide students with a rigorous overview of the major systems of the human body. Material will be presented in a variety of ways including, but not limited to, lectures, lab explorations (physical and virtual), readings, discussions, essays and research projects. Regular quizzes and tests will be utilized to assess student understanding throughout the course.

**Prerequisite: Academic Chemistry** 

#### **ACADEMIC EARTH SCIENCE (1 credit)**

This course is designed to give students an overview of the inter-related systems of the Earth and our planet's relationship to near space objects of our solar system. Topics include the use and creation of maps, methods of metric measurement and scientific procedures, plate tectonics and the movement of continents, mountain building, earthquakes and their prediction, volcanoes, the minerals that make up the composition of the Earth's crust and the recycling of rocks within the

Earth, meteorology and the creation of weather systems such as tornadoes and hurricanes and the formation of the sun, Earth and planets.

#### **ADVANCED EARTH & SPACE (1 credit)**

The Advanced Earth Science class allows students to participate in projects that Earth Scientists such as geologists and engineers would actually be involved with. Students will learn the basic techniques of field surveying and the creation of topographic maps, soil analysis to determine the optimum growth conditions for crops, water analysis and environmental pollution concerns and determining the value of land with respect to coal and oil deposits. Students publish their findings in reports in the same manner as a professional geologist.

#### **ACADEMIC CHEMISTRY (1 1/2 credit)**

Academic Chemistry is a course that alternates single and double periods to accommodate laboratories that cover class content. It requires the use of algebra I skills as the content is mathematically based. The course covers the metric system, measuring, atomic structure, periodic table, chemical bonding, gas laws, nuclear chemistry and organic chemistry. This course prepares students for college chemistry.

Prerequisite: C or better in Algebra I or IB

#### COLLEGE-ADVANCED PLACEMENT CHEMISTRY (1 1/2 credit) weighted

College-AP Chemistry is a lab course that has alternating single and double periods. This course covers the content of first and second semester college chemistry as dictated by the College Board. It is a rigorous and challenging course designed to prepare students to take the AP Chemistry Exam at the end of the year. If the student scores 3, 4, or 5 on the exam, they may receive college credit for these courses at their college of their choice. This course also gives the opportunity to earn 4 college credits through the University of Pittsburgh. The course covers everything from Academic Chemistry but more in depth plus acids and bases, equilibriums, oxidation reduction and chemical equation writing. This course is recommended for those students interested in majoring in science or medicine.

**Prerequisite: Academic Chemistry** 

#### ORGANIC CHEMISTRY (1 or ½ credit)

Organic chemistry is an introduction to the branch of chemistry that covers the reactions and molecules of living organisms. Studying the molecules and the reactions requires imagining the spatial relationship of the structures. The course covers the naming, classification, and reactions of the molecules. The prerequisite for the course is an 85% or better in Academic Chemistry (there is no math) and is designed for 11th-12th grade. It does NOT prepare for any college credit opportunity. Organic Chemistry will compliment Anatomy and Advanced Biology. It is recommended for students interested in studying science or medicine in college

Prerequisite: Academic Chemistry grade of B or better

#### **CONCEPTUAL PHYSICS (1 credit)**

Conceptual Physics is the study of physics through experiments, lecture and discussion. The concepts of physics will be the emphasis of this course. **Mathematics will be held to a minimum**, but a basic knowledge of algebra is needed. This is a hands-on study of physics. Topics will include Motion, Newtonian mechanics, Momentum, Energy, Simple Harmonic Motion, and Sound.

#### PHYSICS (1 ½ credit) weighted

This course is a study of general physics through experiments, lecture, and discussion. The concepts of physics as well as problem solving will be the emphasis of this course. Mathematics

will be used extensively, including some Trigonometry. Topics will include Motion, Newtonian mechanics, Momentum, Energy, Simple Harmonic Motion, and Sound.

**Prerequisite: Algebra II and Geometry** 

#### **COLLEGE PHYSICS (1 credit) weighted**

This course is intended for the student who is interested in science or engineering as a career choice. Calculus is used as needed and should be taken at least concurrently. Subjects covered include kinematics, Newton's laws of motion, energy, momentum, rotational motion, angular momentum, gravitation, oscillations, mechanical waves, and kinetic theory. **Students can receive 4 college credits** from the University of Pittsburgh. (Transferable to many other universities)

Prerequisite: Physics and Calculus or taking it concurrently

#### **MATHEMATICS**

#### PRE-ALGEBRA (1 credit)

Pre-Algebra is an introductory course that incorporates a strong review of computational skills and the beginning concepts of Algebra. The students are also introduced to several geometric concepts and calculator skills are advanced. At the conclusion of this course the student should be well prepared to enter the Algebra I course.

#### **ALGEBRA 1A (1 credit)**

Algebra 1A is an elementary study of the mechanics of the most basic algebraic concepts and a concentrated study of the mechanics of arithmetic. This course is designed to accommodate students who found Pre-Algebra more than challenging and would not succeed in the academic track. Algebra 1A is structured to provide the student with an understanding of the real number system and of the operations normally associated with algebra.

**Prerequisite: Pre-Algebra** 

#### **ALGEBRA 1B (1 credit)**

Algebra 1B is an expanded study of the mechanics of the most basic algebraic concepts and an enhanced study of the applications of arithmetic. This course is designed to accommodate students who need to bolster their mathematics background before attempting to study the concepts of geometry. Algebra 1B is structured to continue to provide the student with a strong understanding of the real number system and of the operations normally associated with algebra.

Prerequisite: Algebra 1A

#### **ACADEMIC ALGEBRA I (1 credit)**

Academic Algebra I follows Pre-Algebra and precedes Algebra 2 in the academic, college-bound student's mathematical career. This course is designed to provide highly motivated students with a deep, conceptual understanding of the following topics: elementary statistics (measures of central tendency, simple measures of dispersion, and graphical representations of univariate and bivariate data sets); proportional reasoning; variation (direct and inverse) and graphs; linear equations and functions; fitting a line to data (linear regression; and systems of linear equations and inequalities.

Prerequisite: Pre-Algebra.

#### **ACADEMIC ALGEBRA II (1 credit)**

Academic Algebra II follows Academic Algebra I and precedes Academic Geometry in is the academic, college-bound student's mathematical career. This course is designed to provide highly motivated students with a deep, conceptual understanding of functions and the algebraic concepts associated with them. Topics included in this course are: functions, linear functions,

linear inequalities, special linear functions, systems of linear equations and inequalities, statistics (line of "Best fit"), polynomials, and quadratic functions.. This course involves extensive use of graphing calculators which are provided for in-class use.

Prerequisite: Academic Algebra I

#### **GEOMETRY CONCEPTS (1 credit)**

Geometry Concepts is a non-academic study of the concepts of points, lines, planes, angles, and polygons. The first semester of the course concludes with a basic instruction to formal proof writing. This course is designed to accommodate students who may have found Algebra to be a challenge. The spring semester of this course concentrates on the study of trigonometric definitions, relations, and identities.

Prerequisite: Algebra 1B

#### **ACADEMIC GEOMETRY (1 credit)**

Academic Geometry follows Algebra II in the academic, college-bound student's mathematical career. This course is designed to accommodate highly motivated students in the study of written formal proofs. The concept of proof writing is developed in a careful and a thorough manner, using both the two-column form and the narrative style. A mathematical system is constructed from undefined terms, definitions, postulates, theorems, and corollaries.

Prerequisite: Academic Algebra II

#### PRE-CALCULUS (1 credit)

An academic mathematics course for college-bound juniors and seniors that focuses on topics in advanced Algebra and Trigonometry. All functions, polynomial, rational, logarithmic, exponential, and trigonometric, will be studied in depth. Technology, in the form of graphing calculators, will assist students in studying the graphical behavior of such functions. In addition, basic statistics, sequences, series and other computations will be addressed.

Prerequisite: Academic Algebra II and Academic Geometry

#### CALCULUS (1 credit) weighted

This weighted course is designed to provide the college bound student with a comprehensive study of the concepts of limits, derivatives, and integrals through graphical, numerical, and algebraic approaches. The topics covered reflect those of a Calculus I course at the college level. A graphing calculator is highly recommended.

**Prerequisite: Pre-Calculus** 

#### **CONSUMER MATH (1 credit)**

A course in the mathematical track designed to provide students with the basic knowledge of everyday mathematical concepts that they will encounter in their future lives. Students will learn about concepts such as checking accounts, savings accounts, buying a car or home, filing taxes, etc. The class is based on real-world situations that the students will be faced with in their financial futures.

#### STATISTICS (1 credit)

This course is offered as an alternative for seniors who do not take pre-calculus, but have completed Algebra II. Students going on to careers in business, medicine, or engineering would all be candidates for this course. Students will learn how to organize, analyze and report data. Topics covered include frequency distributions, elementary probability, counting techniques, discrete probability, normal distributions, confidence intervals, and hypothesis testing.

Prerequisite: Academic Algebra II

#### **INTERMEDIATE STATISTICS (1 credit)**

This course is offered as an alternative for seniors who do not take calculus, but have completed pre-calculus. Students going on to careers in business, medicine, engineering, politics, biology and mathematics would all be candidates for this course. Students will learn how to organize, analyze, report data, and make inferences. Topics covered include frequency distributions, data variations, elementary probability, counting techniques, discrete probability, binomial distributions, normal distributions, confidence intervals, hypothesis testing, correlation and regression analysis, Chi-Square distributions, *F* distributions (ANOVA), and nonparametric statistics.

**Prerequisite: Pre-Calculus** 

#### **DISCRETE MATH (1/2 credit)**

This course is designed for senior high students in grades 10-12 interested in studying advanced, college level mathematical topics. The goal of this course is to introduce students to finite systems that are widely used in the computer and social sciences, such as the mathematics of networks, logic, social choice, and decision making. Material will be presented in a variety of ways including, but not limited to, lectures, class discussions, research projects, group work, etc. Applications and modeling are central, and there will also be a heavy emphasis on technology usage, particularly in coding and programming.

Prerequisite: Algebra II or taking it concurrently

#### SAT PREP MATH (1/2 credit)

In this course, students will learn test-taking strategies. These strategies will help them on multiple choice/timed exams that they will encounter, such as the SAT, AP exam, college placement test, and ASVAB. This course is designed specifically to help students increase their math SAT score. Students will review and learn concepts that will be covered on the New SAT math test. Students will take several practice tests from which they will correct any mistakes, to see where they need to improve.

#### **WORLD LANGUAGES**

#### FRENCH I & SPANISH I (1 credit)

Students who complete Level One will have mastered basic skills to *begin* communication in the target language. Students will be able to engage in meaningful conversation at the novice level, develop listening skills, and begin to acquire reading and writing skills. Topics for communication include: telling personal information, answering simple questions, discussing school and after school activities, talking about families and homes, traveling by airplane. This course also provides students with insight and awareness of the distinct cultures where the target language is spoken.

#### FRENCH II & SPANISH II (1 credit)

Students will further develop the skills acquired in Level One. Conversation skills will be expanded. Listening comprehension skills will develop to a higher level.

More emphasis will be placed on reading and writing skills. Vocabulary development is an important part of this course. Students will learn to use the past tense of verbs. Topics covered include: winter and summer activities and sports, weather and seasons, cultural events, clothes and shopping, restaurants and food preferences, travel, camping, and daily routine. A deeper awareness of Hispanic cultures is encouraged.

#### FRENCH III & SPANISH III (1 credit) weighted

Level Three is a continuation of levels one and two with one main difference: the pacing

is much more challenging for the student. Very little English is used in the classroom as the four skills of listening, speaking, reading, and writing are expanded upon. Review still plays a major role at this level with the year beginning with a chapter review as needed. The amount of vocabulary presented in each chapter is amplified and the grammar topics presented are much more demanding. The amount of homework is increased substantially from levels one and two. The final exam is, of course, cumulative and covers all material presented since the beginning of level one.

#### FRENCH IV & SPANISH IV (1 credit) weighted

Level Four is the final level in the series and is the level in which the most material is presented. Although review still plays a role, the amount of homework increases dramatically and there is much more emphasis placed on reading and listening skills. The class is conducted almost entirely in the target language. Students are exposed to many more examples of authentic material from various countries and original thought (both spoken and written) in the target language is expected. Students are exposed to new types of activities (different from the previous three levels) especially in the skills of reading, writing, and listening.

#### **BUSINESS & TECHNOLOGY**

#### PRODUCTS AND PROCESSES (1 credit)

Products and Processes is a course designed to give the students insight into the manufacturing field of technology. This class introduces the basics of woodworking, with a great deal of emphasis on safety and safe practices while using machines. Students will learn about proper construction techniques and steps necessary to create a safe working environment.

#### **ADVANCED PRODUCTS AND PROCESSES (1 credit)**

Advanced Products and Processes is an upper level course designed to enhance the student's knowledge of the manufacturing field of technology. This class builds off the information previously learned in the Products and Processes course, as well as new information pertaining to manufacturing will be included in this course, such as cabinet making, lathes, and independent projects.

#### **Prerequisite: Products and Processes**

#### **DRAFTING (1 credit)**

Drafting is a course specially designed to introduce Mechanical Drawing and Computer Aided Drafting (CAD) to the student. Mechanical Drawing utilizes mechanical tools, such as compasses, pencils, straightedges, triangles, etc., to create drawings from which parts can be manufactured. CAD is a computer program that allows the creation of manufacturing drawings on the computer without the use of hand tools.

#### **ENGINEERING TECHNOLOGY (1 credit)**

Engineering Technology is a course designed to give students insight into the ever-changing world of engineering. Students will be designing, constructing, and testing various projects to determine the strengths and weaknesses of materials. Students will also learn key concepts pertaining to the four areas of technology, which includes construction, communication, manufacturing, and transportation.

#### **MULTIMEDIA TECHNOLOGY (1 credit)**

Multimedia Technology is a course designed to introduce students to communication technology. In this course, students will be using computer programs to generate stimulating designs, images, graphics, digital media, and video. This class will give insight into advertising, photo

manipulation, animations, and video editing. Students will understand the importance of graphics in today's world.

#### **DIGITAL PHOTOGRAPHY (1/2 credit)**

The Digital Photography elective at CASD is a semester long technology class designed to teach students more about the exposure, composition and editing of digital photographs. In this class, students will identify different aspects of photography, use skills to take photographs, and reflect upon the elements of photography through writing. Each week the students will have a focus of study and assignments related to that focus to enhance their photography skills.

#### **ADVANCED COMPUTER APPLICATIONS (1/2 credit)**

This is a semester course that is geared to help students with applications that will assist students with furthering their education. There is a focus on Google Applications and multiple codings. Much of the work will be completed in class with students assisting one another to facilitate the learning process.

#### **CAREER CHOICES (1/4 credit)**

This required course for 9th graders is a semester course offered every other day. Careers engages students in career development and lifelong learning by helping them develop the knowledge, skills, and attitudes needed to successfully:

- examine their own lives
- explore and evaluate a wide range of education and career options, and
- make reasoned and researched goals for their future.

This course facilitates the in-depth exploration of three fundamental questions:

Who am I? What do I want? How do I get it?

#### **FINE ARTS**

#### BASIC ART (1 credit)

This introductory course is designed to give a broad overview of the arts and build upon the techniques learned in General Art 8. The students will receive instruction in a variety of art techniques including three-dimensional rendering with pencil, acrylic painting, watercolor and colored pencil, graphic design and illustration. The course also is designed to explore art areas on their own through independent studies.

#### **DRAWING** (1 credit)

This advanced course deals with two-dimensional visual arts. The students will use a variety of mediums and techniques including: soft-lead drawing in portraiture and anatomy, gesso drawing, pen and ink stippling, pen and ink washes, colored pencil techniques and pastels. Students will also have opportunities to explore art areas through independent studies.

#### **Prerequisite: Basic Art**

#### STUDIO ART (1 credit)

This advanced course is for the mature, self-motivated art student. Studio Art allows a student to pursue a chosen art area in depth. Students select their own medium and techniques using the instructor as a resource. One open-ended assignment is given each nine weeks.

#### **Prerequisite: Drawing**

#### STUDIO ART II (1 credit)

This course provides an opportunity for students who have completed Studio Art to continue their studies.

**Prerequisite: Studio Art I** 

#### SENIOR HIGH CHOIR (1 credit)

Senior High Choir is a graded course intended for senior high students (grades 9-12) who elect to perform in a large vocal ensemble and wants to develop vocal skills, as well as an awareness of various musical periods and genres. Men and women in grades 9 through 12 are permitted to take this elective course. This course will process and develop vocal pedagogical elements, music theory and sight singing, as well as various genres of choral singing, as required by the Pennsylvania State Standards. In addition, this course will serve as preparation for those students wishing to perform or major in music during post-secondary education. \*Attendance is required at the following performances: Sectional Rehearsals, The Holiday Concert in December, The Mid-Winter Concert in March or April and The Spring Concert in late spring. Choir members will also have the opportunity to audition for Clarion Singers and County Chorus.

#### **VOCAL THEORY (CLARION SINGERS) (1 credit)**

Vocal Theory is a graded course intended for senior high students (grades 10 - 12) admitted by audition only. This course will process, develop and demand proper vocal pedagogical elements, as well as various genres of choral singing, as required by the Pennsylvania Department of Education State Standards. Members are required to read music, follow direction and maintain the highest level of self-discipline and etiquette during rehearsals and performances. In addition, this course will develop and encourage dance technique, performance skills, and will serve as preparation for those students wishing to perform or major in music during post-secondary education.

\*Students in Vocal Theory must also be in Senior High Concert Choir. Students will need to attend many rehearsals and performances outside of the school day. In addition, members will pay \$60 towards the purchase of the performance attire.

#### **GUITAR PERFORMANCE (1/2 credit)**

Guitar Performance class is a Sr. High level course designed to teach beginning guitar. Students will learn note and tab reading, strumming and fingerpicking patterns and songs that incorporate previously learned skills. Students must own a guitar to participate in the class.

#### **INSTRUMENTAL MUSIC (1 credit)**

The Senior High Band consists of students in grades 9 - 12. The course involves marching band as well as concert band. The band performs approximately twenty times per year in parades, football games, field show competitions and concerts. Pep band and jazz-rock ensemble are small groups of students within senior high band who also perform at several school functions throughout the school year.

#### CINEMA MUSIC (1/2 credit)

Cinema Music is a course for the film and music enthusiasts. The class will take an in-depth look at the music used in the film industry. The course will touch on the process of film scoring, the operations of the industry, music for silent film, early film music up to the 21st century film music. It will also discuss the careers of music in film, and the role music plays in the movie world.

Prerequisite: One year of band OR choir

#### PHYSICAL EDUCATION

**SPORTS SCIENCE (1 credit)** 

A highly individualized class for the motivated student in grades 9-12 focusing on movement patterns, biomechanical analysis, sleep monitoring, nutrition monitoring and improvement. Training readiness and stress level will also be monitored. This class will be ideal for those with an interest sports medicine, physical therapy, personal training and wellness or continuing on to collegiate athletics. This course could also sequence well with anatomy and psychology. Students will be required to own a Fitbit Charge 2 would help the athlete monitor all needed metrics. We would continue to use daily fit log as well as individual student research.

#### **HEALTH II (1/2 credit)**

Health is a required course for seniors. It is focused on life after high school incorporating such topics as decision-making, goal setting, leadership development, and physical fitness. This course focuses on the knowledge for students to increase their own fitness levels over a lifetime. Nutrition, tobacco, alcohol, and drugs and drug testing are also considered. Finally, healthy relationships, marriage and family are discussed.

#### PHYSICAL EDUCATION GRADES 7-12 (1/4 credit)

Physical education is required of all students each year. The majority of physical education classes meet three times a week. Most physical education classes meet in semesters. The time is split 50/50 between fitness center and sport/activity day. Students use heart rate monitors for a minimum of 25 minutes. Our focus is to have students enjoy being active building and being responsible for their own fitness and fitness level as well as working together and choosing lifetime activities.

### **Clarion County Career Center**

#### Allied Health Science (5 half days/week –2 semesters, 3 credits)

This curriculum is designed for all individuals interested in medical careers. The program includes background information in medical, nursing, dental, laboratory, imaging and rehabilitative occupational areas. Individual course selections include dental assisting, nursing assisting, and medical assisting. Nurse's Aide **certification** is available upon completion of related programs. Students who continue their education at the Career Center's LPN program will have 40 credit hours.

#### **Automotive Technology** (5 half days/week-2 semesters, 3 credits)

Students can pursue the eight Automotive Service Excellence (ASE) certifications. Areas to be covered include engine repair, automatic and manual transmissions, suspension and steering, brakes, electrical/electronic systems, heating/air conditioning, and engine performance. Students may also be **certified** by NATEF and as a state license inspector.

### Computer Networking/Information Technology (5 half days/week-2 semesters, 3 credits)

This program will prepare individuals with the technical skills required to support networks and network users. Possible skill development includes network design, security, and computer repair. Possible **certifications** include A+, Network+, and CISCO. Certifications may be eligible for college credits.

#### **Cooperative Vocational Education**

Cooperative education or "co-op" is a method of training that combines vocational instruction with the real world, on-the-job experience. Qualified seniors may spend one-half day, or its equivalent, on the job. The co-op coordinator will assist the student in finding a

job. Students must maintain acceptable grades at their sending school, have good attendance, and provide their own transportation to and from the work site. The student gains valuable experience, improved work ethics, and a paycheck.

### <u>Construction Technology</u> (5 half days/week –2 semesters, 3 credits)

Students enrolled in this program receive training in carpentry, electric, plumbing, roofing, window and door installation, siding, blueprint reading and masonry. Every year a modular house is built. This gives hands on experience with a full-scale project. Skills learned may also be of value when owning a home or rental property. OSHA certification may be obtained.

### Cosmetology Styling Academy (5 half days/week –2 semesters, 3 credits)

The Academy's curriculum consists of hair styling, permanent waves, hair coloring, bleaching, straightening, hair testing and scalp care. Also included in this program is instruction about the skin, which includes facial treatments and cosmetics. Students learn proper manicuring methods as well as sales theory, maintaining client's hair record cards, state laws and diseases of the skin. Students may be eligible to become a **certified** cosmetologist after completing 1250 hours of training.

#### Culinary Arts & Hospitality (5 half days/week –2 semesters, 3 credits)

Students in this program can prepare themselves with the training necessary for entry-level jobs in the foodservice industry. Skills taught include commercial food preparation, knife techniques, cake decorating and sanitation. **Certification** by Servsafe is offered. Job possibilities include prep cook, baker, waiter or waitress.

#### Diesel Technology (5 half days/week –2 semesters, 3 credits)

The skills students learn in diesel technology include but are not limited to preventative maintenance, electrical troubleshooting, air system troubleshooting, engine and drive component disassembly, brake troubleshooting, air conditioning, and basic welding. Included in this program is customization of trucks and repair work.

#### Police Science (5 half days/week-2 semesters, 3 credits)

Police Science prepares students for a variety of exciting careers in criminal justice. Criminal justice and private security is studied the first year. Second year students work on Emergency Dispatch certification. Third year students concentrate on the First Responder certification. Physical fitness is highly stressed. Students are taught self-defense as well as investigating techniques. Students who complete the three-year program with a "B" average and instructor's recommendation will receive **six credits** from Butler County Community College when enrolling into the criminology program.

#### Welding & Fabrication (5 half days/week –2 semesters, 3 credits)

Students are trained to become successful in the welding fields using state of the art equipment. The different types of welding include Oxyacetylene, arc, MIG, TIG, pipe, and dual shield. Plasma cutting, blueprint reading and pipe welding also will be taught. New learning stations include a robotic welder and a CNC plasma cutter. Certification from the American Welding Society may be obtained.