MONTPELIER HIGH SCHOOL COURSE DESCRIPTIONS 2023/2024

## ART

## ART I

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Fee: | $\$ 20$ |

Art I is an introductory course. This course emphasizes artists and art history as inspirations for art projects. The students will create two and threedimensional pieces that further develop their skills in each area of art. The understanding and appreciation of self and others through art is the focus of the class. Students will have the opportunity to make personal choices about the creation of their art. This course is required before taking any other level of art.

## DIGITAL ART I \& II

Length: One Semester
Credit: . 5
Fee: $\quad \$ 20$
This course will introduce students to digital art and design. Students will become familiar with software from Adobe. Students will create digital art, layouts and logos. Students will learn to manipulate and edit digital photos, as well as explore character animation. The willingness to work outside of class is a must, as these projects will not be completed in class time alone. Students must have teacher approval and passed Art I with a C or better.

## DRAWING/PAINTING

Length: One Semester
Credit: 0.5
Fee: $\quad \$ 20$
This class is designed to allow students to further explore and refine their skills in regards to drawing and painting. They will be introduced to new concepts, techniques, and materials that will aid them in the successful completion of projects. The goal is the refinement of skills. Quality and craftsmanship play a major role in this class. You must have taken Art 1 and passed with a C or better.

| ADV. DRAWING/PAINTING |  |
| :--- | :--- |
| Length: | One Semester |
| Credit: | .5 |
| Fee: | $\$ 20$ |

This class is designed for the student who enjoys drawing and painting who wants to further grow. The focus of this class is the formulation of ideas and creativity when drawing and painting. The student must be able to successfully apply techniques taught in previous art classes. The goal of this class is the successful use of creativity, the development of your ideas, in regards to drawing and painting. Must be able to apply independent skills and original ideas. You must have taken Art 2, Art 3, or Drawing and Painting with a C or better and teacher approval.

## SCULPTURE/CERAMICS

Length: One Semester
Credit: 0.5
Fee: $\quad \$ 20$
This class is designed to allow students to explore and refine their skills regarding Pottery and Sculpture. They will be introduced to new concepts, techniques, and artists that will aid them in the successful completion of projects. The goal is the refinement of skills. Quality and craftsmanship play a major role in this class. You must have taken Art 1 and passed with a C or better.

## ADV. SCULPTURE/CERAMICS

Length: One Semester
Credit: 0.5
Fee: $\quad \$ 20$
This class is designed for the student who enjoys building. The focus of this class is the formulation of ideas and creativity when building. The student must be able to successfully apply techniques taught in previous art classes. The goal of this class is the successful use of creativity and the development of your ideas in regards to building. Must be able to apply independent skills and original ideas. You must have taken Art 2, Art 3, or Sculpture/Pottery with a C or better and have teacher approval.

## SENIOR ART

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Fee: | $\$ 20$ |

Must have completed art 1,2 , and 3 . Must be able to apply independent thinking skills and have your own original ideas. This class will be student driven and focus on the individual skill sets of each student. Must have teacher approval.

## WORLD CRAFTS

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open To: | All Students |
| Fee: | $\$ 20$ |

This class focuses on different crafts present in our culture and from cultures around the world. You will learn how to use patterns, special painting techniques, design techniques, and materials that are more craft based. You do not need to take Art I to take this class. After completion of this class you MAY NOT take other art classes until you take Art I.

## BUSINESS AND TECH

| ACCOUNTING |  |
| :--- | :--- |
| Length: | One Year |
| Credit: | 1.0 |
| Open To: | $10^{\text {th }}$ - 12 th graders |
| Fee: | $\$ 15.00$ |

Accounting is the language of business and an integral aspect of all business activities. Mastery of fundamental accounting concepts, skills, and competencies is essential to making informed business decisions. Regardless of students' chosen course of study or career path, accounting prepares them to be educated business professionals and informed consumers. This course will focus on the management of a company's financial resources including the accounting cycle, financial statements, and interpretation and use of financial data.

ENTREPRENEURSHIP<br>Length:<br>One Semester<br>Credit: . 5<br>Open To: All Students

This course is a general introduction to the business world. Fundamentals of business organizations, entrepreneurship, and small businesses are studied. This class will be a combination of lecture and discussion with projects being assigned that relate to the material being studies.

## FINANCIAL LITERACYMANDATORY

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open to: | $10-12^{\text {th }}$ graders |

This course will focus on the basis for what all students should know and be able to do to be informed consumers by the time they graduate from high school. The course will help students develop the ability to make informed and reasoned financial decisions for themselves and prepare students for their role as consumers and decision makers in society.

## MANAGEMENT

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |

Building business skills and management will be the focus of this course. This class will be a combination of lecture and discussion with projects being assigned that relate to the material being studied.

## MULITMEDIA

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |

Multimedia is the combined use of text, graphics, sound, animation, and video. Students will use their creativity and skills to create and edit interactive multimedia presentations, digital images, sound, and movies, and will be introduced to animation and web pages. The knowledge and skills acquired in this class will enable students to successfully perform and interact in today's technology-driven society.

## TECHNOLOGY I

Length: One Semester Credit: . 5<br>Open To: All Students

Technology 1 will serve as an introduction to applications that students should be proficient in to succeed in High School. Students will explore the basics of computer programming, Cloud Computing, and Digital Design. Students will begin to learn to use tools that focus on Computer Aided Design and 2D Computer Aided Manufacturing.
Students will successfully complete multiple projects during the course of the semester.

## TECHNOLOGY II

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open To: | Students who completed Tech I |

Technology 1 is a prerequisite for Technology 2. Technology will build upon the skills that students have learned in Technology 1. Projects will be more student lead and student driven. Students will focus on additive and subtractive Computer Aided Manufacturing. Students will also explore concepts of photo editing and web-design.

## FOREIGN LANGUAGE

## SPANISH I, II, III, and IV

| Length: |  |
| :--- | :--- |
| Credit: | 1.0 |

Students will study various aspects of culture while acquiring the Spanish language. All courses are taught in Spanish, and students are expected to function in Spanish AT THEIR SKILL LEVEL. In this way, the language is acquired naturally. I am using the skill levels prescribed by the Ohio Department of Education World Language and Cultures Standards

## SPANISH I

Identify the main idea in things they read and hear with a lot of support from pictures and body language. Use memorized words, phrases and questions. Use manners and gestures to clarify meaning. Use memorized words and phrases with pictures and/or graphs etc. to make very short presentations

## SPANISH II

Identify the main idea in things they read and hear with some support from pictures and body language. Use memorized words, phrases and questions. Use manners and gestures to clarify meaning. Use memorized words and phrases with pictures and/or graphs etc. to make short presentations. Add to their stock of memorized words, phrases and questions. Start to mix memorized language to create original phrases and questions

## SPANISH III

Identify the main idea and some details in short and simple things they read and hear. Mix memorized words, phrases and questions from a larger stock into original language. Use words to clarify meaning. Make simple presentations with original language. Add to their stock of memorized words, phrases and questions. Engage in short, partially original conversations.

## SPANISH IV

Identify the main idea and some details in more complex things they read and hear. Mix memorized words, phrases and questions from a growing stock into original language. Use words to clarify meaning. Make more complex presentations with original language. Add to their stock of memorized words, phrases and questions. Engage in short, mostly original conversations. Write paragraphs and series of paragraphs

## LANGUAGE ARTS

## ENGLISH 9

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

The class concentrates on improving reading and comprehension, grammatical skills, and writing ability. Assignments will consist primarily of reading short stories, poems, and non-fiction, to discuss, write, undergo vocabulary and grammar exercises based on readings. Students will read two non-fiction novels and study the development and importance of the novels. Also, they will read a Shakespearean play, Romeo and Juliet. Students will complete four book projects. Three of the book projects will be presented in front of the class. Students will improve listening skills and recognize non-verbal communication. Students will organize ideas for their book project speeches and will also recognize and overcome stage fright.

| ENGLISH 10 |  |
| :--- | :--- |
| Length: | One Year |
| Credit: | 1.0 |

The class concentrates on improving each student's reading ability and comprehension, grammatical skills, and writing ability. Fundamental skills in grammar are reviewed. In writing, the mechanics of capitalization, punctuation, spelling, and vocabulary are emphasized and writing assignments are assigned frequently. The study of literature concentrates on short stories, poems, a non-fiction novel, and one Shakespearean play, Julius Caesar. Students will improve verbal communication skills and recognize audience analysis is an essential step in public speaking

## GENERAL ENGLISH 11

$\begin{array}{ll}\text { Length: } & \text { One Year } \\ \text { Credit: } & 1.0\end{array}$
This course is geared to the student who does not intend to further education at a four-year college. Standard English will be reviewed as will the mechanics of capitalization, punctuation, spelling, and vocabulary. There will be many writing assignments, including research based assignments, literary analysis, and personal writings. Short stories, novels, and non-fiction (autobiographies, biographies, and essays) will be used to develop reading comprehension. Students will be encouraged to develop vocabulary skills, and spelling will be emphasized. Students will also participate in discussions and interviews. Also there will be a comprehensive career unit that will last the whole semester.

## CP ENGLISH 11

$\begin{array}{ll}\text { Length: } & \text { One Year } \\ \text { Credit: } & 1.0\end{array}$
This course is intended for students planning on attending college. Writing is stressed throughout the year. Students will complete informative, persuasive, narrative, and analytical essays. Students will read and analyze Macbeth, Frankenstein, The Great Gatsby, and I Know Why the Caged Bird Sings. The mechanics and processes of writing are stressed, as is the development of critical thinking skills. Rhetorical analysis will also be a major unit. Along with writing, students will participate in discussion and presentations throughout the class.

GENERAL ENGLISH 12

Length: Credit: One Year
1.0

This course is intended for students who will be attending a two-year college, joining the military, or entering the workplace. Students will write essays, letters, stories, and reports, and read novels, short stories, and drama.
Students will be encouraged to develop reading and writing skills throughout the course. Students will present a variety of speeches as well as complete a variety of writing assignments.

## CP ENGLISH 12

Length: One Year
Credit: $\quad 1.0$
This course is intended for those students who will be attending college. A continuation of C.P. English 11, the course stresses writing across the curriculum in preparation for college composition classes. Major essays will include argumentative, informative, narrative and literary analyses. Students will also read and write literary essays based on Hamlet, For Everyone, and The Scarlet Letter. Students will conduct debates, lead discussions, and take part in other in-class presentations.

## CCP ENG 111 COMPOSITION I

Length: One Semester
Credit: 1 high school \& 3 college
Prerequisite: Must be accepted to NSCC
Open to: $\quad 9^{\text {th }}-12^{\text {th }}$ graders
This course is only offered if enough students sign up. An expository composition course emphasizing the expectations of college-level writing, including thesis development, support, and coherence. Students will gain experience using a variety of rhetorical modes. In addition to a number of full-length essays, a short documented paper, based on research materials and using parenthetical references, is required.

## CCP ENG 112 COMPOSITION II

| Length: | One Semester |
| :--- | :--- |
| Credit: | 1 high school and 3 college |
| Prerequisite: | Must have earned a C or |
| better in ENG 111. |  |
| Open to: | $9^{\text {th }}-12^{2 h}$ graders |

This course is only offered if enough students sign up. Building on the skills learned in Composition I, this course further develops the student's writing and research experience, with an emphasis on analytical writing in response to critical reading and class discussion. Using MLA parenthetical documentation techniques, the student will write several short essays and a research paper.

ELECTIVE COURSE OPTIONS ACT PREP

Length:
Credit:
Prerequisite:
Open to:

One Semester
. 5
Must be college-bound $10^{\text {th }}-12^{\text {th }}$ graders

This course is available to students who are planning to attend a four-year college/university. Preference will go to seniors during first semester and juniors during second semester. The focus of the course is to provide online opportunities for students to practice and study for the ACT. Students who have already taken the ACT and would like to increase their scores will find this course to be especially beneficial.

## BOOK CLUB

Length: One semester
Credit

Students will read several books throughout the semester. Students will be responsible for completing all required reading (4-6 novels), as well as leading and taking part in discussions and projects about the books. The goal of the class is to help students understand and appreciate the literature studied.

## COMMUNICATIONS <br> Length: One Semester Credit: . 5

Open to all classes, this class will study various forms of communications including speech, mass media, and propaganda. Speeches will be researched, prepared, and presented.

## PODCASTING

Length: One semester
Credit . 5
In the first quarter of this course, students will listen to different types of podcasts. They will analyze the production and writing of the podcast, which includes but is not limited to, the purpose of and the design of the podcast as well as the elements of the speaker. In the next quarter of this course, students will be focusing on designing their own podcasts. They will focus on planning, interviewing, story-telling, recording and editing, and possibly distributing.

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SCREENWRITING
Length: One semester
Credit . 5
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In the first quarter of this course, students will observe different types of television and movie films using its screenplay. Students will analyze the writing and production of said films, which includes but is not limited to, the purpose of and the format of screenplays, as well as the elements of film and screenplays. In the next quarter of this course, students will write in the format of a screenplays using techniques such as dramatic strategies, archetypes, planning, pacing, and characterizing, which would have been taught in the first quarter of this course.

## TOMORROW'S LEADERS

Length: One Semester
Credit: . 5
Tomorrow's Leaders is a course that focuses on preparing students to be leaders in our school, community, and society. This course will require students to delve into their inner self to find the leader within. The purpose of this course is to help students build self-confidence, empower them to succeed, lead them to the next level of leadership, and teach them how to influence others in a positive, selfless manner. To be eligible for this course, students are required to fill out the application with teacher recommendations.

## YEARBOOK

| Length: | One Year Independent Study |
| :--- | :--- |
| Credit: | 1.0 |
| Open To: | $10^{\text {th }}-12$ th graders |

An elective course for students interested in participating in the production of the Montpelier High School annual. Emphasis is placed on actual production of the annual. Experience will be gained in the following areas: Planning and techniques of good layouts, types of design, basics of photography, cropping photographs, typography and copy preparations, financial planning, advertising and sales. This will be an independent study. Extra-curricular time will be required.

## MATHEMATICS

## ALGEBRA I

$\begin{array}{ll}\text { Length: } & \text { One Year } \\ \text { Credit: } & 1.0\end{array}$
Algebra is a natural outgrowth of arithmetic. Up to now work in mathematics has been mostly arithmetic with some simple geometry and formula work. Arithmetic deals with definite problems while algebra deals with those same problems in general. One of the main objectives of algebra is to make a transition from arithmetic, by thinking in terms of numbers alone, to principles of algebra dealing primarily with numbers and letters (variables) in the equation. Since algebra is cumulative, much time is spent in teaching the student how to approach and study new concepts and to recall concepts previously studied. Student should understand that completed homework is a necessity for course completion.

## ALGEBRA I A PART I \& II <br> Length: One Year Credit: $\quad 1.0$

This course will consist of expressions, equations, inequalities, linear functions and systems of equations. Students will apply these concepts to real world applications by hand, and also with technology. Teacher recommendation is mandatory.

## ALGEBRA I B PART I \& II

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

This is a continuation of Algebra 1A. This course will review Algebra 1A and also cover new material that involves exponential functions, rational functions, and quadratics. Teacher recommendation is mandatory.

## MATH LAB

Length: One semester or One Year
Math lab will help reinforce, re-teach and provide additional support for Algebra. Class time will be split among the following: Preview/Re-Teach Skills, Related activities focusing on different areas of mathematics, Review basic math facts, specifically fractions, decimals and number sense, and Monitoring Progress. We will use a variety of assessment tools to help prepare you for the upcoming EOC test/retest.

## GEOMETRY

## Length: One Year <br> Credit: $\quad 1.0$

The basic objectives for the study: 1) it gives the student a chance to develop his understanding of mathematical proof 2) it provides an understanding of plane and space relationships 3) it helps to develop the student's sense of logic as applied at everyday living 4) it further develops concepts of arithmetic and algebraic operations. The course of geometry teaches the student how to think clearly. Geometry's practical value will be of use later, especially for those planning to pursue the professions of law, medicine, art, design, or any of a multitude of others. The habit of thinking properly can be acquired through geometry. Greater evaluation of what is read and more intelligent conversation can be acquired from the study of geometry. Logic is a by-product of geometry.

## APPLIED ALGEBRA II

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Prerequisite: | Algebra I \& Geometry; teacher |
| recommendation only |  |

This course will use algebra concepts applied to the everyday work force, with a concentration on the technical aspect of measurement.

## ALGEBRA II

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

This course will build off of the skills and applications of Algebra I. It is designed to help students build reasoning in mathematics. Algebra II will cover expressions and equations that include linear, quadratic, polynomial, and exponential functions. Students will build on their knowledge of graphically representing different contexts.

## PRE-CALCULUS

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

Pre-Calculus deals mainly with concepts that will be used in the study of college mathematics and/or calculus. Many of the Algebra II topics are studied in almost every chapter. Some of the new areas introduced include circular functions, trigonometry, application of trigonometry, sequences, series, limits, exponential and logarithmic functions, matrices, the conic sections, etc.

## CALCULUS

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

on the three main topics of limits, derivatives, and integration. We'll take all of the mathematics that have been taught so far and apply them to such applications as related rates, area and volume of curved shapes, and velocity and acceleration. We will explore such fun problems as how fast the radius is increasing when a pebble is dropped in a pool of water and the ripple expands out to the sides of the pool. It's a difficult but fun course.

## SENIOR MATH

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |

Senior math is a math course where we will explore the mathematics used in your daily life. Topics will include buying and financing a home or renting an apartment. Calculating income and doing taxes and working for an hourly wage or working on commission. Taking trips and recreational math like learning how to score bowling.

## MUSIC

## BAND

| Length: | One year |
| :--- | :--- |
| Credit: | 1.0 |
| Fee: | $\$ 10$ |

High School Band builds on the skills already learned in grade 5-8 band. This course is made up of three components: Marching Band, Concert Band, and Pep Band. Students will learn about and perform music of different genres, and time periods throughout the year. Students are required to attend Band Camp for one week in August to prepare for the fall marching season. Because this is a performing ensemble, students are required to attend all performances, including scheduled football and basketball games.

## BEGINNING GUITAR

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |

This course is an introduction to guitar playing. Students will learn basic fingering and notes, how to read music, basic chords, and information about the
guitar. Practice outside the school day is highly encouraged.

## GENERAL CHOIR <br> Length: <br> One year <br> Credit: 1.0

This class is available to all students who have a drive and passion for singing. You will learn the basics of sight-reading music and be expected to bring a high level of dedication to this group. This year long course will teach you the basics of music notation, understanding music styles and genres, and include mandatory performances throughout the year.

## JAZZ BAND <br> Length: One year Credit: $\quad 1.0$ <br> Prerequisite: Must have permission from director.

Jazz band is for students looking to expand their playing technique and study a different type of music. Jazz band musicians will learn different jazz styles and complex rhythm patterns. Students will be expected to perform at many different performances both during and outside of the school day throughout the year.

## LOCOMOTION

| Length: | One Year |
| :--- | :--- |
| Credit: | 1 |

Prerequisite: This is by tryout only.
Locomotion is our auditioned mixed show choir requiring an advanced level of vocal proficiency, dance technique and a vibrant performance personality. Successful students will be proficient in music theory, sight reading, ear training, and vocal technique. Students should be willing to make the commitment necessary to attend all performances, concerts, camps and rehearsals.

## MUSIC APPRECIATION

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |

This is a non-performance class that explores music of various styles through listening experiences. Students will have a basic understanding of music and to inspire an appreciation for music from a variety of genres and cultures

## THEATER EXPERIENCE

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Fee: | $\$ 10$ |

The purpose of this course is to provide the complete experience in theatre, what it takes to develop a show from first thought to the final strike. Activities will be designed so students can learn how to research, act, design, direct, etc. They will learn to explore the purpose of the show and the idea that desires to be expressed. The ultimate goal is to provide students with the complete guided experience of a theater production from beginning to end. Because Theater Experience is a class that works toward final productions, students must cooperatively work with others, be industrious, and be eager to be creative.

## PE \& HEALTH

## HEALTH

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |

Units of wellness, decision making in reference to drug, alcohol, and tobacco use, and their effects on each individual's quality of life, human sexuality, nutrition, and physical fitness. A textbook, notebook and audio visual aids are used to help in the instruction of healthy living.

## LIFELONG FITNESS/PE I

$\begin{array}{ll}\text { Length: } & \text { One semester } \\ \text { Credit: } & .25\end{array}$
This required course is designed to provide students with opportunities to develop knowledge, skills and necessary attitudes for a lifetime of personal fitness and activity. This class is conceptually based and promotes the development and maintenance of personal fitness and problem solving throughout life. Students will be expected to develop a physical activity program tailored to help them meet their own individualized fitness goals.

## LIEFLONG SPORTS/PE II

Length: One semester
Credit: . 25

Students will be introduced to various life time sports with the purpose of developing useful and desirable skills to serve as a basis for leisure-time activities. Students will practice developing analytical thinking and judgment through guided experiences in a wide variety of meaningful and challenging activities; a sense of individual responsibility for acceptable behavior involving life time activities; a realization of the importance of leisure time activities following graduation as a means of physical fitness in future years.

## NUTRITION

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Fee: | $\$ 10.00$ |

This course is designed to enable students to learn how to fuel their bodies and minds to function as optimally as possible. Students will study the science of food, exercise, and psychology in how they affect an individual's overall wellness. Students will conduct experiments and prepare foods throughout the duration of the course.

## SPORTS PERFORMANCE

Length: One Semester
Credit: . 5
Prerequisite: Should be in a sport
Students are expected to dress each day and bring a separate pair of athletic shoes. Students will learn basic strength training methods and work towards goals that were individually set at the beginning of the year while improving their overall physical fitness. Evaluation is based on class participation, attitude, proper attire and cooperation.

## SCIENCE

## SCIENCE 9

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Fee: | $\$ 7.00$ |

Science 9 is a freshmen level class required of all incoming freshmen. It is physical science, with ties to chemistry, physics and the universe. Topics covered in the course include: the study
of matter, atoms, bonding and the periodic table. Energy, waves, electricity, forces and motion and the history of the universe. This course will reinforce concepts learned earlier as well as introduce new topics.

## BIOLOGY

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Fee: | $\$ 15.00$ |

This course investigates the diversity, complexity and interconnectedness of life on Earth. Fundamental concepts of heredity and evolution provide a framework through inquiry-based instruction to explore the living world, the physical environment and the interactions within and between them. Students engage in investigations to understand and explain the behavior of living things in a variety of scenarios that incorporate scientific reasoning, analysis, communication skills and realworld applications.

## EARTH SCIENCE

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Open to: | 11th graders |

Earth Science is a science course designed for any student with an interest in geology. It is designed to study the following aspects of the earth: history, tectonics, the crust, erosion and weathering, landforms, rocks and minerals, and fossils. This class is activity and project oriented with written, video, and web based work.

## CHEMISTRY

Length: One Year
Credit: $\quad 1.0$
Fee: $\quad \$ 15.00$
Open To: 11 th and 12th graders
Chemistry is intended to help those students planning on furthering their education in the areas of science, medicine and engineering. It is also offered to those students with a strong interest in science. Topics will vary from the history of chemistry to the exploration and application of chemistry in the present and future. Laboratory procedures will be stressed as will lab safety.

## CP CHEMISTRY <br> Length: <br> One Year <br> Credit: $\quad 1.0$ <br> Fee: $\quad \$ 15.00$ <br> Open To: 11 th and 12 th graders

Chemistry is intended to help students planning on furthering their education in the areas of science, medicine and engineering. It is also offered to students with a strong interest in science. Topics will vary from the history of chemistry to the exploration and application of chemistry in the present and future. Advanced topics will be covered in this class as a preparation to college courses with a higher work load of lab reports. Laboratory procedures will be stressed as will lab safety.

## ELECTIVE COURSE OPTIONS

## ASTRONOMY <br> Length: One Semester <br> Credit: . 5

Astronomy is a science course that covers the different celestial bodies, space and the universe as a whole. Topics covered include: the history of astronomy, the Sun, Earth and Moon system, our solar system, galaxies, stars, the universe and space exploration. This class is a research and project-oriented class.

## ENVIRONMENTAL SCIENCE

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Length: One Semester
Credit: . 5
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Environmental Science is an elective course that will focus on pollution, environmental impact (soil and water quality and wildlife), as well as alternative energy sources. The units will address these topics through discussion of current environmental issues in the community and world. This semester course will include hands on projects, lab investigations, presentations, and quizzes to assess student learning.

## FORENSICS

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Fee: | $\$ 10.00$ |

Forensic science is a laboratory-based introduction to the analysis of crime scenes by collecting and analyzing physical evidence. This course is designed to integrate the core scientific disciplines while giving students both theory and hands-on experience with the skills and knowledge required for a forensic crime scene investigator. This
multidisciplinary approach will highlight topics in DNA, genetics, anatomy, chemistry, physics, entomology, botany, and investigative techniques with supplemental subject matter through case studies, earth science, mathematics, medicine, technology and sociology.

## FORENSICS II

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open to: | Must complete Forensics I |
| Fee: | $\$ 10.00$ |

Forensics II is laboratory-based class that will build on the topics introduced in forensics I. This course is designed to use the information gathered from forensics I and apply that to the science behind the job of a forensics crime scene investigator. This class will focus on the more in depth concepts in forensics such as DNA and genetics while building on the foundation that was set in forensics I. This is a multidisciplinary course that will use a range of science disciplines.

| HUMAN | ANATOMY |
| :--- | :--- |
| Length: | One Year |
| Credit: | 1.0 |
| Fee: | $\$ 20.00$ |
| Open To: | 12 th graders |

This course investigates the composition, diversity, complexity and interconnectedness of life on Earth. Fundamental concepts of heredity and evolution provide a framework through inquiry-based instruction to explore the living world, the physical environment and the interactions within and between them. Students engage in investigations to understand and explain the behavior of living things in a variety of scenarios that incorporate scientific reasoning, analysis, communication skills and realworld applications.

## PHYSICS

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Fee: | $\$ 10.00$ |
| Open To: | 12 th graders |

Physics is primarily concerned with observation and understanding of physical phenomena. Emphasis is placed on the student's ability to appreciate and understand fundamental physical principles and to apply those principles to everyday usage. Topics studied include force, motion, work, energy, heat, waves, electricity, magnetism, sound, light, nuclear physics and limited research into advanced concepts. Laboratory experiments are
scheduled on a regular basis and are designed to correlate with the classroom lectures, discussions and reading assignments. In some cases, juniors may be permitted to enroll in physics but only with permission from the instructor. It is also highly recommended that advanced math be taken concurrently with physics.

## ROBOTICS I

Length: One Year Credit: 0.5

Robotics focuses on learning computer code through the use of java language. After learning computer programming, students are required to build robots and program them to accomplish different tasks. This course will be an introduction to robotics including aspects such as autonomous robots, remote control robots, introduction to circuits, and problem solving.

## ROBOTICS II

Length: One Year (Two Class Block) Credit: 2.0
Fee: $\quad \$ 35.00$
Prerequisite: Robotics I
This course will build on knowledge gained from Robotics I and focus on more difficult tasks with autonomous and remote-controlled robots. This course will include a competition in Marion, Ohio called The National Robotics Challenge (NRC) and students will compete in several different events with other high school students nationwide and a few schools from other countries.

## ZOOLOGY

Length: Semester
Credit: 0.5
This semester long course will focus on zoology (the study of animals) while touching on ecology (the study of interactions between organisms and their environment) and paleontology (the study of fossils and early life forms). These variations of biology will come together for a deeper understanding of the animal kingdom. In addition to studying the structure and physiology of animals in all the major animal phyla, this course will examine how life forms have changed through time and how organisms interact in various ecological systems. There will be lab exercises, hands-on activities, and projects to assess mastery.

## SOCIAL STUDIES

## MODERN WORLD HISTORY <br> Length: One Year Credit 1.0

Global History emphasizes political economic, social, and cultural aspects of world development since 1750 . We will be developing research and study skills, map skills, as well as writing and critical thinking skills. Note taking is required.

## AMERICAN HISTORY <br> Length: Credit: $\quad 1.0$

This course will study American History in the realm of world events and will focus on the time beginning with the U.S. Industrial Revolution (1870s) through the Present. Class will involve reading, taking notes, multimedia projects, class discussions, and cooperative learning, in a way to engage students in multiple learning styles. The goal of this course is to grasp the underlying themes, understand the major events, describe the contributions of diverse groups, identify the important individuals, and analyze the major decisions of each era.

## GOVERNMENT

| Length: | One Year |
| :--- | :--- |
| Credit: | 1.0 |
| Prerequisites: | Global and Am. Hist. |

The American Government student should understand the United States government knowing the following things: the origins, structures, and functions of the governments; the rights and responsibilities included in the Constitution, and the people who are instrumental in government. The study of state and local government should be included in this course. The student should understand the structure and function of the state and city government and the importance of the state, county, and city government.

| AP GOVERNMENT |  |
| :--- | :--- |
| Length: | One Year |
| Credit: | 1.0 |
| Prerequisites: | Teacher signature |

This course is only offered if enough students sign up. This is a yearlong college level introductory course on United States Government and Politics designed for $11^{\text {th }}$ grade students or $12^{\text {th }}$ grade students interested in expanding their government knowledge. This course will focus on the Constitution, political beliefs and behaviors, political parties, interest groups, mass media, the Congress, the Presidency, bureaucracy, the federal judiciary, public policy, and civil rights and liberties. The course will be taught through the use of lecture and note taking, class discussion, intensive reading, group and individual projects, use of current events, political cartoons, and analyzing and interpreting data. Students will be encouraged to take the AP Exam which will be given later in the year.

## ELECTIVE COURSE OPTIONS

## DEBATE

$\begin{array}{ll}\text { Length: } & \text { One Semester } \\ \text { Credit: } & .5\end{array}$

In this class we'll discuss the origins of debate in history including the origins of political debate in the United States. Students will learn the rules and processes of argumentative debate and of using counter arguments in that context. Students will culminate the class in planning and carrying out a series of small debates and one large final debate. NOTE *Students must be willing to speak in front of a small group/in a classroom setting as classroom participation will be a requirement

## CURRENT EVENTS AND SOCIAL MEDIA

$\begin{array}{ll}\text { Length: } & \text { One Semester } \\ \text { Credit: } & .5\end{array}$

In a world where so much of our information comes through Social Media, how can you separate fact from fiction? We all know you can't believe everything you see on the internet, but the question then becomes, "What can you believe?" Students will look at current events of the day while also navigating the world of Social Media. Students will look at multiple
different news sources to analyze bias, misleading information, and various interpretations of information.

## PSYCHOLOGY

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open to: | 12 th graders |

Psychology is an elective for college prep seniors. The class will deal with the history of psychology and the different schools of thought on psychology. The students will conduct polls and surveys. The class will be involved in some basic experimental psychology.

## SOCIOLOGY

| Length: | One Semester |
| :--- | :--- |
| Credit: | .5 |
| Open to: | 12 th graders |

This course will discuss how the social world guides our actions and life choices and explain how society works. It will look at how people behave in groups, recurring patterns in human behavior, and researching and questioning assumptions people make by learning to question conventional wisdom. All areas and assignments are designed for college prep seniors.

## VOCATIONAL

## TRADE SKILLS I

Length: Semester (Two Class Block) Credit: 1.0
Fee: $\$ 20$
This course will focus on skills where students will use their hands. These skills will include: scaled drawing, carpentry, woodworking, electrical, and basic automotive care. This course will focus on work ethic and productivity through an environment geared toward learning to safely operate machines and work with their hands.

## TRADE SKILLS II

Length: One Year (Two Class Block)
Credit: 2.0
Fee: $\$ 20$
Open To: Students who successfully completed Trade Skills I

This course will focus on skills were students will use their hands. These skills will include: scaled drawing, carpentry, electrical, plumbing, metal work and basic automotive care. This course will focus on work ethic and productivity through an environment geared toward learning to safely operate machines and work with their hands.

