



Course of Study  
2023 – 2024

## BRADFORD HIGH SCHOOL

Dear Students and Parents:

Bradford High School, its faculty and administration, offers this Course of Study as a guideline to students and their parents in the selection of a sound educational program. Each year the counselor will arrange conferences with all students concerning their future vocational and educational plans. Course selections, which coincide with the student's future career plans, are made for the next school year during these conferences.

The Upper Valley Career Center is an extension of Bradford High School. Informative materials are readily available through the Guidance Office at Bradford High. We encourage all students to review the program of the vocational school and to give them serious consideration. We, at Bradford High School, hope that each student and parent will take the opportunity to thoroughly review this course of study and become familiar with the various course offerings and graduation requirements. The information in this course of study should provide a sound basis for proper counseling and program selection.

An outlined sheet is also furnished on which a complete high school plan can be outlined. This four-year organized approach should prove beneficial to the student. Parents and counselors should be consulted as this four-year plan is made. The best high school course is one planned before the students enter high school and developed as a comprehensive whole. It should meet the needs, interests, and the abilities of the student.

Due to the required early production date of this Course of Study, some of the course offerings listed in this booklet may be altered or dropped as deemed appropriate by the Junior High/High School Principal to best serve student needs and scheduling. In addition, fees may be adjusted to reflect price changes in workbooks or materials used for some courses.

Students and parents are encouraged to make the course selections carefully. If you have questions or concerns about the courses selected, please call the school for further information. Once the course selection sheets have been returned, the numbers of registrants will help determine the number of sections offered, and what periods of each day to offer the different classes. After the master schedule has been determined, it is very difficult to make changes in the student's schedules. Any consideration for a change in a student's schedule must meet the established criteria, which may be found in the student handbook.

Respectfully,

Chris Barr  
Principal

**BRADFORD EXEMPTED VILLAGE SCHOOL DISTRICT POLICY NO. 5460  
GRADUATION REQUIREMENTS**

Purpose It shall be the policy of the Board of Education to acknowledge each student's completion of the instructional program appropriate to the achievement of District goals and objectives as well as personal proficiency by the awarding of a diploma at fitting graduation ceremonies.

The Board shall award a regular high school diploma to every student enrolled in this District who meets the requirements of graduation established by this Board or who properly completes the goals and objectives specified in his or her individual education program (I.E.P.) including either the exemption from or the requirement to complete the achievement tests as required by the State Board of Education in order to graduate. Each student must also demonstrate, unless exempted, at least a proficient level of skill on the achievement tests required by the State Board to graduate.

The requirements for graduation from high school include earning twenty-three (23) units of credit in grades nine through twelve. Credit may be earned at an accredited post-secondary institution. The high school may permit students below the ninth grade to take advanced work for credit. This work shall count as graduation requirements if it was both:

- A. taught by a person who possesses a license/certificate issued under State law that is valid for teaching high school;
- B. designated by the Board as meeting the high school curriculum requirements.

An honors diploma shall be awarded to any student who meets the Board established requirements for graduation or requirements of an I.E.P, attained the scores on the State tests designated by the State Board of Education, and meet any criteria the State Board may establish. Commencement exercises will include only those students who have successfully completed requirements for graduation as certified by the high school principal. No student who has completed the requirements for graduation shall be denied a diploma as a disciplinary measure. A student may be denied participation in the ceremony of graduation when personal conduct so warrants.

Authority The current state graduation/course requirements are in the following pages for the Classes of 2023 and beyond

**Complete courses and requirements for students in the Classes of 2023 and beyond**

**Credits:**

<b>Courses</b>	<b>State Minimum</b>
English language arts	4 credits
Health	½ credit
Mathematics	4 credits(1)
Physical education	½ credit(2)
Science	3 credits(3)
Social studies	3 credits(4)

## Other Requirements

Students must receive instruction in economics<sup>(6)</sup> and financial literacy<sup>(6)</sup> (in high school) and complete at least two semesters of fine arts<sup>(5)</sup> (during grades 7-12).

**1 Mathematics** – Students must earn 4 mathematics units, which must include one unit of algebra II or the equivalent of algebra II. Exceptions: Algebra II or advanced computer science is not a requirement for students following a [career-technical pathway](#). However, students still must have four units in mathematics. A student may choose to apply one unit of advanced computer science to satisfy one unit of algebra II/math III or equivalent. Districts also may use credit in a computer science course approved by the Department to satisfy a student's mathematics credit. Here is a link to the [Computer Science Guidance Document](#).

**Notes:** [Curriculum Choice](#) expired with the class of 2019 and is no longer an available option for students. Postsecondary institutions may require algebra II, or its equivalent, for college admission.

**2 Physical education** – School districts may adopt policies that would exempt students who participate in interscholastic athletics, marching band or cheerleading for two full seasons or an approved Junior Reserve Officer Training Corps (JROTC) program for two years from the physical education requirement. Starting with the 2019-2020 school year, districts may include show choir as a permissible activity as part of the PE Waiver policy. Students satisfying the physical education waiver must take another course of study of at least 60 hours of instruction (1/2 unit).

**3 Science** – Science units must include one unit of physical sciences, one unit of life sciences and one unit of advanced study in one or more of the following sciences: chemistry, physics or other physical science; advanced biology or other life science; astronomy, physical geology or other earth or space science. A student can choose to apply one credit in advanced computer science to satisfy one unit of advanced science (excluding biology or life sciences). Here is a link to the [Computer Science Guidance Document](#).

**4 Social studies** – Students must include ½ unit of American history, ½ unit of American government, and ½ unit in world history and civilizations (for students in the classes of 2021 and beyond) in the three required social studies units.

**5 Elective credits** – Elective units must include one or any combination of world language, fine arts, business, career-technical education, family and consumer sciences, technology, agricultural education or English language arts, mathematics, science or social studies courses not otherwise required.

**Note:** While not a state requirement for graduation, many four-year colleges and universities require a minimum of two years of sequential world language study at the secondary level as a college admissions requirement. This is the case for many in-state and out-of-state colleges and universities.

**6 Financial Literacy** – Ohio law requires students to receive instruction in financial literacy as part of the high school graduation requirements. However, it is up to local districts to determine how to best meet the needs of their students. For example, the financial literacy content may be incorporated into another course, or some districts may require students to take a standalone financial literacy course for a half credit that can meet either a graduation requirement for social studies or an elective.

## Show Competency:

Earn a passing score on Ohio's high school Alg. 1 and English 2 tests. Students who do not pass the test will be offered additional support and must retake the test at least once. After you have taken your tests, there are three additional ways to show competency.

- 1. Demonstrate 2 career-focused activities:**
  - Foundational:** Proficient scores on WebXams, a 12-point industry credential, a pre-apprenticeship program.
  - Supporting:** work-based learning, earn the required scores on WorkKeys, earn the OhioMeansJobs Readiness Seal.
- 2. Enlist in the Military:** Show evidence that you have signed a contract to enter a branch of the US armed services upon graduation.
- 3. Complete College Coursework:** Earn credit for one college-level math and/or college-level English course through Ohio's free College Credit Plus program.

## Show Readiness:

Earn 2 of the following diploma seals, choosing those that line up with your goals and interests. These seals give you the chance to demonstrate academic, technical and professional skills and knowledge that align to your passions, interests and planned next steps after high school.

At least 1 of the 2 must be Ohio-designed:

OhioMeansJobs Readiness Seal (Ohio)  
Industry-Recognized Credential Seal (Ohio)  
College-Ready Seal (Ohio)  
Military Enlistment Seal (Ohio)  
Citizenship Seal (Ohio)  
Science Seal (Ohio)  
Honors Diploma Seal (Ohio)  
Seal of Biliteracy (Ohio)  
Technology Seal (Ohio)  
Community Service Seal (Local)  
Fine and Performing Arts Seal (Local)  
Student Engagement Seal (Local)

## Local Seals Definitions:

### Community Service Seal:

A student must complete and document 40 hours . All community service activities that are documented need to be approved by administration/school counselors prior to completion of hours. School sponsored community service activities do not need pre-approval. All community service hours must have a supervisor signature verifying the time served.

**Fine and Performing Arts Seal:** A student must complete two full credits of fine arts in grades 9-12. Fine Arts credits include: Band, and visual arts courses.

**Student Engagement Seal:** A student is an active participant (as reported by the advisor) in a school sponsored group or club for two years. Which includes: athletics, powerlifting, marching band, cheerleading, pep band, National Honor Society, class officers, student council, Spanish club, FFA, Skills USA, FCCLA and any other club formed and approved by administration.

Bradford HS will accept all completed seals from other school districts for any transfer student coming to Bradford High School.

More information about Ohio graduation requirements can be found at:

<https://education.ohio.gov/Topics/Ohio-s-Graduation-Requirements>

**Comparison of Diplomas with Honors Criteria**  
*Students need to fulfill all but one of the applicable criteria for the Diploma with Honors.*

Subject	International Baccalaureate Diploma with Honors for Classes of 2012 and Beyond ***	Academic Diploma with Honors for Classes 2011 and Beyond	Career-Technical Diploma with Honors for Classes 2012 and Beyond
<b>English</b>	4 units, plus the two required International Baccalaureate essays	4 units	4 units
<b>Mathematics</b>	4 units, including Algebra I, Geometry, Algebra II or the equivalent and another higher level course or a four-year sequence of courses that contain equivalent content	4 units, including Algebra I, Geometry, Algebra II or the equivalent and another higher level course or a four-year sequence of courses that contain equivalent content	4 units, including Algebra I, Geometry, Algebra II or the equivalent and another higher level course or a four-year sequence of courses that contain equivalent content
<b>Science</b>	4 units including biology, chemistry and at least one additional advanced science ****	4 units, including physics and chemistry	4 units, including two units of advanced science ****
<b>Social Studies</b>	4 units	4 units	4 units
<b>Foreign Language</b>	4 units minimum, including at least 2 units in each language studied	3 units (must include no less than 2 units for which credit is sought), i.e., 3 units of one language or 2 units each of two languages	N/A
<b>Fine Arts</b>	1 unit	1 unit	N/A
<b>Electives</b>	N/A	N/A	4 units of Career-Technical minimum. Program must lead to an industry recognized credential, apprenticeship, or be part of an articulated career pathway which can lead to post secondary credit
<b>Grade Point Average</b>	3.5 on a 4.0 scale	3.5 on a 4.0 scale	3.5 on a 4.0 scale
<b>ACT/SAT Score [excluding scores from the writing sections]*</b>	27 ACT / 1210 SAT	27 ACT / 1210 SAT	27 ACT / 1210 SAT
<b>Additional Assessment</b>	<b>Must complete criterion-referenced assessments in a minimum of six academic disciplines</b>	N/A	Achieve proficiency benchmark established for appropriate Ohio Career-Technical Competency Assessment or equivalent

Diploma with Honors requirements pre-suppose the completion of all high school diploma requirements in the Ohio Revised Code including: ½ unit physical education\*\*, ½ unit health, ½ unit in American history, ½ unit in government

\* Writing sections of either standardized test should not be included in the calculation of this score.

\*\* SB 311 allows school districts to adopt a policy exempting students who participate in interscholastic athletics, marching band or cheerleading for two full seasons or two years of JROTC from the physical education requirement.

\*\*\* The International Baccalaureate track to the Honors Diploma requires full completion of all requirements for an IB Diploma Programme including the Theory of Knowledge Course in meta-cognition, the Extended Essay project and the 150 hour Creativity, Action and Service (Service-Learning) requirement. Note: The International Baccalaureate Certificate Program does not qualify for this track to the Diploma with Honors.

\*\*\*\* Advanced science refers to courses in the Ohio Core that are inquiry-based with laboratory experiences and align with the 11/12<sup>th</sup> grade standards (or above) or with an AP science course, or with the new high school syllabi, or with an entry-level college course (clearly preparing students for a college freshman-level science class, such as anatomy, botany, or astronomy), or contain material above the current OGT level.

### **COLLEGE CREDIT PLUS (CCP)**

Ohio's new College Credit Plus can help you earn college and high school credits at the same time by taking college courses from community colleges or universities. The purpose of this program is to promote rigorous academic pursuits and to provide a wide variety of options to college-ready students. Taking a college course from a public college or university College Credit Plus is free. That means no cost for tuition, books or fees. If you choose to attend a private college or university, you may have limited costs. Your high school may have an agreement with a local college for specific courses, however, you can choose to take College Credit Plus courses from any college that offers a course that would benefit your future. This could include online courses.

### **FOREIGN EXCHANGE STUDENTS**

All exchange students accepted as part of fall registration at Bradford High School will be assigned to the 11<sup>th</sup> grade. This placement may be altered if there is clear evidence from the transcript and the age of the student that another grade is the more appropriate placement for the student. Then a student may be listed as either a 10<sup>th</sup> or 11<sup>th</sup> grader. Exchange students will be routinely assigned to 11<sup>th</sup> grade classes to give them better exposure to American culture. They will be assigned to general English instead of CP English. In addition, they will be required to take US History. This may be altered in accordance with the student's transcript or from evidence from the student's abilities in class. Exchange students will take any testing required by the state of Ohio. Exchange students will not be allowed to graduate from Bradford High School. We will not allow exchange students to participate in commencement ceremonies due to the restrictions of Policy #5460. We will recognize exchange students at the spring academic awards night and give them a certificate of attendance.

### **WORK STUDY PROGRAM**

The work study program enables students identified with a disability to gain valuable work experience and earn high school credit towards graduation. The program is based on belief that people with disabilities can successfully obtain and maintain employment. Employment may be obtained by the student or in collaboration with the ESC. Students are responsible for providing a copy of all pay stubs and will be evaluated quarterly based on an employer evaluation and grading rubric. Juniors and seniors may be released from school for a partial or entire day. 360 documented work hours equals 1 high school credit. Partial day students must work a minimum of 20 hours per week; a total of 720 hours for the entire year for 2 high school credits. Students may be placed in a working position at Bradford Schools.

<b>Bradford High School Course</b>	<b>Dept</b>	<b>Section</b>	<b>Hours</b>	<b>University/College Courses</b>
<b>Pathway 1</b>				
				<b>Sinclair Community College</b>
Spanish 3	FLA	101	3	Foreign Language Studies 1: Spanish*
				<b>Urbana University</b>
CP English 11	ENG	102	3	Basics of Composition
Computer Applications	COS	101	3	Intro. to Computers
Personal Finance	FIN	216	3	Personal Finance
Chemistry	CHE	216	4	General Chemistry 1**
Algebra 2	MAT	106	3	Intermediate Algebra
			16	
<b>Pathway 2</b>				
				<b>Urbana University</b>
Pre-Calculus	MAT	220	4	Pre-Calculus
Chemistry	CHE	216	4	General Chemistry 1**
Physics	PHY	202	4	General Physics 1**
CP English 12	ENG	106	3	Intermediate of Composition
			31	
<b>Additional course offerings</b>				
				<b>Urbana University</b>
Statistics	MAT	226	3	Elem. Mathematical Statistics
Calculus	MAT	241	4	Calculus & Analytical Geometry
Anatomy & Physiology	BIO	251	4	Anatomy & Physiology**
Accounting	ACT	221	3	Principals of Accounting
				<b>Wright States University</b>
Nutrition Genetics & Disease	BIO	1120	4	Cells and Genes**
				<b>Sinclair Community College</b>
Spanish 4	FLA	102	3	Foreign Language Studies II: Spanish*
* Articulation credit (testing out)				
** Offered every other year				
Does not include Edison CC on campus/online classes that could be attended				

### **EARLY GRADUATION (Policy 5464)**

A student will be eligible for early graduation after successful completion of all local and state requirements. To qualify for early graduation, a student must:

1. Arrange a conference with the guidance counselor to discuss the probability of early graduation.
2. Complete the Early Graduation Request Form (5464 F1), which is available in the guidance office.
3. Submit the completed request form to the guidance Office and arrange a conference between the student, parents and principal to finalize the tentative plans.
4. The counselor and principal will meet to review the early graduation request and make a recommendation to the superintendent, who will make the final decision.



A student will be eligible to participate in the next scheduled commencement and Baccalaureate Services after successful completion of the local and State requirements. A student will receive his/her diploma at that time or may choose to receive it by mail. Those receiving it by mail will forfeit the right to participate in commencement, Baccalaureate Services and other senior activities. However, they will be eligible to apply for local scholarships. Students graduating early will be ranked in the class next scheduled for graduation after their successful completion of local and state requirements. However, a student must be in high school four (4) complete years to be eligible for Valedictorian or Salutatorian honors.

### **ADMISSION TO COLLEGE OR TECHNICAL SCHOOL**

In today's society, some kind of advanced training is required past high school or vocational (UVCC) school if our graduates are going to be in a position to compete with other graduates throughout the state and the country.

Many of Ohio Colleges are placing conditions on students who have not completed a college preparation program. These conditions may cost students' and parents' time and money by the student having to enroll in non-credit or remedial courses before being admitted to the college program.

As freshman in high school, some students are not ready to make the decision between a college prep program and a vocational career center program. The advice offered to students is to become as prepared as possible by taking courses preparing one for college. That way when the student is ready to make a decision about college, technical school, or even career center, the student will be in a position to have the option of choosing any one of these, rather than not having the academic background to choose anything except vocational preparatory training.

### **MANY COLLEGES ARE NOW REQUIRING THE FOLLOWING FOR UNCONDITIONAL ENROLLMENT:**

- 4 units of English with an emphasis on Writing
- 4 units of Mathematics including Algebra 1, Algebra 2, and Geometry
- 3 units of Science
- 3 units of Social Studies
- 2 units of Foreign Language
- 1 unit of Fine Arts (Art, Band, or Chorus)

### **SPECIAL EDUCATION**

This program is designed for students with an identified disability or handicap who have an Individual Education Plan (IEP). Curriculum is adjusted according to a student's disability and/or handicap. Adjusted Curriculum differs from all other secondary programs. It is vocationally and academically inclined, as well as being an enrichment program.

Adjusted curriculum picks up a student at his/her level and lifts him/her academically as high as he/she can go. This helps the students have personal pride and responsibility in work. When students graduate, they know that they are capable of self-support and have personal pride in being responsible and independent citizens.

If a student is placed in a resource room, instruction is individualized and concentrates on improving the student's basic skills. Small group instruction may also be a learning tool. Reading materials used are more appropriate for individual reading skills and there is the advantage of more individual attention than can be provided in the regular classroom. The aim of each course is to develop the students to the highest possible levels academically, socially, and physically. Individual

and small group instruction is used to teach toward objectives determined by both the teacher and parents through the IEP process.

### **OTHER EDUCATIONAL OPTIONS**

Students have several options to earn credits other than the traditional classroom experience. Students may take a class offered at another facility in real time, through the use of this equipment. Availability and times of classes will be made known to students before the beginning of the next school year.

Students also have opportunity to make up failed courses through the use of correspondence courses and internet courses. All expenses for both correspondence courses and internet courses will be the responsibility of the student/parent and the courses must be applied for through and pre-approved by the Guidance office and/or administration.

Credit Flexibility Plans (CFP) is educational experiences where the primary acquisition of knowledge and skills takes place outside of Bradford High School's classrooms. These opportunities may include but not be limited to: independent study, private instruction, performing groups, internships, community service, apprenticeship, work study, and online courses (Guidance counselor/administration approval). Bradford Schools are not responsible for any cost incurred from a student's participation in a CFP beginning with the 2010-2011 school year. Students are required to have prior approval for the CFP before the experience is initiated. A team of subject related school personnel, by appointment of the principal or his/her designee, will comprise a review panel. Their role will be to approve and set expectations utilizing the CFP Review Panel Assessment Report. At the conclusion of the experience mastery of learning objectives must be demonstrated as defined by the approved CFP. Summer school classes are also offered by several school districts in the area.

### **SCHEDULING FOR 2023-2024**

Students attending Bradford Junior/Senior High School must enroll in a minimum of 7 periods of class for credit.

Grade level classification of students shall be based upon the following earned credits:

- Sophomore – 5.5 or more earned credits
- Junior – 11 or more earned credits
- Senior – 16.5 or more earned credits

The first part of this course catalog gives important information on course requirements. Be sure to read over that information before completing the registration form on the next page. Students will consult with the counselor, teachers, parents, general requirements for college admission and the curriculum and the course descriptions listed below in making their course selections.

Check your transcript to make certain you have taken and received credit for all classes required in previous years and the prerequisites for classes you plan to take next year.

If you have any questions, meet with the Guidance Counselor to help select the courses you wish to take next year. Be sure you have selected a minimum of 7 class periods. Return the completed course request forms with all required signatures to the guidance office by the scheduled deadline.

Once a student have completed and submitted his/her registration form, the schedule will be considered set. Changes will only be made in the case of an error in scheduling, the lack of a prerequisite, or to change to a more rigorous or appropriate class as approved by the administration.

## AGRICULTURE AND ENVIRONMENTAL SYSTEMS

### Career Connections in Agriculture and STEM 1 Semester 7<sup>th</sup> Required

This course will introduce students to fundamental engineering concepts and scientific principles associated with agricultural engineering design applications. Students in the course will acquire knowledge and skills in problem solving, teamwork and innovation. Students explore Agriculture and STEM careers as they participate in a project-based learning process, designed to challenge and engage the natural curiosity and imagination of middle school students. Career exploration strategies are opportunities for students to discover work environments and understand the various aspects of the workplace. Strategies include tools and instruments that help students understand and appreciate their strengths and interests.

### STEM Concepts in Agriculture, Food and Natural Resources 1 Semester 8<sup>th</sup> Required

This course will introduce students to fundamental engineering concepts and scientific principles associated with agricultural engineering design applications. Students will be able to demonstrate a broad array of technical skills with an emphasis given to quality practices, measurement, maintenance and safety. Students explore Agriculture and STEM as they participate in a project-based learning process, designed to challenge and engage the natural curiosity and imagination of middle school students. Career exploration strategies are opportunities for students to discover work environments and understand the various aspects of the workplace. Strategies include tools and instruments that help students understand and appreciate their strengths and interests.

### Agriculture, Food and Natural Resources Full Year 9-12 Elective

This first course in the career field is an introduction to Agricultural and Environmental Systems. Students will be introduced to the scope of the Agricultural and Environmental Systems career field. They will examine principles of food science, natural resource management, animal science & management, plant & horticultural science, power technology and bioscience. Students will examine the FFA organization and Supervised Agricultural Experience programs. Throughout the course, students will develop communication, leadership and business skills essential to the agriculture industry. Successfully completing AFNR and Animal and Plant Science can count for an Advanced Science - Ag Science credit. Course Fee and FFA Dues

### Animal and Plant Science Full year 10-12 Elective

This is the second course in the agriculture field. Students will apply knowledge of animal and plant science to the agriculture industry. They will be introduced to the value of production animals relative to the agricultural marketplace. Students will engage in animal classification and selection, body systems, along with animal welfare and behavior in relation to the production of animals. Students will learn principles of plant anatomy and physiology, and the role of nutrition, deficiencies and growing environment on plant production. Throughout the course, business principles and professional skills will be examined. Students will examine the FFA organization and supervised agricultural experience programs. AFNR is a prerequisite or instructor approval is needed. Successfully completing AFNR and Animal and Plant Science can count for an Advanced Science - Ag Science credit. Course Fee and FFA Dues

### Science & Technology of Food Full year 10-12 Elective

Students will examine the research, marketing, processing and packaging techniques applied to the development of food products. Learners will examine nutrient content and their chemical makeup, while applying principles of chemistry to the development of food products. They will examine and implement food safety, sanitation, and quality assurance protocols. Government regulations and food legislation will be examined and the implications to food science and technology will be

identified. Prerequisite: Agriculture, Food and Natural Resources (AFNR) and Animal and Plant Science or instructor approval is needed. Course Fee and FFA Dues

Business Management for Agricultural & Environmental Systems Full Year 11-12 Elective

This is the third course in the agriculture field. Students will examine elements of business, identify organizational structures and apply management skills while developing business plans, financial reports and strategic goals for new ventures or existing businesses. Learners will use marketing concepts to evaluate the marketing environment and develop a marketing plan with marketing channels, product approaches, promotion and pricing strategies. Throughout the course, students will apply concepts of ethics and professionalism while implications of business regulations will be identified. Students will examine the FFA organization and supervised agricultural experience programs. AFNR is a prerequisite or instructor approval is needed. Prerequisite: Agriculture, Food and Natural Resources (AFNR) and Animal and Plant Science or instructor approval is needed. Course Fee and FFA Dues **This class will be provided every other year.**

Mechanical Principles Full Year 11-12 Elective

Students will engage in the mechanical principles utilized in animal and plant production systems. They will learn electrical theory, design, wiring, hydraulic and pneumatic theory, along with metallurgy in relation to hot and cold metals. Students will apply knowledge of sheet metal fabrication applicable to the agricultural industry along with identify, diagnose, and maintain small air-cooled engines. Throughout the course, students will learn critical components of site and personal safety as well as communication and leadership skills. Students will examine the FFA organization and Supervised Agricultural Experience programs. Prerequisite: Agriculture, Food and Natural Resources (AFNR) and Animal and Plant Science or instructor approval is needed. Course Fee and FFA Dues **This class will be provided every other year.**

Agricultural and Environmental Systems Capstone Full Year 12 Elective  
(Co-op/Job Placement opportunity)

Students apply Agricultural and Environmental Systems program knowledge and skills in a more comprehensive and authentic way. Capstones are project/problem-based learning opportunities that occur both in and away from school. Under supervision of the school and through partnerships, students combine classroom learning with work experience to benefit themselves and others. These can take the form of mentorship employment, cooperative education, apprenticeships and internships. Instructor approval is needed. Course fee and FFA dues.

**ART**

6th grade Art Semester 6th grade

A study of the knowledge, skills and processes for observing, creating, responding and communicating in ways that are unique to visual art. Art production and the construction of meaning in visual artworks are complementary learning activities. Fee

8<sup>th</sup> grade Art Semester 8th grade

Students will recognize and demonstrate the fundamentals of drawing and water coloring. Drawing will include shading/gradation scale, perspective, proportion, illusion, and the fundamental use of this media. Students may also complete independent projects. Fee

Art 1 1 Credit – Full Year 9-12 Elective

Students will recognize and demonstrate the fundamentals of 2-dimensional design. 2-dimensional design will include principles of design: line, shape, balance, texture, and form. One 8 ½ x 11 sketchbook is required. Fee

Art 2 1 Credit – Full Year 10-12 Elective

Students will recognize and demonstrate the intermediate foundations of 2-dimensional and 3-dimensional design. 2-dimensional design will include the knowledge of the principles of design, incorporated with personal relevance. Students will complete independent projects. One 8 ½ x 11 sketchbook is required. Fee Prerequisite: Art 1 Teacher Approval Only

Art 3(CCP) 1 Credit – Full Year 11-12 Elective

Students will recognize and demonstrate the advanced foundation of 2-dimensional and 3-dimensional design, and gain historical knowledge of an artist. 2-dimensional design will include advanced concentration of the principles of design using a variety of media. Students will complete independent projects. One 8 ½ x 11 sketchbook is required. Fee Prerequisite: Art 2 Teacher Approval Only

Art 4(CCP) 1 Credit – Full Year 10-12 Elective

This course is an independent Study in Art. A variety of media and techniques will be addressed. Fee Prerequisite: Art 3 Teacher Approval Only

Studio Art (CCP) 1 Credit – Full Year 10-12 Elective

This course is an independent Study in Art. A variety of media and techniques will be addressed. Fee Prerequisite: Art 1

3-Dimensional Art ½ Credit – Semester 9-12 Elective

Students will study various media such as architecture, clay, metal, wood, stone, and wire and various processes such as casting and modeling are investigated as means for creating three-dimensional artistic forms. Fee Teacher Approval Only

Digital Photography I ½ Credit – Semester 10-12 Elective

In this semester course students will study the basics of digital photography. This class is structured around projects emphasizing photographic elements and introduces the students to the principles of contemporary media in today's society. Fee Prerequisite: Students must provide their own digital camera and memory card/USB drive. Art 1 Teacher Approval Only

Digital Photography II ½ Credit – Semester 10-12 Elective

In this semester course students will be working more with GIMP software to produce unique projects. Focus more on photography as a career and to improve on what was taught in DPI. Fee Prerequisite: Students must provide their own digital camera and memory card/USB drive. Art 1 Teacher Approval Only

Trends in Art ½ Credit – Semester 10-12 Elective

Students will be studying and trends in the art of scrapbooking, artistic journals and altered books. These techniques will then be applied to the students own books. Fee Prerequisite: Art 1 Teacher Approval only

## **BUSINESS EDUCATION**

6<sup>th</sup> Grade Computer Apps Semester 6th grade

6<sup>th</sup> Grade students will learn basic research skills for the internet. Students will learn the basics for Google Docs and Slides. Students will learn how to set up their Google Drive.

7<sup>th</sup> Grade Computer Apps Semester 7th grade

7<sup>th</sup> grade students will continue their research skills. And also, learn library skills. Students will learn the basics for Google Sheets. Students will learn more advanced skills for Google Docs and Slides.

8th Grade Computer Apps Semester 8th grade  
8th grade students will learn more advanced skills for Google Sheets. Students will complete more advanced classwork and independent projects on Google Docs, Google Sheets and Google Slides.

Computer Applications: Working Tools ½ Credit – Semester 9-12 Elective  
Students learned the basics for Google Docs and Sheets in 7<sup>th</sup> grade. Now, in high school, they will learn more advanced aspects of Google Docs and Sheets. Additional areas to be covered shall include computer ethics, copyright laws, as well as careers in technology-related fields. Appropriate use of the internet shall be required. Fee

Computer Application: Creative Tools ½ Credit – Semester 9-12 Elective  
Students learned the basics for Google Presentations in 7<sup>th</sup> grade. Now, in high school, they will learn more advanced aspects of Google Presentations. We will use research methods to find free online websites that will hone their skills in desktop publishing and presentations.

Business Law ½ Credit – Semester 10-12 Elective  
This course relates business law to everyday student and consumer situations. Learn important and useful information about contracts, liability, purchases and much more. Fee

Accounting 1 (CCP) 1 Credit – Full Year 10-12 Elective  
The purpose of this course is to develop the background and skill in basic accounting principles to keep accurate business or personal records and to provide an introduction to those students who might be interested in a business-related field for college. It is recommended that the student be of average ability (at least) in a basic math background. Students planning to study accounting in college should take Accounting 1 and Accounting 2. Fee

Accounting 2 1 Credit – Full Year 11-12 Elective  
The purpose of this course is to develop additional and more advanced skills in accounting procedures and systems. Accounting 2 increases the skill of those seeking employment in the accounting field upon graduation, using it for personal use, or for those planning on further study in accounting or business administration. Students learn computerized accounting during the second half of the year. Fee

Introduction to Business 1 Credit – Full Year 9-12 Elective  
Introduction to Business students will learn many financial concepts that will be useful in their everyday living. Topics, such as: banking, insurance, money management, goal setting, decision making, and preparing for their career will be covered, not to mention all other aspects of business. This class is highly recommended for any student who has an interest in the business field or plans to be a business major in college. Fee.

Business Math (CCP) 1 Credit - Full Year 10-12 Elective  
Elective Designed for students who need an understanding of mathematical processes in business and finance. Course emphasizes the use of math in business applications. Topics include the use of mathematics in calculating compound interest, present values, future values, annuities and amortizations. **Prerequisite:** [MTH 093D](#) or satisfactory score on math assessment test.

Personal Financial Management (CCP) 1/2 Credit – 1 semester 10-12 Required  
Through classroom activities and projects, students will learn the problem solving process and how to apply it when making decisions. The course will provide students with an in depth understanding of the concepts and principles involved in managing one's personal finances and becoming a savvy consumer. Topics covered will include establishment of financial goals, income and expenses, budgeting, investing, using credit wisely, financial institutions and services, identity theft and fraud, insurance and taxes. Fee. Fulfills Financial Literacy requirement.

Yearbook 1 Credit – Full Year 10-12 Elective

The school yearbook will be published in this class. This class is highly recommended for students with exceptional writing and organizational skills, artistic know how, and the overall ability to meet all of the class standards and requirements. Enrollment is limited and must be prearranged.

Publications 1 1 Credit – Full Year 10-12 Elective

Students will be able to use a variety of strategies and tools to create a school newspaper and a community newsletter. Students will be able to use a variety of strategies and tools to create weekly announcements for the district. Students will be able to use a variety of strategies and tools to create month bulletin boards for the high school wing. Students will focus on in-depth composing and critiquing of news stories; produce a news show. Students will express themselves in the creative aspects of talent; in duties of a general director, technical writer, script writer, videographer, graphics operator, and audio operator. Students will be expected to demonstrate proficiency in the operation of remote equipment to create and edit a finished product. The school yearbook will be published in this class. Students must possess exceptional writing and organizational skills, artistic know how, and the overall ability to meet all of the class standards and requirements. **Students must submit an application and have an interview prior to being accepted into this class.**

Career Planning Semester 9-12 Elective

Students will learn various techniques on how to take notes, study and take tests, research and how learn and study to their own individual learning modalities. In addition, students will assess career plans, manage job searches then create and present a presentation on a career that they assessed high on their career assessment survey.

Digital Marketing ½ Credit 10-12 Elective

Students find out what it takes to market a product or service in today's fast-paced business environment. They learn the fundamentals of marketing using real-world business examples. They learn about buyer behavior, marketing research principles, demand analysis, distribution, financing, pricing, and product management. Examples of activities include: making commercials, virtual tours, photo editing, creating brochures/flyers.

Technology 1019(Computers) 1 Credit 9/10 Grade Required

Students will cover a variety of topics, including but not limited to, coding, computer animation, website development, etc. Students will be applying technology tools and processes in real-world situations to effectively design solutions, solve problems and accomplish goals. Students will also gain knowledge of critical analysis of the impact of technology development and use, including ethical, legal and global impacts. Successful completion of this class will allow a student to earn a state Technology Seal.

Business in Sports 1 Credit 9-12 Elective

This course introduces students to the fundamentals and skills in business activities within the field of athletics including business processes, economics, business relationships and business ethics/issues in sports. Students will use technology to synthesize and share business information. Employability skills, leadership, communications, and financial literacy will also be addressed.

Lifeskills 1 Credit (HS) 7-12 Grade Elective

This course is designed to increase student knowledge and skills necessary for everyday living. The course emphasizes goal-setting, decision making and problem solving, communication, healthy lifestyles and relationships, nutrition, personal safety, citizenship and consumerism. Teacher approval is required.

### **ENGLISH**

Study Skills 6th Semester 6th Grade Elective

Students will learn various techniques on how to take notes, study and take tests, research and how to learn and study to their own individual learning modalities. In addition, students will work on reinforcing basic skills for their core classes.

Language Arts 6 Full Year 6th Grade Required

Students will cover various types of writing forms: narratives, responses to literature, letters, informal reports and persuasive strategies for multiple purposes. There will be a concentration on the writing process, writing application, writing conventions, research and oral/visual communications. Fee

Creative Exploration 7th ½ Year 7th Grade Required

Topics that can be covered: Study Skills, Creative writing, perfect their research and writing skills; recognize context clues while reading; base explorations based on students' interests: write small essays, create newsletter, create Google Slides; Film & Lit; create plays and act out those plays, recognize different techniques and identify strengths and weaknesses of information to make intelligent choices.

Reading 6 Full Year 6th Grade Required

Students will use various forms of literature to improve their reading comprehension skills. Processes that will be used are: acquisition of vocabulary, reading processes, reading applications, in context to: informal, technical, persuasive, and literary texts. Group participation, oral participation and some written expression are required.

Language Arts 7 Full Year 7th Grade Required

Students will write regularly in a variety of genres and for various purposes. There will be a concentration on the writing process, writing application, writing conventions, research, and oral and visual communications.

Reading 7 Full Year 7th Grade Required

Students will take part in a thematic approach to reading and literature. There will be a concentration of acquisition of vocabulary, reading process: concepts of print, comprehension strategies and self-monitoring strategies, reading applications: informational, technical and persuasive text, and reading applications: literary text. Group participation, oral participation and some written expression is required.

Language Arts 8 Full Year 8th Grade Required

Students will write regularly in a variety of genres and for various purposes. They will develop their competency in drafting, revising, and editing their own work. Further, students will critically read their own work and other's work to gain knowledge about what makes good writing. There will be a concentration on the writing process, writing application, writing conventions, research and oral and visual communications.



Reading 8 Full Year 8th Grade Required

Students will take part in a thematic approach to reading and literature. There will be a concentration of acquisition of vocabulary, reading process: concepts of print, comprehension strategies and self-monitoring strategies, reading applications: informational, technical and persuasive text, and reading applications: literary text.

Group participation, oral participation and some written expression is required.

English 9 1 Credit – Full Year 9th Grade Required

Freshman English is a required course in the core curriculum at Bradford High School. This entry level high school language arts offering is intended to expand and embellish the skills of students in writing, reading, grammar, and vocabulary. Through a wide variety of anthology, adolescent, and classic reading selections, along with a mix of choice outside reading, the course explores thematic units emphasizing individual writing skills and practices. In addition, holistic methods will incorporate grammar usage and mechanics, reading and vocabulary skill acquisition, and oral expression into compositions of varied types and purposes.

College Prep English 9 1 Credit-Full Year 9th Grade Required

Students will begin to study not only grammar usage and mechanics, but how these elements are applied to different writing genres; for instance, research as opposed to persuasion as opposed to creative writing, etc. They will begin receiving about grade-level vocabulary work. Students will begin to compile a writing portfolio that will help track their progress throughout their high school career. In literature, students will read both classic and contemporary works of fiction and non-fiction. Some of these works students will choose themselves while others, like to Kill a Mocking Bird, will be assigned. Students will work on individual and class projects/papers that begin to encourage abstract thinking and high level cognitive skills. These projects/papers will combine many different skill sets: creativity, research, previous knowledge, literature and speech, to name a few.

English 10 1 Credit – Full Year 10th Grade Required

Sophomore English is an expansion of English 9. Students will immerse themselves in a diverse collection of literature selections and composition assignments. Instruction will employ holistic methods, focusing on thematic units produced from classic and contemporary novels, anthologies, drama and poetry, and assigned outside reading. Further integration of grammar, reading, vocabulary, and oral expression will be explored. A student must pass a full credit of English 9 to be eligible to take English 10.

College Prep English 10 1 Credit-Full Year 10th Grade Required

Students will continue to study grammar usage and mechanics, as well as how these elements apply to different writing genres, but they will also begin to study how changes in a root word affect the function and meaning of that word in a sentence. They will continue above average grade-level vocabulary work. Their writing activities will continue to cover multiple genres, but students' papers will be longer in length and detail. Students will read 16 works of various genres independently, and they will be exposed to such literary classics such as: Of Mice and Men, Animal Farm, 1984 and Ender's Game. Students will continue to work on individual and class projects/papers that encourages abstract thinking and high level cognitive skills. These projects/papers will combine many different skill sets: creativity, research, previous, knowledge, literature, and speech to name a few. Fee Prerequisite: Students must pass a full unit of English 9 to be eligible to take C.P. English 10.

College Prep English 11 (CCP) 1 Credit – Full Year 11th Grade Required

Students will continue the study of grammar usage and mechanics as well as vocabulary and various types of literature, primarily American. A major goal for the year involves providing practice for the types of written papers expected of them at the college level. Preparation time is

also provided to improve their success on the reading and English sections of the ACT test. With firm belief that students should be exposed to tried and true required American writings, they will read such classics as The Great Gatsby, The Crucible and various works by Emerson, Poe and Thoreau, well as those of their own choosing, interspersed with more contemporary works of short fiction and non-fiction. Fee.

College Prep English 12 (CCP) 1 Credit – Full Year 12th Grade Required

Even as these students are busy continuing the goals set for College Prep English 11, this course is also designed to assist students through a successful and more enjoyable completion of their last year of high school. These practical matters include passing the ACT or SAT with a score acceptable to the student, completing college entrance forms, and writing scholarship, admittance, and for some, commencement essays. All the while they are to be reading the finest world class literature available, classic and contemporary, assigned and individually chosen, such as: Fahrenheit 451, Anthem, Hamlet, The Catcher in the Rye and various memoirs. Extensive time is also given to refining their ability to handle college level compositions. A student must pass a full unit of English 11 to be eligible to take English 12. **Fee**

Professional Writing ½ Credit - Semester 11-12 Elective

This course offers an introduction to the techniques and types of professional writing, including correspondence and reports. It is designed to help strengthen skills of effective business and professional communication in both oral and written modes. After successful completion of this course, students will have the skills necessary to communicate effectively in a variety of professional situations, included but not limited to resumes, personal essays for scholarships, and college scholarship essays.

Reading for Life ½ Credit – Semester 9-12 Elective

Students cannot substitute this class for any required English course. Reading for life is recommended for any high school student who is ready to work to strengthen his/her reading skills, experience different forms of literature and, overall, enjoys reading. Students will read a variety of genres and resources, learn and apply reading strategies and work on the development of their vocabulary. Students can expect to read around 1000 pages each grading period, present orally to the class, share in discussion, and complete some writing.

ACT Prep ½ Credit – Semester 11-12 Elective

Topics covered in this course: types of test, scoring process, vocabulary development, test taking skills, practice tests, information on getting it done in the time allotted, analyzing strategies to boost your score, and reading-preview questions and then reading the text for answers. Students will gain the knowledge and skills necessary to do well on the ACT.

Creative Writing ½ Credit – Semester 9-12 Elective

Students who are interested in writing and are highly independent should take this course. This course will give students an opportunity to write in ways besides the traditional essay and analysis required for traditional English courses. Students will develop a substantial portfolio; examine their own strengths and weaknesses as a writer, and possibly attempting to publish their work for a larger audience. Enrollment is limited and there is an application process.

Mythology ½ Credit – Semester 10-12 Elective

This one-semester elective course will expose students to a global view of mythology. Students will explore the universal qualities of man's search for meaning and understanding. Readings will include Greek, Roman, Norse, Arthurian, and modern mythologies. Students will read selections and view films as a class. Afterwards, students will respond through writing, group discussions, and individual and group projects. This course is paired with Minority Literature.

Minority Literature ½ Credit – Semester 10-12 Elective

This one-semester elective course will expose students to different cultural perspectives. Students will explore the universal qualities of humanity, as well as the unique characteristics of American minority cultures. Students will read selections and view films as a class. Afterwards, students will respond through writing, group discussions, and individual, and group projects. This course is paired with Mythology.

Short Story ½ Credit – Semester 10-12 Elective

This elective course gives students the opportunity to read a diverse selection of both classic and modern short stories. The short story selections include works by noted American authors (Edgar Allan Poe, Kate Chopin, Ray Bradbury, and Alice Walker) and acclaimed world authors (Nadine Gordimer, Gabriel Garcia Marquez, Sir Arthur Conan Doyle, and Franz Kafka). Thematic units include works of horror, detective fiction, psychological realism, magical realism, fantasy, and science fiction. Students will read short selections individually and as a class. After reading the selections students will respond through writing, group discussions, and individual and group projects. This course is paired with Science Fiction Literature to develop programming for the school's cable access station.

Science Fiction Literature ½ Credit – Semester 10-12 Elective

This elective course gives students the opportunity to explore a body of science fiction and fantasy literature that represents the genre at its best. The science fiction literature will include works by acclaimed authors including Ray Bradbury, Douglas Adams, H.G. Wells, and Issac Asimov. The literature of the fantastic selections include works by noted authors including J.R.R. Tolkien, Gabriel Garcia Marquez, and Ursula LeGuin. Thematic units include the role of the heroic, the universality of the human condition, critiques of the values of man, and the potential loss of humanity in a world dominated by technology. Students will read selections and view films individually and as a class. Afterwards, students will respond through writing, group discussions, and individual and group projects. This course is paired with Short Stories.

Public Speaking ½ Credit – Semester 9-12 Elective

Students will learn about the communication process and the types of oral communication; concentrating on public speaking. Students will research, compose, and deliver informative, process, and persuasive speeches. Listening to and evaluating others' speeches will also be stressed.

Film and Literature ½ Credit – Semester 9-12 Elective

This course explores the complex interplay between film and literature. Selected novels, short stories, and plays are analyzed in relation to film versions of the same works in order to gain an understanding of the possibilities-and problems-involved in the transposition to film. Also, students will analyze the effectiveness of whether and how film adaptations create social awareness and relevance of non-contemporary literary works in today's society. The historical progression of film mechanics and how they have contributed to the realism of today's visual media and representations of literature will also be a topic in the course. Students are cautioned that this course requires reading and writing in addition to viewing films and taking part in class discussions.

Future Career Awareness Semester 9-10 Elective

This is a semester course that can only be taken once throughout a high school career. This course will focus in on students building the confidence and tools to make a decision about their future after high school. Students will receive information regarding post high school educational and training options that include colleges of different types, as well as military options, and apprenticeship on the job training. These students will begin to develop note-taking and research skills that would be required at the college level. Also these students will begin to complete

personal traits assessments as well as career surveys to help them determine which interests and strengths they have and which jobs they correlate with. Students will also begin to look into the ACT/SAT registration and preparation steps.

College and Career Awareness I and II                      Semester                      11-12 Elective

This is a semester long classes (available to students both junior and/or senior year) Within this course students will begin to develop the skills and information that will allow them to become successful in college. They will begin to plan for the application process while also working on their resume and letters of recommendation. Students will receive information on: scholarships, grants, financial aid, and loans. Students will begin to develop a calendar of important deadlines for students to use throughout the year to guide their senior year. Students will also begin to practice the interview process for scholarships. Any junior in this class will be completing the mock application and mock scholarship applications while seniors will be completing their actual application and scholarships.

**WORLD LANGUAGE**

6<sup>th</sup> grade Spanish                      Semester                      6th grade

Sixth grade Spanish serves as an introduction to the Spanish language and cultures. Students will participate in a variety of activities and projects to learn the basics of communication, geography, and culture. Activities will be aligned to the Ohio standards for world language; interpretive/interpersonal/presentational communications and cultures.

7<sup>th</sup> grade Spanish                      Semester                      7th grade

Seventh grade Spanish serves as an introduction to the Spanish language and cultures. Students will participate in a variety of activities and projects to learn the basics of communication, geography and culture. Activities will be aligned to the Ohio standards for world language; interpretive/interpersonal/presentational communications and cultures.

8<sup>th</sup> grade Spanish                      Semester                      8th grade

Eighth grade Spanish serves as an introduction to the Spanish language and cultures. Students will participate in a variety of activities and projects to learn the basics of communication, geography and culture. Activities will be aligned to the Ohio standards for world language; interpretive/interpersonal/presentational communications and cultures.

Spanish I                      1 Credit – Full Year                      9-12 Elective

Spanish I is a practical course that prepares students to communicate in Spanish both verbally and in writing in everyday situations. Students will develop knowledge of Spanish vocabulary, grammatical structures, and culture. Reading, writing, listening, and speaking skills will be addressed throughout the course, and students will be participating in a variety of written and oral assignments/projects to further their skills in these areas. Geography, history, literature, and other aspects of Spanish culture will be presented and studied. . Activities will be aligned to the Ohio standards for world languages: interpretive/interpersonal/presentational communication and cultures.

Spanish II                      1 Credit - Full Year                      10, 11, 12 Elective

Spanish II is a continuation of the vocabulary, grammar and conversation skills begun in Spanish I. Emphasis will be placed on learning more verbs tenses; more elaborate grammar structures, and more in-depth vocabulary as well as improving conversational skills. Students will be participating in a variety of written/oral assignments and projects to further their skills in these areas.

Geography, history, literature, and other aspects of Spanish culture will be presented and studied. Activities will be aligned to the Ohio standards for world languages: interpretive/interpersonal/presentational communication and cultures. PREREQUISITE – GRADE OF C OR BETTER IN SPANISH I and INSTRUCTOR APPROVAL

Spanish III (CCP) 1 Credit - Full Year 11, 12 Elective  
Students will be expanding knowledge of Spanish vocabulary, grammatical structures, and culture, as well as reviewing materials from Spanish I and II. Emphasis is placed on conversation, vocabulary and correct usage of the language. Correct pronunciation and oral proficiency are primary goals. This requires a daily emphasis on listening and speaking. The classroom experience will provide an appreciation and development of cultural awareness through various readings, media resources and authentic materials. Activities will be aligned to the Ohio standards for world languages: interpretive/interpersonal/presentational communication and cultures. PREREQUISITE – GRADE OF C OR BETTER IN SPANISH II, and INSTRUCTOR APPROVAL

Spanish IV (CCP) 1 Credit - Full Year 12 Elective  
This course is appropriate for students preparing for college. It is a challenging intermediate level course in which students will continue to expand their skills in the areas of reading, writing, speaking and listening. The course is conducted primarily in Spanish and will involve daily review and practice at home. Students will review previously introduced grammar and vocabulary and will master additional vocabulary and new grammatical structures. In this course, students will acquire in-depth knowledge of Spanish-speaking cultures. Students will be introduced to representative works of Spanish & Latin American literature. Activities will be aligned to the Ohio standards for world languages: interpretive/interpersonal/presentational communication and cultures. PREREQUISITE – GRADE OF C OR BETTER IN SPANISH III, and INSTRUCTOR APPROVAL

### MATHEMATICS

Math 6 Full Year 6 Required  
The goal of the course is to encourage problem-solving skills, promote specific vocabulary when communicating, foster reasoning, and make connections through mathematical relationships. The course will cover these specific areas: geometry, statistics and probability, number system, expressions and equations, ratios, proportional relationships and mathematical processes. Students will learn these concepts through observations, experiments, and investigations.

Math 7 Full Year 7 Required  
This course is designed to help students continue problem solving, communication, reasoning, and connection skills. Students will learn how the different mathematics concepts are related. The course will cover these specific areas: geometry, statistics and probability, number system, expressions and equations, ratios, proportional relationships and mathematical processes. Students will learn these concepts through observations, experiments, and investigations. Students must have scientific calculators.

Pre-Algebra Full Year 8th-Grade  
This course is for students who require more demonstration and practice time in order to master the course topics of Algebra I. This course will place a strong emphasis on the continued study of integers, fractions, order of operations, variables, expressions, and equations. Students will solve and graph equations and inequalities, write and solve proportions, and explore geometry, statistics, and graph concepts. Problem solving will be emphasized throughout the course. Upon completion of the course, students will then move onto Algebra I. This course will count as one of the students' four math credits for graduation; however, this is not an NCAA approved course.

Algebra 1A Full Year 8-9 Math credit

Algebra 1 A is the first half of a traditional Algebra 1 class. In this course, students will explore rational numbers, expressions, equations, and functions. They will solve graph and analyze linear equations. Students will also be introduced to proportional reasoning. Upon successful completion of Algebra 1 A, a student will be ready for Algebra 1 B.

Algebra 1 B 1 Credit – Full year 9-12 Math credit

Algebra 1 B is the second half of a traditional Algebra 1 class. In this course, students will solve systems of linear equations and inequalities, explore polynomials, quadratic, exponential, rational and radical equations. Students will use the concept of factoring to solve various problems. Upon successful completion of Algebra 1 B, the student will be ready for Geometry.

Algebra 1 1 Credit – Full year 8-12 Math credit

Algebra 1 is for students who want an understanding of the principles of mathematics and plan to continue their mathematical education in high school and perhaps in college. The course will cover the following topics: addition, subtraction, multiplication, and division in Algebra, linear sentences, lines and distance, slope, exponents and powers, polynomials, and system. It is suggested students have a graphing calculator.

Geometry 1 Credit – Full Year 9-12 Required

Students will understand the basic geometric figures; their components and the reasoning processes needed to formalize proofs. They will use compass, protractor and ruler to solve problems through inductive reasoning. Students must provide their own equipment. Prerequisite: Algebra 1

Algebra 2 (CCP) 1 Credit – Full Year 10-12 Required

Algebra 2 is designed for students who have been successful in previous math courses. This course will be a continuation and extension of Algebra 1. Topics to be covered include equations, inequalities, linear relations, functions, matrices, systems, polynomials, quadratic equations, conic sections, radical expressions, sequences, trigonometry and probability. Prerequisite: Successful completion of Algebra 1 and Geometry

Math Modeling and Reasoning 1 Credit - Full Year 10-12 Required

This course is designed to promote reasoning, problem solving and modeling through thematic units focused on mathematical practices while reinforcing and extending content in Number and Quantity, Algebra, Functions, Statistics and Probability, and Geometry. It is a yearlong course taught using student-centered pedagogy. Prerequisite: Successful completion of Algebra 1 and Geometry.

Pre-Calculus (CCP) 1 Credit – Full Year 11-12 Elective

Pre-Calculus is a college prep course for those students who are college bound. It will focus on the following topics: relations, functions, graphs, complex numbers, radicals, sequences, three-dimensional geometry, trigonometry and conics. Students should have a graphing scientific calculator. Prerequisite: Successful completion of Algebra 2

Calculus (CCP) 1 Credit – Full Year 12 Elective

This is a continuation of the college prep pre-calculus course for those students who are college bound. The course will focus on functions, limits, derivations, integrals, and applications of integration and differentiation. Students should have a graphing scientific calculator. Prerequisite: Successful completion of Pre-Calculus

Statistics (CCP) 1 credit – Full Year 12 Elective

A course designed to acquaint the student with the theory and application of statistics. Course content includes organization of data, measures of central tendency and variability, probability, normal distributions, binomial distributions, Poisson distributions, sampling theory, estimation and hypothesis testing. Prerequisite: Successful completion of Pre-Calculus Algebra 2 or Math Modeling and Reasoning.

### MUSIC

6<sup>th</sup> Grade Band \_\_\_\_\_ Full Year \_\_\_\_\_ 6 Elective

The students must participate in all required concerts for the year. Students spend class time preparing for concerts and learning about music and their instruments. Each student must demonstrate the ability to perform on an instrument or have director approval to participate.

Music 7 \_\_\_\_\_ Semester \_\_\_\_\_ 7 Required

This course is required of all non-band students. Music nomenclature and theory are taught. The students also are introduced to music history from the Gregorian Chant to the 20<sup>th</sup> Century Era. The students will have knowledge of both American music, world music and popular world.

Junior High School Band \_\_\_\_\_ Full Year \_\_\_\_\_ 7-8 Elective

Band is a year -long class which focuses on the development of the students' instrumental abilities. The students must participate in all required concerts for the year. In addition, each student may participate in the OMEA Solo and Ensemble Contest, as determined by the director. Students spend class time preparing for concerts and learning about music and their instruments. Each student must demonstrate the ability to perform on an instrument or have director approval to participate.

High School Band \_\_\_\_\_ 1 Credit – Full Year \_\_\_\_\_ 9-12 Elective

Band is a year- long class which focuses on the development of the students' instrumental abilities. Students spend class time preparing for concerts and learning about music theory and their instruments. The band is required to perform at several school concerts during the school year, including but not limited to the Holiday and Spring concerts, graduation and other events as determined by the director. In addition, each student may participate in the OMEA Solo and Ensemble Contest, as determined by the director. Each student must demonstrate the ability to perform on an instrument or have director approval to participate. In order to receive credit for this class, a student must complete both semesters.

Music Appreciation (CCP) \_\_\_\_\_ 1 Credit - Full Year \_\_\_\_\_ 9-12 Elective

Development of listening skills and understanding of the meaning of music, from Gregorian chant to jazz and other current popular styles.

### PHYSICAL EDUCATION AND HEALTH

Physical Education 6 \_\_\_\_\_ Full Year \_\_\_\_\_ 6 Required

Students will participate in units involving the following topics: team building, individual/team sports, physical fitness, and President's Challenge. The goal is to introduce students to a lifetime of physical activities.

Physical Education & Health 7 \_\_\_\_\_ Semester \_\_\_\_\_ 7 Required

Physical Education during the 7<sup>th</sup> and 8<sup>th</sup> grade years are This course is designed to introduce basic skills, rules and proper scoring techniques that are a part of the various games/activities that will be covered. Also, physical fitness tests will be assessed in the last weeks of the course. The health portion of the course focuses on health as the integration of the areas of social, emotional, physical, and spiritual well-being. The topics of study will be the definition of health as it impacts these areas and the development of an understanding of the importance of making wise health choices both now and in the future.





In this course the students will learn to describe and explain the following subjects: earth's various cycles, weather systems, characteristics and structure of life, diversity and interdependence of life, evolutionary theory, how matter changes forms and the different forms of energy, Fee.

Science 8

Full Year

8 Required

In this course the students will learn to describe and explain the following subjects: the solar system, earth's structure and crusts, heredity and the evolutionary theory, forces and motion, the nature of energy, understanding technology, show the ability to do technological design, develop skills of scientific inquiry and demonstrate the scientific ways of knowing. Fee.

STEM 7

Semester

7<sup>th</sup> Required

STEM integrates science, technology, engineering, and math in a project-based course that will foster critical thinking, innovation, problem-solving, teamwork, and other 21st century skills.

Critical thinking and problem solving are important skills to possess, but can sometimes be difficult to master. In this class, you will have the opportunity to practice these skills through a number of challenges that reflect STEM areas. You will be encouraged to be curious and take risks to develop solutions.

STEM 8

Semester

8<sup>th</sup> Required

STEM integrates science, technology, engineering, and math in a project-based course that will foster critical thinking, innovation, problem-solving, teamwork, and other 21st century skills.

Critical thinking and problem solving are important skills to possess, but can sometimes be difficult to master. In this class, you will have the opportunity to practice these skills through a number of challenges that reflect STEM areas. You will be encouraged to be curious and take risks to develop solutions.

Physical Science

1 Credit – Full Year

9 Required

An introductory course designed to allow students to explore the basic concepts of physical science. Students will be introduced to the history of nature of science. The course includes an introduction to the fundamental concepts of physics, chemistry, and astronomy. Students will be encouraged to explore the relationship between science and everyday life.

Biology

1 Credit – Full Year

10 Required

This course investigates the composition, diversity, complexity and interconnectedness of life on Earth. Fundamental concepts of ecology, cells, heredity and evolution provide a framework to explore the living world, the physical environment and the interactions within and between them.

Chemistry (CCP)

1 Credit – Full Year

11-12 Science credit

This course introduces students to key concepts and theories that provide a foundation for further study in other sciences as well as advanced science disciplines. Chemistry comprises a systematic study of the *predictive* physical interactions of matter and subsequent events that occur in the natural world. The study of matter through the exploration of classification, its structure and its interactions is how this course is organized. Offered every other year. Investigations are used to understand and explain the behavior of matter in a variety of inquiry and design scenarios that incorporate scientific reasoning, analysis, communication skills and real-world applications. An understanding of leading theories and how they have informed current knowledge prepares students with higher order cognitive capabilities of evaluation, prediction and application.

PREREQUISITE: Successful completion of Algebra I with a B average or higher; concurrently enrolled in Algebra II or higher; or by permission of the instructor.

Physics (CCP)

1 Credit – Full Year

11-12 Science credit

Physics elaborates on the study of the key concepts of motion, forces and energy as they relate to increasingly complex systems and applications that will provide a foundation for further study in science and scientific literacy. Students engage in investigations to understand and explain motion,

forces and energy in a variety of inquiry and design scenarios that incorporate scientific reasoning, analysis, communication skills and real-world applications. PREREQUISITE: Successful completion of Geometry with a B average or higher or permission of the instructor. Offered every other year

Anatomy & Physiology (CCP) 1 Credit – Full Year 11-12 Science credit  
Anatomy & Physiology is a systematic study of the relationship between structure (anatomy) and function (physiology) of major organ systems in the body. Investigations, including dissections, are used to demonstrate these relationships. This course contains content and lab requirements to which some students may be sensitive—please see instructor for questions.

Cells/Genetics/ Evolution (CCP) 1 Credit – Full Year 10-12 Science credit  
Introduction to the basic concepts of biology with emphasis on molecular biology, cells, genetics and evolution. Three hours of lecture integrated with two hours of lab activities each week.  
Recommended preparation: One year high school biology and one year of high school chemistry.  
Prerequisite: Satisfactory math assessment score Lab fee.

Animals, Plants, Ecology CCP) 1 Credit – Full Year 10-12 Science credit  
Continuing study of the basic concepts of biology with emphasis on the structure and function of animal and plant systems, distribution of organisms and ecology. Prerequisite:  
Cells/Genetics/Evolution

Environmental Science 1 Credit – Full Year 11-12 Science credit  
Environmental science incorporates biology, chemistry, physics and physical geology and introduces students to key concepts, principles and theories within environmental science. Investigations are used to understand and explain the behavior of nature in a variety of inquiry and design scenarios that incorporate scientific reasoning, analysis, communication skills and real-world applications.

Pre-Engineering I 1 Credit—Full Year 9-12 Science Credit  
This course is intended to develop your understanding of the scientific method of inquiry and build on your knowledge of science, technology, engineering and mathematics. You will conduct, report on and evaluate independent and group engineering design challenges. This course will have a central focus on modeling and simulation in STEM career fields.

Pre-Engineering II 1 Credit – Full Year 10-12 Science Credit  
Pre-engineering II is a rigorous, innovative academic program that further introduces students to key engineering applications and philosophies in preparation for study at the university level. The curriculum is developed with student input and includes applications of cutting edge technologies and software currently being utilized in real world engineering situations. Course topics include: 3D modeling, Photo-realistic rendering, 3D printing, Computer Programming, Arduino micro-computers, Sensor technology, Modeling and Simulation, Game-based Simulations (Unity 4D & Hammer Editor), FreeMat, GPS with state of the art satellite technology through STK, Audio Game Engineering and various Mechanical engineering modeling and prototyping. In Pre-Engineering II students utilize their knowledge from Pre-Engineering 1 to identify a problem they determine pertinent, utilize the engineering design process to plan and create a possible solution and create a prototype.

Pre-Engineering III 1 Credit-Full Year 11-12 Science Credit  
Pre-engineering III is a rigorous, innovative academic program that further introduces students to key engineering applications and philosophies in preparation for study at the university level. The curriculum is developed with student input and includes applications of cutting edge technologies and software currently being utilized in real world engineering situations. Sample course topics include: 3D modeling, 3D printing, computer programming, micro-computers, Modeling and Simulation, game-based simulations, and various mechanical engineering modeling and

prototyping. Students utilize their knowledge from Pre-Engineering I & II to identify a problem, use the engineering design process to plan and create a possible solution, and create a prototype.

Investigative Science 1 Credit – Full Year 10-12 Science Credit  
Science Applications focuses on the various lab techniques utilized by geneticists, phlebotomists, forensic scientists and many more. Students will have the opportunity to explore various science fields and how they are utilized in society today. This course is recommended for students interested in pursuing a science related field in college.

Biogeography: Through Wildlife & Native Plant Communities 1 credit-full year 10-12 Science Credit  
Biogeography is a systematic study of why organisms live where they do. This course investigates patterns and relationships that result in the ecosystem and habitats we have here locally through understanding which creatures inhabit them and why. Content will cover geology, land history, climate, and local plant and animal identification providing a framework to read natural landscapes and understand in depth the living communities that inhabit them. Investigations will include hands on collection, identification, mapping, basic scientific measurement and application of math concepts to build population and distribution models.

Scientific Experimental Design and Analysis 1 credit - Full Year 10-12 Science Credit  
Properly conducted sampling and careful experiments form the backbone of science and investigation. In this course students will design and analyze experiments to investigate scientific phenomenon they are curious about. The course is project based and successful completion will apply a variety of engineering, mathematical, and technical skills in hands on situations. Along the way students creativity and drive will be utilized to explore mapping, programming, graphing, and how to distinguish good studies from bad studies. Students will be exposed to how a scientific approach to decision making is used in careers outside the sciences. Students will acquire experience in problem solving, teamwork, innovation, reasoning, and critical thinking. The course adopts a learn by doing approach.

### SOCIAL STUDIES

Social Studies 6 Full Year 6 Required  
This course will stress the following topics of interest: early civilizations, pre-historic people, world religions and cultures.  
History - chronology, early civilizations, feudalism and transitions, the first global age people in societies - cultures, diffusion  
Geography - location, places and regions, human environmental interaction, movement, economics - scarcity and resource allocation, markets  
Government – systems of government  
Citizenship Rights and Responsibilities – This course encourages and presents hands-on participation in the individual rights and responsibilities that every mature citizen must know and abide by in day to day living in their community.  
Social Studies Skills and Methods – thinking and organizing, communication information, problem solving.

World History 7 Full Year 7 Required  
The course will stress the following topics of interest:  
History - chronology, early civilizations, feudalism and transitions, the first global age people in societies - cultures, diffusion  
Geography - location, places and regions, human environmental interaction, movement, economics - scarcity and resource allocation, markets  
Government – systems of government

Citizenship Rights and Responsibilities – This course encourages and presents hands-on participation in the individual rights and responsibilities that every mature citizen must know and abide by in day to day living in their community.  
Social Studies Skills and Methods – thinking and organizing, communication information, problem solving.

U.S. History 8 Full Year 8-Required

The course will stress the following topics of interest:

History – chronology, the first global age, revolution, a new nation, civil war and reconstruction

People in Societies – interaction, diffusion

Geography – places and regions, human environmental interaction, movement

Economics – scarcity and resource allocation, markets, government and the economy, Government – role of government, rules and laws

Citizenship Rights and Responsibilities – This course encourages and presents hands-on participation in the individual rights and responsibilities that every mature citizen must know and abide by in day to day living in their community.

Social Studies Skills and Methods – obtaining information, communicating information, and problem solving.

Government and Law Semester 8th grade

This course examines the role of government in our daily lives. We will break down the constitution including the three branches of government and our rights as citizens in the United States. We will also discuss the structure of local governments and study the relationships between the state and federal governments. Finally we will study laws that make up our country using court cases and real life examples.

Current Events Semester 7-8th grade

Students will examine articles about current events happening around the world. Students will examine topics that are of interest to them as to keep them better informed on current events in a matter that pertains to their daily lives and interests. Students will also use this course to gain a better understanding of the world around them and how current events affect their lives.

World Geography Semester 8th grade

The following topics will be covered throughout the course: basic geographical features of the earth, culture, cultural regions, and map reading skills. The course will also look at how people live in other parts of the world such as Europe, Africa, Asia, South America, North America and Australia.

American History 1 Credit – Full Year 9 Required

This course examines the history of the United States of America from 1877 to the present. The federal republic has withstood challenges to its national security and expanded the rights and roles of its citizens. The episodes of its past have shaped the nature of the country today and prepared it to attend to the challenges of tomorrow. Understanding how these events came to pass and their meaning for today's citizens is the purpose of this course. The concepts of historical thinking introduced in earlier grades continue to build with students locating and analyzing primary and secondary sources from multiple perspectives to draw conclusions.

American Government 1 Credit – Full Year 10 Required

~~In this class, we will study the government of the United States and how it affects you, a citizen. We will cover, in depth, the process in which laws are made and will discuss the outside influences on the law making process. We will study all three branches of government and we will also study the~~

relationship between the state and federal government. Finally we will study how you can be an active participant in our government.

In this course we will study the United States government and the US Constitution. We will cover, in depth, the Three Branches of government and their functions, make up, and interactions with one another. We will examine the US Constitution and the 27 Amendments. Both their historical basis and how it affects your daily life currently. We will also be examining the ways in which as a citizen, you can have productive interactions with peace officers. The goal for this class is to make you a more informed United States citizen who understands the foundations of the United States and how to be an active participant in its future.

Modern World History 1 Credit – Full Year 11th/12 Required

This course examines the history of the world from the 1500's to the present. We will examine the cause and effect relationships of empires, politics, economics, social issues, and war and how they shaped the world that we live in now. Through the use of texts, primary sources, documentaries, and movies we will investigate the world through eras such as the Age of Exploration, Enlightenment, Worldwide Revolutions, World Wars, and the Cold War.

Introduction to Sociology 1 Credit – Full Year HS Elective

An introduction to the study of sociology and how it is used, examined, and implemented into society. Focus on the important concepts of culture, socialization, social interaction, social structure, groups and organizations, deviance, social inequalities, family, and education. Focus on how these concepts are integrated into society to better understand human nature and our interactions with one another. Through the use of this information we hope to better understand how to progress as a society. This course is only offered in alternate years.

Psychology (CCP) 1 Credit – Full Year HS Elective

The following topics will be covered: introduction of psychology, human growth and development, understanding human behavior, learning and thinking, awareness, emotions and motives, conflicts and adjustments, and social behavior. This course is only offered in alternate years.

Introduction to Economics 1 Credit-Full Year HS Elective

The following topics will be covered throughout the course: the economics way of thinking, economic systems, the American free enterprise system, demand, supply, prices, market structures, types of business organizations, the role of labor, money, banking, finance, measuring and monitoring economic performance, the role of government in the economy and the global economy. This course is only offered in alternate years.

Intro. To Humanities (CCP) 1 Credit- Full Year HS Elective

Survey of the humanities, relating the cultural values of philosophy and religion to the fine arts, particularly music, literature, theater, and visual arts.

World Geography 1 Credit – Full Year HS Elective

The following topics will be covered throughout the course: basic geographical features of the earth, culture, cultural regions, and map reading skills. The course will also look at how people live in other parts of the world such as Europe, Africa, Asia South America, North America and Australia. This course is only offered in alternate years.

Ohio and local history 1 credit – Full Year HS Elective

In this class we study about the Native Americans that have lived in the Ohio Valley. We will also study how European and American explorers explored and settled this land. We will discuss how Ohio grew to become a political and industrial power in the 1800's. We will study Ohio throughout the 20<sup>th</sup> and 21<sup>st</sup> centuries. We will take time to study in more detail the local area of the Miami Valley.

Contemporary World Issues 1 Credit – Full year HS Elective

This course will look at the issues facing the world today. We will examine the roots of the problems as well as attempt to find solutions. This is a project and discussion based class that the students will drive. Potential topics include: Terrorism, World Hunger, Politics, Human Trafficking, Poverty, Genocide, Nuclear weapons, Biological warfare, and human rights.

Community Leadership 1 Credit- Full year HS Elective

This elective is designed to motivate students to take a more active role in their community through hands-on experiences in service-learning. This course will begin with an exploration of the origins of community involvement in America. Students will learn how to identify, create, and implement a service learning project using a six step framework of effective community engagement. This class is designed to give the students a means to improve their community. **This course will also involve students to perform community service projects.**

American Politics 1 Credit – Full year HS Elective

This class will examine how American Government affects the politics in the United States. It will examine how the two political parties have developed over time and will discuss how the parties are affected by current events and issues in this country. This class will also examine elections at all levels. This class will apply the lessons learned in the American Government class.

Anthropology 1 Credit - Full Year HS Elective

This course will examine humans, human behavior, and societies. We will study cultural anthropology which examines norms and values as well as cultural anthropology where we examine patterns in human behavior. Students will look into archaeological information to help determine the evolution of human beings over time. We will focus on contemporary society and how we as humans interact with one another to create a functioning society and how sociological factors work together to guide our interactions with one another. This course is commonly taught in college for a variety of degrees and this course will help gather a baseline of information for those courses.

European Military History 1 Credit – Full Year HS Elective

This course examines the role of the military in World History. Through much time will be spent in battles and tactics, the primary purpose will be to acquaint the individual student with the relation of the military to individual societies. Topics discussed will include the development of professional armies in European countries, how military tactics dating back to the Roman empire influence modern warfare, how war shaped the continent of Europe and the effects of warfare on the populus.

United States Military History 1 Credit – Full Year HS Elective

This course examines the role of the military in US History. Through much time will be spent in battles and tactics, the primary purpose will be to acquaint the individual student with the relation of the military to individual societies. Topics discussed will include defense, guns vs. butter, the military industrial complex, the military bureaucracy, the all-volunteer military, the draft, military power as a tool of foreign policy, comparative military systems, the military man as a politician, and the life organization and traditions of the military.

