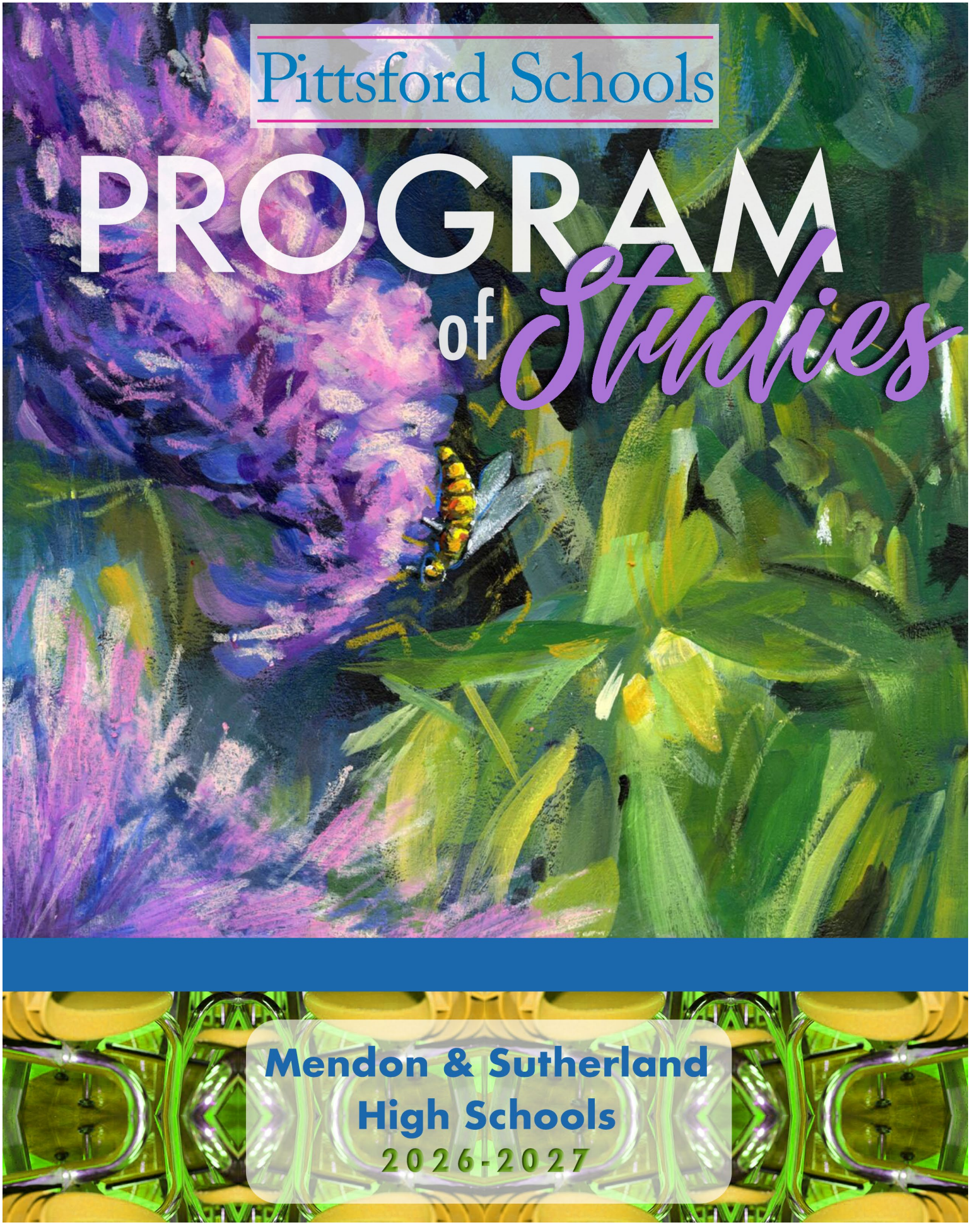

Pittsford Schools

PROGRAM of Studies

Mendon & Sutherland High Schools

2026-2027

Pittsford Schools

MISSION STATEMENT

The PCSD Community works collaboratively to inspire and prepare our students to be their best, do their best, and make a difference in the lives of others.

Excellence Today *and* Tomorrow

COVER IMAGE CREDIT:
Chloe Shaw MHS
Lindsey Chen SHS

1.21.26

PROGRAM OF STUDIES **TABLE OF CONTENTS**

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PITTSFORD MENDON HIGH SCHOOL

472 Mendon Road, Pittsford, NY 14534
Principal Melissa Julian
Assistant Principals Stephanie Barg, Andrea Lynch
Main Office Phone 585-267-1600
Counseling Office Phone 585-267-1660

PITTSFORD SUTHERLAND HIGH SCHOOL

55 Sutherland Street, Pittsford, NY 14534
Principal Mark Puma
Assistant Principals Linda Dickey, Tyler Manchester
Main Office Phone 585-267-1100
Counseling Office Phone 585-267-1160

The Pittsford Central School District does not discriminate in access, admission, employment, or treatment of participants in any of its programs and activities on the basis of race, religion, age, sex, color, handicapping condition or ethnic or national origin. Inquiries regarding concerns, complaints or other compliance issues related to Title IX may be addressed to the Director for Human Resources, at the District Administration Building at 585-267-1008, and concerns, complaints or other compliance issues related to Section 504 may be addressed to the Director of Special Education, at the District Administration Building at 585-267-1014.

Dear Students:

This guide outlines courses available to Pittsford Central School District students in grades 9 - 12 for the 2026-2027 school year. **Students and parents should carefully plan their student's educational program**. Course discussions with department teachers will be held in late January/early February, and course selections must be made before Presidents' Week recess. The 2026-2027 high school program will be based on these selections. Students may not re-take courses they have previously taken and for which they have already received credit. ***PLEASE BE ADVISED THAT THE OFFERING OF ANY COURSE IS CONTINGENT UPON THE ATTAINMENT OF SUFFICIENT ENROLLMENT.***

GRADUATION REQUIREMENTS

REGENTS and LOCAL DIPLOMA 22 Units of Credit	**COURSE**	**REGENTS DIPLOMA With Advanced Designation 22 Units of Credit**
4 Units – 1 Regents Exam	English	4 Units – 1 Regents Exam
4 Units – 2 Regents Exams***	Social Studies	4 Units – 2 Regents Exams
3 Units – 1 Regents Exam	Math	3 Units – 3 Regents Exams
3 Units – 1 Regents Exam	Science	3 Units* – 2 Regents Exams
1/2 Unit	Health Education	1/2 Unit
1 Unit	Art and/or Music and/or DDP	1 Unit
1 Unit	Language Other Than English (LOTE)	3 Units** – 1 Regents Exam or approved Local Exam est. by NYSED
2 Units	Physical Education	2 Units
3 1/2 Units	Electives	1 ½ Units
22 Units	Total	22 Units

Physical Education – A minimum of three periods per calendar week during one semester of each school year and two periods during the other semester.

Local Diploma Required Exams	**Regents Diploma Required Exams (passing score of 65 or above)**	**Regents Diploma With Advanced Designation Required Exams (passing score of 65 and above)**
• English Language Arts Exam • Math Regents Exam • Regents Global History*** • Regents U.S. History*** • Regents Science***	• English Language Arts Exam • Math Regents Exam • Regents Global History*** • Regents U.S. History*** • Regents Science***	• English Language Arts Exam • Math Regents Exams + • Regents Global History • Regents U.S. History • Two Regents Science Exams • Regents LOTE

See NYSED General Education & Diploma Requirements website for more information.

(Continued next page)

* **Science** – 3 units must be comprised of commencement level science courses. One course must be from the Physical Sciences and one course must be from Life Science. The third may be from either life sciences or physical sciences.

** A five-unit sequence in art, music, occupational education, business or technology may be substituted for the two additional units of LOTE needed.

*** **"4+1" pathway option**: Permits a student to take four Regents exams and a comparably rigorous technical, arts, or other assessment for the fifth examination required for graduation. Students eligible for this must have also passed four required Regents exams (or department-approved alternative assessments) in English, mathematics, science and social studies.

-or-

"4+CDOS" pathway option: Beginning June 2016 and thereafter, a student may graduate with a high school diploma if the student meets the graduation course and credit requirements; passes four required Regents exams or department-approved alternative assessments (one in each of the following subjects: English, mathematics, science and social studies) and successful completion of at least 216 hours of **Career and Technical Education (CTE) course work and/or work-based learning experiences** (of which at least 54 hours must be in work-based learning experiences). Work-Based Learning (WBL) includes activities which collaboratively engage employers and schools in providing structured learning experiences for students. http://www.p12.nysed.gov/ciai/multiple-pathways/

CREDIT BY EXAM GUIDELINES

Credit by Exam is an opportunity offered to students who may qualify to challenge a Regents Exam by studying a Regents level course independently. If a student is interested in this option the student reviews the Credit by Exam Guidelines, completes the Credit by Exam Form and returns the Form to the Principal or designee. Criteria considered for approval of the request include grades of 95 or better in the current class, excellent classroom learning behaviors, and the perseverance to self-study a year-long course with minimal anxiety or undue stress. If the request is approved, the student will be notified of the next steps in the process, including the time and date of the Regents exam to be taken. Students interested in pursuing the Credit by Exam option should speak with their current teacher or school counselor. The Credit by Exam option only applies to selected courses that end in a Regents exam. Credit by Exam may not be used for Regents Science courses due to the state required laboratory minutes. Credit by Exam does not apply to World Language courses.

STUDENT COURSE LOAD REQUIREMENTS

All students shall carry a minimum of five (5) credits plus physical education each semester.

COUNSELING SERVICES

Pittsford Central Schools provides a developmental, sequential school counseling program based on the American School Counseling Association's National Standards for School Counselors. All students in grades K-12 participate in activities which address personal/social, academic and career objectives and promote the development of attitudes, knowledge, and skills necessary for success in school and as citizens of a global society.

School Counselors collaborate with parents, teachers, administrators, and other school support staff members to help students become effective learners, achieve personal and social goals and develop into responsible, contributing members of society.

COUNSELING SERVICES:

- Individual personal, social and academic counseling services as needed
- Group counseling experiences
- Educational presentations for parents
- Classroom counseling Instruction
- Career exploration
- Post-Graduation Planning

GRADE 9 YEAR:

- Assistance with course selection
- Individual conferences that may include parents, to develop a flexible four-year educational plan
- Introduction to Naviance

GRADE 10 YEAR:

- Assistance with course selection
- A unit in career planning, including an occupational interest inventory conducted with the cooperation of the health department
- Assistance in gaining information about careers, colleges and course choices
- Opportunities for shadowing chosen careers (daylong); or for Exploring Careers (multi-session)
- Individual conferences to review four-year education plan and update career and college plan

GRADE 11 YEAR:

- Assistance with course selection
- Class meetings in the fall to discuss the Preliminary Scholastic Aptitude Test (PSAT). SAT and ACT information
- Planning for post high school opportunities through group and individual conferences
- Opportunities to meet with college representatives
- Provide information about colleges and careers through the College and Career Center and Naviance program
- Informational meetings for parents & students regarding post-secondary planning and financial aid

GRADE 12 YEAR:

- Individual conferences with counselor during first semester for post high school vocational and educational planning
- Opportunities to meet with college representatives
- Information regarding topics such as: financial aid, college entrance tests, careers and colleges
- Provide information about colleges and careers through the College and Career Center and Naviance program
- Informational meetings for parents & students regarding post-secondary planning

FOUR YEAR PLAN OF ROTATING COURSES

MENDON HIGH SCHOOL

Discipline	Course # & Name	Years Offered At MHS			
		2026-2027	2027-2028	2028-2029	2029-2030
Business	0536 Entrepreneurship	X		X	
Music	0820 Music History	X		X	
	0825 AP Music Theory	X	X	X	X
Science	0347 Astronomy		X		X
	0325 Genetics	X		X	
	0324 Microbiology		X		X
	0348 Oceanography	X		X	
Social Studies	0145 Contemporary Issues	X		X	
	0147 Diversity Issues		X		X
	0156 Comparative Religions	X		X	
	0146E Early Military History		X		X
	0146M Modern Military History	X		X	
Technology	0722 Manufacturing Systems	X		X	
	0732 Construction Systems		X		X
World Languages	0453 AP Latin	X		X	
	0454 Latin Literature Honors		X		X

SUTHERLAND HIGH SCHOOL

Discipline	Course # & Name	Years offered at SHS			
		2026-2027	2027-2028	2028-2029	2029-2030
Music	0820 Music History		X		X
	0825 AP Music Theory	X	X	X	X
Science	0347 Astronomy		X		X
	0348 Oceanography	X		X	
Social Studies	0145 Contemporary Issues	X		X	
	0147 Diversity Issues		X		X
	0156 Comparative Religions	X		X	
	0146E Early Military History		X		X
	0146M Modern Military History	X		X	
Technology	0722 Manufacturing Systems	X		X	
	0732 Construction Systems		X		X
World Languages	0453 AP Latin	X		X	
	0454 Latin Literature Honors		X		X

ADVANCED PLACEMENT COURSE OFFERINGS

See course details in each subject area and in the ***Advanced Placement Course Profiles Handbook*** on the Pittsford School District Website**.** **Link: High School Curriculum**

AP Art and Design
AP Art History
AP Language and Composition
AP English Literature and Composition
AP Calculus AB
AP Calculus BC
AP Statistics
AP Computer Science A
AP Computer Science Principles
AP Biology
AP Chemistry
AP Environmental Science
AP Physics C
AP French
AP Latin
AP Spanish
AP Music Theory
AP Economics: Macroeconomics and Microeconomics
AP European History
AP World History
AP Government and Politics: U.S. and Comparative
AP Psychology
AP United States History

NATIONAL COLLEGIATE ATHLETIC ASSOCIATION (NCAA)

The NCAA Eligibility Center certifies the academic and amateur credentials of all college-bound student-athletes who wish to compete in NCAA Division I or II athletics. **It is the responsibility of each individual student-athlete to make sure that their courses are approved by the NCAA.** This should be done on a yearly basis.

The Pittsford School District has a List of NCAA-approved courses on the Eligibility Center website (https://www.ncaa.org/sports/2014/10/24/how-to-register.aspx). Students can access this list by doing the following:

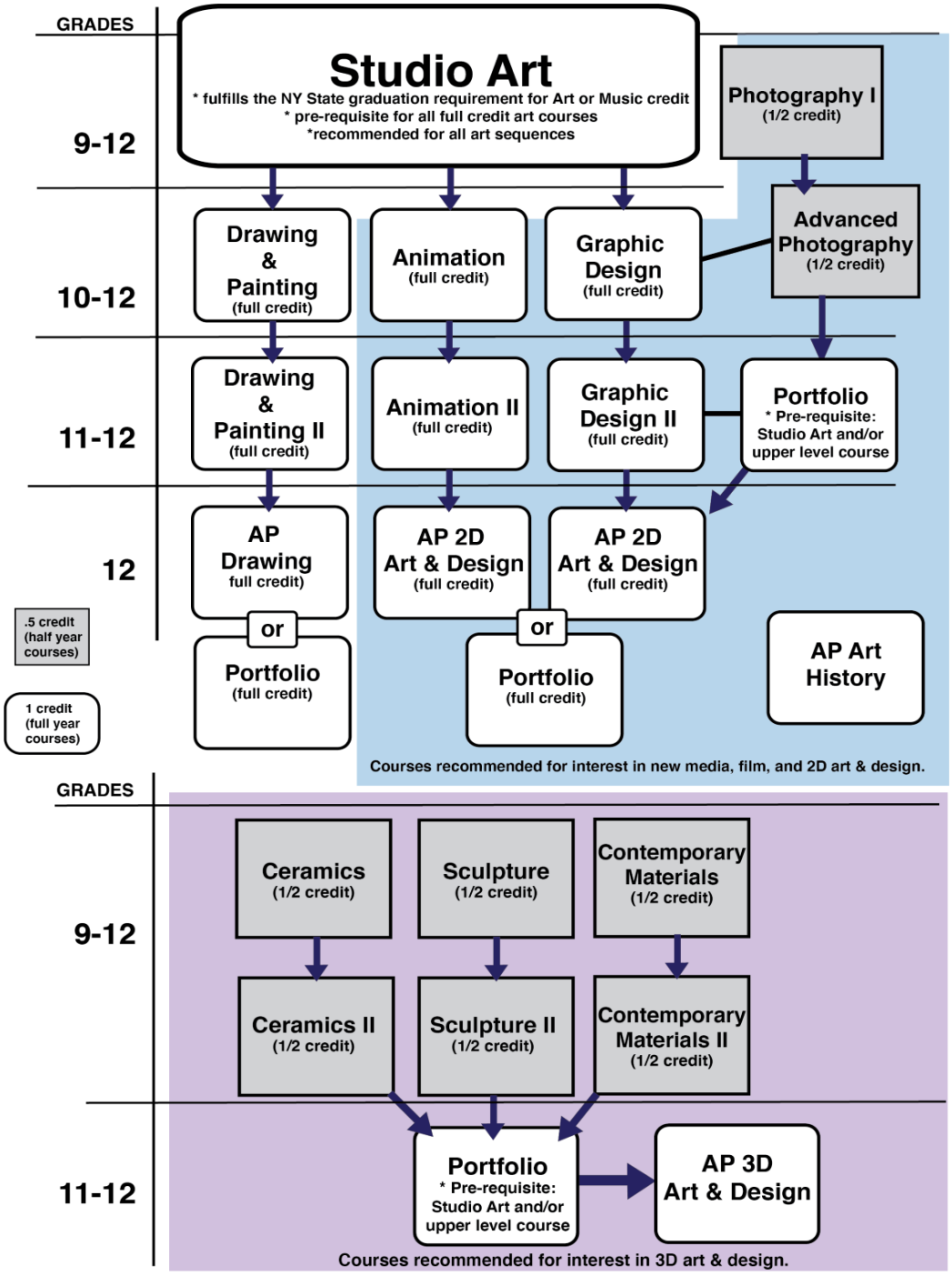
- Click the "NCAA College-Bound Student-Athlete" link to enter the site.
- Navigate to the "Resources" tab and select "U.S. Students" where you will find the link for the List of NCAA Courses.
- After checking the list and completing the registration process, request that an initial copy of your transcript be sent to the Eligibility Center by the counseling office.
- For students who have attended more than one high school, the NCAA Eligibility Center will need official transcripts from ***all*** high schools attended.
- A final transcript will be sent to the NCAA once a student graduates from the Pittsford School District.

ART EDUCATION COURSES AND SEQUENCE

FINE ARTS SEQUENCES

ART MAJOR SEQUENCE:

A 5-unit sequence in Art is one of the possible pathways to achieve a NYS Regents Diploma with Advanced Designation. The 5-unit sequences may be obtained through a combination of full and half-year courses.



Although some art electives do not require a prerequisite, we strongly suggest taking Studio Art as a foundation course.

3-D DESIGN SEQUENCE OPTIONS:

3-D Design Sequence: 5 Full Units of Credit to consist of 1 unit of credit in **Studio Art** and 4 full units of credit from a combination of:

Contemporary Materials I (½ year)
Contemporary Materials II (½ year)
Ceramic Arts I (½ – 1 year)
Ceramic Arts II (½ – 1 year)
Sculpture I (½ year)
Sculpture II (½ year)
Portfolio (full year)
AP Art & Design in 3-D Design (full year)

PHOTOGRAPHY/MEDIA ARTS SEQUENCE:

Photography/Media Arts Sequence: 5 Full Units of Credit to consist of 1 unit of credit in **Studio Art** and 4 full units of credit from a combination of:

Photography I (½ year)
Graphic Design I (full year)
Animation I (full year)
Animation II (full year)
Advanced Photography (½ year)
Graphic Design II (full year)
Portfolio (full year)
AP Art and Design in 2-D Design (full year)

Special Note: Any deviation from the prescribed Art Sequence must be met with prior instructor/department leader approval and portfolio review.

ART EDUCATION ELECTIVES

Students not pursuing an Art Sequence may take any of the following courses as an elective enrichment to their high school educational experience. No Studio Art prerequisite is necessary for enrollment in these courses however, we strongly suggest taking Studio Art as all Art courses build upon this foundational course.

Contemporary Materials I
Contemporary Materials II (Contemporary Materials I prerequisite)
Ceramic Arts I
Ceramic Arts II (Ceramic Arts I prerequisite)
Sculpture I
Sculpture II (Sculpture I prerequisite)
Photography I
Advanced Photography (Photography I prerequisite)

Art Education Course Descriptions

0611 STUDIO ART

GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Studio Art is a comprehensive foundation course in which students will experience a wide variety of media and processes, with hands-on experience in areas such as drawing, painting, design, composition, print-making, sculpture and computer graphics. The Studio Art course is centered around the Art Content Standards of Creation, Production & Presentation, Connection and Reflection & Response. Each of these areas incorporates both the Elements of Design and the Principles of Organization into the study of Art and the related projects. The understanding of these basics is extended and adapted to all areas through the exploration of a diverse selection of media.

Studio Art is a prerequisite to Painting and Drawing I, II, Portfolio, Advanced Placement Art, Animation I, Graphic Design I / II and is required for any Fine Art Sequence.

Studio Art satisfies the NYS requirement of one credit in Fine Art.

0621 PAINTING AND DRAWING I

PREREQUISITE: STUDIO ART or DDP with Art Dept. Leader approval
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This course offers a strong foundation of exploratory experiences related to drawing and painting. The students will use a wide variety of media, including pencils, charcoal, chalk and oil pastels, acrylic paints and watercolors. The emphasis of this course is to build skill competency while promoting individual growth and creativity. The four Art Content Standards continue as integral components of the learning process. The student will work with a variety of visual references, including the still life, photo resources and life drawing, as they build a strong background of skills and techniques, working toward expanding their personal creative abilities and imagination.

0631 PAINTING AND DRAWING II

PREREQUISITE: PAINTING AND DRAWING I
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This course is a continuation of Painting and Drawing I on a more advanced level. The basic skills in handling drawing and painting media have been developed and are used to solve more sophisticated visual problems. Individualized instruction becomes increasingly important as advanced students explore self-expression and creative problem-solving techniques.

0622 GRAPHIC DESIGN I

PREREQUISITE: STUDIO ART or DDP with Art Dept. Leader approval
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

Graphic Design I will enable students to utilize and explore skills in verbal and visual communication. Learning to follow specifications, deadlines, and verbal presentation, are goals for this course. Problem solving and collaboration are stressed. Real world knowledge of typography, design, color theory, symbolism and text are gained through practical application. Students gain skills in digital image creation and photo editing. Each student is encouraged to attain the independent judgment skills necessary to effectively communicate a consumer message through a visual means.

0632 GRAPHIC DESIGN II

PREREQUISITE: GRAPHIC DESIGN I
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

Graphic Design II is an advanced course. It involves studio inquiry into the advanced nature of graphic design and a variety of visual problem-solving strategies and visual communication. This course stresses the ever-changing concepts and skills needed to work professionally in the visual communication field. Motion graphics are introduced in this course as well as advanced skills with cutting edge technology.

0623 ANIMATION I

PREREQUISITE: STUDIO ART or DDP with Art Dept. Leader approval
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

Animation I is a dynamic course offering a strong foundation in traditional and digital animation. This course will explore the history of the moving image and the evolution of animation as an art form. Students build skills in storyboarding, narration and original character development. The bulk of the course will be conducted as a hands-on workshop applying a variety of animation techniques. Methods range from zoetropes, claymation and stop motion to experimental, 2D animations utilizing the Adobe Creative Suite.

0634 ANIMATION II

PREREQUISITE: ANIMATION I
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

Animation II is an advanced course offering designed for students who have mastered the skills required in Animation I and would like to increase their technical abilities and creative approaches. Students will have the opportunity to focus on animations of longer duration and complexity and are encouraged to explore areas of special interest. There is an emphasis placed on independence, strengthening technical pre/post production skills and the creative development.

0633 PHOTOGRAPHY I

This course is offered in the Art department at both high schools.
GRADES 9-12 SEMESTER - ½ UNIT

An introductory course in photography designed to provide students with an experience in basic techniques of photography while developing skills in, and appreciation for, the medium as an art form. The student will obtain a working knowledge of the history and nature of photography as well as the camera, its parts and their functions. The exploration of exposure, lighting, composition, and digital manipulation and editing are the foundations for the course. An ongoing use of photographic technologies (digital image capture and darkroom experiences) will be conducted throughout the semester. Importance will be placed on student growth in aesthetic awareness, compositional understanding, and individual creative expression. Students will need a device of their own (smart phone or DSLR - digital single lens reflex camera) and be required to take pictures outside of class as they can learn how to interpret the world around them. This class is highly recommended for those with an interest in film and video production as well as other creatives and storytellers.

0643 ADVANCED PHOTOGRAPHY

PREREQUISITE: PHOTOGRAPHY I
GRADES 9-12 ♦ SEMESTER - ½ UNIT

A course designed for students who have mastered the required skills in Photography I and who desire to increase their technical abilities and creative approaches. Work will continue to be done utilizing both traditional and contemporary photographic technologies. Students will explore a variety of photographic processes, techniques, and topics which may include portraiture, multiple imaging, digital image capture and digital computer image manipulation. Specific areas of photographic application, such as documentary and fine art photography, will be examined through the study of notable photographers. Students will be encouraged to explore areas of special interest, and emphasis will be placed on independence, strengthening computer imaging skills, and individual creative development.

0624 CONTEMPORARY MATERIALS I

GRADES 9-12 ♦ SEMESTER - ½ UNIT

A challenging and creative course for the student who desires a hands-on experience in art, Contemporary Materials will be enriching to fine arts majors as well as those seeking to enhance their high school year by learning new skills through creative experiences. The course will acquaint the student with a variety of art experiences, which may include jewelry/metals, fiber arts, functional art, clay, or printmaking. The course will explore traditional approaches in each area studied, as well as the contemporary attitudes that are setting new trends in the art world today. Students wishing to take more than one semester of Contemporary Materials may register for Contemporary Materials II.

0626 CONTEMPORARY MATERIALS II

PREREQUISITE: CONTEMPORARY MATERIALS I
GRADES 9-12 ♦ SEMESTER - ½ UNIT

The course continues to hone the skills introduced in Contemporary Materials I. Students taking this course will have the opportunity to pursue a concentrated exploration of a particular area of interest.

0625 CERAMIC ARTS I

GRADES 9-12 ♦ SEMESTER - ½ UNIT

The Ceramic Arts course is designed for the student who is interested in working with clay and the production of both functional and non-functional ceramic art. It includes exploring various methods of hand-building, the use of the potter's wheel, the creation of ceramic sculpture, experimentation with the various methods of handling clay, understanding the properties of glazes, a study of the history of stoneware, and the contemporary uses of clay. Students wishing to take more than one semester of Ceramic Arts may register for Ceramic Arts II.

0627 CERAMIC ARTS II

PREREQUISITE: CERAMIC ARTS I
GRADES 9-12 ♦ SEMESTER - ½ UNIT

Students will more fully explore their personal creativity in the ceramic arts through a concentrated development of a body of work, reflecting growth in skill, technique, and expression.

0616 SCULPTURE I

GRADES 9-12 ♦ SEMESTER - ½ UNIT

This 3-D design course will offer students an introductory investigation of fine art sculptural techniques. Students will experience creating armatures, models, prototypes and will delve into various techniques to complete a finished sculpture. Students will explore a variety of concepts including – mass, volume, form, plane, light, texture and function. These concepts will be reinforced through a range of styles, creative approaches, techniques and media. Working artists of today will be introduced, as well as key art historical figures. Representational, abstract and expressionistic forms will become part of the students' artistic vocabulary. Students will work with various media that lends itself to this eighteen-week intensive overview of sculpture, such as: wood, clay, wire, paper, fiber, metal, and found objects. Students wishing to take more than one semester of Sculpture may register for Sculpture II.

0617 SCULPTURE II

PREREQUISITE: SCULPTURE I
GRADES 9-12 ♦ SEMESTER - ½ UNIT

An opportunity for students to begin a more in depth study of the materials and processes introduced in Sculpture I, which will allow the students to further develop their 3-D design skills. Students will move towards an individual focus and a breadth of work using a variety of materials, concepts and techniques. Coursework will culminate with the completion of a comprehensive 3-D design portfolio.

0641 PORTFOLIO

PREREQUISITE: PAINTING AND DRAWING II or SCULPTURE II or
GRAPHIC DESIGN II or ANIMATION II (any of the level II or advanced electives)
GRADE 11-12 ♦ FULL YEAR - 1 UNIT

This course is an advanced continuation for those students who desire to further their study of art, focus on portfolio preparation, and expand their personal expressive vision and skills. Students work to further their artistic independence with guided exploration of both familiar and new media, concepts, and techniques. As they build their portfolio of work, students will be encouraged to develop their depth and breadth of work as well as their own creative style. Students may continue on to AP Studio in Art.

0651D ADVANCED PLACEMENT ART AND DESIGN

PREREQUISITE: PORTFOLIO or PAINTING AND DRAWING II or GRAPHIC DESIGN II or ADVANCED PHOTOGRAPHY (with STUDIO ART) or TEACHER RECOMMENDATION
GRADE 12 ♦ FULL YEAR - 1 UNIT

ADVANCED PLACEMENT 2D ART AND DESIGN
ADVANCED PLACEMENT 3D ART AND DESIGN
ADVANCED PLACEMENT DRAWING

Advanced Placement Art and Design is a more specific and intensive course of study which involves developing a more advanced portfolio which will each consist of two sections:

(1) **Sustained Investigation** (60% of exam score): For all three portfolios, students will submit images and writing to document their inquiry-guided investigation through practice, experimentation, and revision:
- A minimum of 15 digital images that include works of art and design and process documentation.
- Typed responses to prompts, providing information about the questions that guided their investigation and how they practiced, experimented, and revised, guided by their questions.

(Continued next page)

(2) **Selected Works** (40% of exam score): For all three portfolios, students will submit works of art and design and writing to demonstrate skillful synthesis of materials, processes, and ideas:

- For all AP portfolios: 5 artworks with written responses describing the materials, processes, and ideas used.

This course supports inquiry-based learning, encouraging students to document their sustained investigation of materials, processes, and ideas through practice, experimentation, and revision. The portfolios will be open to diverse approaches to thinking and making, aligning with college, university, and contemporary disciplinary practices.

High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year. Approximately 20-40 hours of drawing/journaling over the summer is suggested.

0652 ADVANCED PLACEMENT ART HISTORY

GRADE 11-12 ♦ FULL YEAR - 1 UNIT

This course is offered every year at both high schools.

In Advanced Placement Art History, students will explore works of art from the ancient world through the 21st century. This course is designed to offer students the same breadth of content that an introductory college course in art history would provide. Activities in the class will include readings, power point presentations, comparisons, discussions, research, projects, videos, and museum visits. Students will gain knowledge of important works of art and architecture from around the world, including art from beyond the European tradition. Various art media will be studied, including painting and drawing, architecture, sculpture, and other media. Students will examine the historical context of visual ideas, theory and style by considering issues of politics, religion, patronage, gender, function and ethnicity. Additionally, students will be prepared to visually analyze all the major art forms using the elements and principles of design.

Approx. 15 - 20 hours of summer work, such as reading, a museum visit and some writing is suggested.

BUSINESS AND MARKETING COURSES AND SEQUENCE

As business educators, our goal is to prepare students to become productive, contributing members of our communities.

IMPORTANT INFORMATION ABOUT COURSES, SEQUENCE AND CLUBS

BUSINESS SEQUENCE: A 5-unit sequence in Business is one of the possible pathways to achieve a New York State Regents diploma with Advanced Designation.

COLLEGE CREDIT: SUNY (State University of New York) and SYRACUSE UNIVERSITY PROJECT ADVANCE (S.U.P.A)

You can earn college credits in many of our Business Courses. We have partnered with SUNY and Syracuse University to offer our students the opportunity to earn college credits that can transfer to colleges and universities across the country. The number of college credits you can earn is posted next to the course description. Not only can students earn college credit while in high school, but they can also take advantage of the reduced tuition rate as well.

Syracuse University Guaranteed Orange program rewards high school students who participate in Syracuse University courses through SUPA. Eligible students who complete at least 6 credit hours with a 3.0 cumulative GPA in their Syracuse University coursework and who maintain a high school GPA of 3.7 (on a 4.0 unweighted scale) or 4.7 (on a 5.0 weighted scale) are guaranteed admission to the College of Arts and Sciences. Students applying to other colleges within Syracuse University will not be guaranteed admission but will receive full consideration for those programs and may still be eligible for Guaranteed Orange. They are also eligible to receive a $20,000 annual tuition scholarship. Interested students may also visit the Guaranteed Orange webpage for details.

Career and Technical Education Endorsement on Diploma:

Career and Technical Education (CTE) is an extensive array of secondary and postsecondary instruction preparing students with technical/academic skills and behaviors to be successful in careers and further education.

The technical endorsement may be awarded to students who complete the requirements for any diploma type (local, Regents, or Regents with advanced designation) and also:

- complete a NYSED-Approved Career and Technical Education (CTE) program, Pittsford's Business Education Program has been awarded this distinction, and
- pass the 3-part technical assessment associated with the specific CTE program.

Business Management and Entrepreneurship (52.0201)	Marketing (52.1401)
Business Dynamics I (.5 unit)-22152 Business Dynamics II (.5 unit)-22152 CHOICE of One of the Following: Entrepreneurship (1 unit)-12053 Virtual Enterprises (1 unit)-12053 Work Experience in Business Management and Entrepreneurship (minimum of.5 unit) PLUS 1 unit of any business courses to earn a ***minimum*** of 3.5 credits in CTE.	Business Dynamics I (.5 unit)-22152 Business Dynamics II (.5 unit)-22152 Principles of Marketing (1 unit)-12164 and CHOICE of any two (2) of: Sports Marketing (.5 unit) OR Entertainment and Hospitality Marketing (.5 unit) OR Digital Strategies-12167 (.5 unit) Work Experience in Marketing (minimum of.5 unit) to earn a ***minimum*** of 3.5 credits in CTE.

Students enrolled in the PCSD's NYSED-approved CTE program who successfully complete all requirements earn a technical endorsement. The technical endorsement is imprinted on a seal to be affixed to the diploma.

In addition to the course work listed above students interested in the CTE endorsement must successfully complete the career acquisition common assessment and the industry standard Precision exam. This exam is administered in the spring of the students' senior year.

For more information regarding CTE please visit The NYS CTE Website.

BUSINESS and MARKETING HONOR SOCIETY of NEW YORK STATE

The primary purpose of the Business and Marketing Honor Society of New York State is to recognize those students who have demonstrated outstanding achievement in a secondary business/marketing program.

Eligibility

- Students must be currently enrolled in business/marketing (fall and/or spring)
- Seniors: Must complete 3 units in business/marketing by the end of the current school year
- Sophomores/Juniors: Must complete 2 units in business/marketing by the end of the current school year (student should be planning to continue for at least one additional unit prior to graduation)
- A 1 semester class (half year) is equivalent to ½ unit
- A 2 semester class (full year) is equivalent to 1 unit

Minimum Criteria

- GPA Business/Marketing Courses | 88% or B+ (3.5)
- GPA Overall | 80% or B (3.0)

Once inducted into the NYSBMHS, students must adhere to the following: 1) Take at least a minimum of one semester Business/Marketing course per year, for each remaining year of high school **and meet the units requirements above.** 2) Maintain the GPA criteria as stated above 3) Be in good standing with district guidelines as they pertain to the student/parent policies handbook.

If you have further questions regarding the NYSBMHS, please contact your respective school's Business Education Department Leader.

DECA is open to all students enrolled in a business or marketing class. It is a student-centered marketing education organization. Working hand-in-hand with the education and business communities, DECA's goal is for its student members to develop a "career success portfolio" to carry into their business and personal lives after graduation.

LIFE SMARTS (Sutherland High School Only) is an Internet-based competition comprised of students across the country. The competition covers topics in personal finance, consumerism, health and safety, technology, and the environment. The state level is operated in a game show setting and winners go to national competition.

STUDENT BOOKSTORE (MHS only) offers an opportunity for students to learn about managing a business. By volunteering in our student-run bookstore, students will gain hands on experiences that teaches them critical skills needed to succeed in today's work place such as time management and money management. Students can earn community service credit for their work!

WORK-BASED LEARNING EXPERIENCE - Receive high school credit for your part-time work. See page 19 for more information about Work-Based Learning Experience.

Business and Marketing Course Descriptions

It is strongly recommended that students interested in Business take both Business Dynamics I and II in their freshman year. These classes build a strong foundation for continuing on with upper-level Business electives. These classes are also REQUIRED for those who wish to have a CTE seal on their diploma.

0512 BUSINESS DYNAMICS I – CAREER MANAGEMENT

GRADES 9-12 ♦ SEMESTER 1 - ½ UNIT *REQUIRED class to receive a CTE seal on your diploma.*

Learning how business operates in the 21st century and understanding today's economy and business trends is essential to the success of our students. This fun, hands-on course gives you the opportunity to not only learn about business, but to explore your place in it — career readiness!

Business and Economics

Entrepreneurship—Learn what it takes to become an entrepreneur
Fundamentals of Business—Essential departments like marketing, accounting, management
Legal Forms of Business—Sole proprietorship, partnership, corporation
Basic Economic Concepts—Circular flow, supply and demand

Workplace Trends

Changing Workplace Trends: Where we've been and where we're going
Identify the skills necessary for the workplace of the future

Your Place in the World of Work

Career Decision Making Process

- Completion of self-assessments to discover your values, interests, aptitudes, personality traits and lifestyle goals

Career Research

Research and report on careers of interest—using the results of your self-assessments

Career Acquisition

Applications, create a resume, practice a job interview

0513 BUSINESS DYNAMICS II - FINANCIAL MANAGEMENT

GRADES 9-12 ♦ SEMESTER 2 - ½ UNIT - *REQUIRED class to receive a CTE seal on your diploma.*

Becoming financially literate is a key foundational piece to be successful in the global economic system.

Banking and Finance:

Understand the importance of financial responsibility
Checking and Savings Accounts
Basic Retirement Accounts

Credit:

Using credit wisely
How to read a credit report and understand a credit score

On the Job:

Your paycheck—how to calculate your "take-home" pay
Prepare income tax returns
Employer/employee rights and responsibilities
Payroll taxes – what are they?

(Continued next page)

Budgeting:

Create a budget
Complete a realistic and fun budgeting project where you will identify a career and beginning salary upon which you will build a budget

Identify a career and beginning salary upon which you will build a budget
Locate, rent, and furnish your first apartment
Purchase a car
Fixed versus variable expenses

Insurance

Car insurance, health insurance, renter's insurance, and life insurance

Consumerism

Comparison shopping

0515 PERSONAL COMPUTER KEYBOARDING

GRADES 9-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SUNY (OFT 111)

Keyboarding is a necessary skill for success in school, work and life! This semester course is designed for students who would like to master touch keyboarding techniques in the shortest possible time and increase keyboarding speed and efficiency. Specialized computer software is used, which makes achieving these goals fun! You will also learn and apply word processing basics to create business and personal documents. This course is recommended for all students.

0523 DATA DRIVEN BUSINESS ANALYSIS

GRADES 10-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SUNY (BUS 104)

This course provides students with hands-on experience with the analytical software tools and techniques that are used in today's businesses. Emphasis will be placed on the application of spreadsheet models for supporting management decision-making. A variety of spreadsheet-based cases in market research, financial analysis, accounting applications and other business domains will be utilized to show how to effectively analyze and solve business problems using the spreadsheet tool.

0528 LEADERSHIP DEVELOPMENT SEMINAR*

GRADES 9-12 ♦ SEMESTER

If you want to earn high school credit for your Career Internship Program (CIP) you must complete LDS.

This course is open to **all** students. Topics include:

- Workplace communication and resumes
- Integrity, ethics, and managing your digital footprint
- Vision and mission statements and effective leadership skills

You will build your personal leadership skills and refine your workplace acumen. Seminars meet once per cycle and students attend during either 5th, 6th or 7th period and may eat during the seminar.

We suggest students take this freshman year where they have more flexibility in their schedules.
Leadership Development Seminar is referenced in more detail under Experiential Learning on page 75.

0547 WORK-BASED LEARNING EXPERIENCE*

GRADES 9-12 ♦ FULL YEAR - ½ TO 1 UNIT OBTAINABLE EACH OF THE FOUR YEARS OF HIGH SCHOOL THIS CLASS IS *REQUIRED* TO RECEIVE A CTE SEAL ON YOUR DIPLOMA

The Work-Based Learning Experience Program provides students with an opportunity to gain practical work experience related to their classroom instruction by working in jobs within the community. Upon successfully completing the requirements of the work-based learning experience program, you will earn:

- one-half (½) unit of academic credit for 150 hours of work experience
- or one (1) unit of academic credit for 300 hours of work experience for each year that you are enrolled in the program

Students are eligible to enroll in the Work-Based Learning Experience class EVERY year during high school as long as they worked over the summer or work during the school year. Successful completion of the course is based on hours worked and attendance and participation in weekly seminars. Seminars meet once per cycle and students attend during one of their lunch periods. This program is under the supervision of a certified CTE teacher coordinator.

Work-Based Learning Experience is referenced in more detail under Experiential Learning.

0532 ADVANCED MICROSOFT APPLICATIONS

GRADES 9-12 ♦ SEMESTER - ½ UNIT and FOUR (4) COLLEGE CREDITS - SUNY (CRC 125)

The key to productivity is the ability to integrate the capabilities of software. This computer course utilizes realistic activities and projects designed for learning and integrating the Microsoft Office suite of application software: Word, Excel, Access, and PowerPoint.

You will:

- Learn how to prepare professional-looking documents using in-depth advanced word processing skills
- Become competent in database management using Access
- Create Excel spreadsheets, execute formulas and create charts
- Learn and utilize the full range of PowerPoint capabilities

0533 ACCOUNTING

GRADES 10-12 ♦ FULL YEAR - 1 UNIT and FOUR (4) COLLEGE CREDITS - SUNY (ACC 101)

This course introduces you to the "**Language of Business."** Accounting information is the financial foundation for making important business decisions throughout your career and personal life. Whether you manage a business, make investments, or monitor how you receive and use your money, you are working with accounting concepts and accounting information. In this course you will:

- Develop an understanding of the concepts and principles of financial accounting for the business enterprise
- Capture economic events by recording business transactions using double-entry techniques
- Measure net income and prepare financial statements
- Prepare adjusting and closing procedures

On-line resources supplement the curriculum, and realism is created through the use of case studies.

Accounting is strongly recommended for all students who will be pursuing a business program after graduation as it provides you with an excellent background for collegiate business courses.

0534 LAW FOR BUSINESS & PERSONAL USE

GRADES 11-12 ♦ FULL YEAR - 1 UNIT and THREE (3) COLLEGE CREDITS - SUNY - LAW 101

Students in Law for Business & Personal Use will gain greater understanding and appreciation of their legal rights and responsibilities with a focus on business related law. Students will learn basic principles of law which affect businesses and consumers.

Topics covered include:

- Our court systems
- The impact of ethics on our laws and decisions
- Family Law
- Criminal Law
- Civil Law
- Property Law
- Estate Law
- Contract Law

0535 PRINCIPLES OF MARKETING

GRADES 11-12 ♦ FULL YEAR - 1 UNIT and THREE (3) COLLEGE CREDITS - SYRACUSE UNIV. MAR 301
THIS CLASS IS *REQUIRED* TO RECEIVE MARKETING CTE SEAL ON YOUR DIPLOMA

Marketing is one of the most important functions in the modern American company today. Billions of dollars are spent each year on products, advertising, and promotion.

Students will develop an understanding of how companies use marketing frameworks to create value for their stakeholders, e.g., customers, shareholders, and employees. Key marketing concepts and terminology will be presented, enabling students to better understand how marketing decisions are implemented in practice. Students will analyze how customers make purchase decisions and recognize how marketing strategies and tactics influence consumer behavior.

Learning Outcomes:

- Know marketing concepts and strategies.
- Recognize the importance of customer needs and wants for marketing decision-making.
- Understand the processes and techniques used in marketing decision-making.
- Understand how value is created by the marketing of goods and services.
- Recognize the complexity of marketing decision making
- Comprehend the opportunities and challenges offered by international marketing.

Principles of Marketing is recommended for all students who will be actively participating in DECA and/or those students pursuing a marketing/business career or a college marketing program after graduation.

0536 ENTREPRENEURSHIP

GRADES 11-12 ♦ FULL YEAR - 1 UNIT and THREE (3) COLLEGE CREDITS - SYRACUSE UNIV. (EEE 370) [MHS: OFFERED IN 2026-2027, SHS: OFFERED YEARLY]

THIS CLASS IS ONE OF TWO OPTIONS REQUIRED TO RECEIVE THE BUSINESS MANAGEMENT AND ENTREPRENEURSHIP CTE SEAL ON YOUR DIPLOMA

Welcome to the entrepreneurial revolution! This class is an introductory course intended to provide students with a solid foundation in terms of the vital role played by entrepreneurs and entrepreneurship in the 21st century global economy. Entrepreneurship is approached as a way of thinking and acting, as an attitude and a behavior.

Course Objectives

The course is built around a number of core objectives. By the end of the semester, you should be able to:

- Recognize the entrepreneurial potential within yourself and others in your environment
- Understand the process nature of entrepreneurship, and ways to manage the process
- Develop an appreciation for opportunity, how to recognize it, and how to evaluate it
- Appraise the nature of creative new business concepts that can be turned into sustainable business ventures

0538 ENTERTAINMENT/HOSPITALITY MANAGEMENT & MARKETING

GRADES 10-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SUNY (BUS 135)

THIS CLASS IS ONE OF THREE REQUIRED TO RECEIVE MARKETING CTE SEAL ON YOUR DIPLOMA

Entertainment and hospitality is all around us – not just at the theater or hotels – but on television, radio, in stores and on the Internet. This industry has allowed the United States economy to be one of the most successful in the world. Entertainment and Hospitality play an important role in our global economy. Patrons and companies spend billions of dollars each year on travel, television, restaurants, music and movies. Over 200 American universities today offer majors in Entertainment and Hospitality Management and Marketing as part of their business curriculum.

This course looks at management and marketing through the eyes of the entertainment and hospitality business, allowing you to learn how to:

- Identify marketing trends/concepts and apply them to television, music concerts, event planning, popular resorts and more
- Discover how entertainers manage their careers and market their creative works
- Apply the principles of business management and marketing in event planning and restaurant projects
- Create winning logos, slogans and mission statements for event planning, theme restaurant, and travel agency businesses.

You will immerse yourself in a number of exciting real-world team projects that will allow your creativity to flow as you apply the management and marketing skills you have learned. Guest speakers will supplement your classroom instruction. Students who are considering a career or a degree in this dynamic field, would benefit greatly from taking this class.

0539 SPORTS MARKETING & MANAGEMENT

GRADES 10-12 ♦ SEMESTER - ½ UNIT
THIS CLASS IS ONE OF THREE REQUIRED TO RECEIVE MARKETING CTE SEAL ON YOUR DIPLOMA

Get ready to learn about one of the fastest and most exciting businesses in the world through this project-based course! Fans and companies spend billions of dollars each year on sports. It is one of the largest exports from the United States to the rest of the world. Universities across the United States today offer major concentrations in sports marketing and management. The Sports Marketing and Management course will help you:

- Learn the basic functions of the sports industry
- Develop a virtual franchise and make all the decisions for promoting and managing it including:
  - Developing promotional plans which may consist of television, radio, and print ads
  - Working collaboratively to create logos, slogans, and merchandise for your team to create "brand identity"
- Learn the management process, roles, and skills needed by sports managers in this dynamic industry
- Gain knowledge of the history of sports, sports skills, and attitudes needed to be a manager
- Learn the basic functions and responsibilities of management as they apply to sporting events and facilities

In addition, you will explore the exciting variety of careers in sports marketing and management.

0541 WEB PAGE DESIGN

GRADES 10-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SYRACUSE UNIV. (IST 263) [OFFERED AT SHS ONLY]

This web design course teaches you how to plan, organize, and create a web site from start to finish. Using Notepad++, you will learn a wide variety of code for HTML, CSS, jQuery, Bootstrap, and WordPress to create and manage professional-quality sites. You will also learn how to create web sites using responsive design, which allows the device you are using to read web pages differently and more effectively from one device to the next, including your smartphones and tablets. This project-based course teaches you essential web development skills in some of these web page elements:

- Hyperlinks
- Tables
- Formatting tools
- Image maps
- Thumbnail images
- Style sheets and much more!

This course is recommended for those students who want to: Develop or improve your web design skills; create or improve your personal web site; and explore web design as a possible career choice.

By the end of this course, you will have created a well-designed web site while having fun along the way.

0551 FINANCIAL PLANNING

GRADES 10-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SUNY (ECO 103)

Financial Planning is designed to develop the skills necessary to be financially competent. This course incorporates all financial aspects from birth to estate planning. Financial Planning is a computer-based semester course that teaches you the importance of starting young—to budget, save, invest, and plan for your financial success.

Topics covered Include:

- What is Financial Planning?
- Paychecks and Taxes
- Financial Institutions and Savings Options
- Credit and Credit Scores
- Paying for Higher Education
- Investing Your Money
- Insurance

A virtual stock market simulation is employed throughout the semester. You will also learn how financial software and on-line resources can be utilized to help you make important investment decisions. You will be better equipped to manage your money in our challenging economic environment on completion.

***Students will have the opportunity to receive Financial Literacy Certification through the National W!se Financial Literacy Program.**

0553 VIRTUAL ENTERPRISE PROGRAM

GRADES 11-12 ♦ FULL YEAR - 1 UNIT and THREE (3) COLLEGE CREDITS - SUNY (BUS 110)
THIS CLASS IS ONE OF TWO OPTIONS REQUIRED TO RECEIVE THE BUSINESS MANAGEMENT AND ENTREPRENEURSHIP CTE SEAL ON YOUR DIPLOMA

The Virtual Enterprise classroom is designed to simulate an authentic business environment with traditional business equipment, furniture, and accessories. The course is aimed at the student who has demonstrated an interest and/or ability in owning, operating, or managing a business. Class size is limited.

Your business enterprise can be in any line of business from service to manufacturing, wholesale to retail. Using the student-developed company website, telephone, email, and other sources of communication you will:

- Interact with an international network of virtual firms to complete all of the real world tasks that are performed by a business
- Secure financing for your business
- Obtain needed materials and supplies to run your business
- Effectively market and promote your products and services to Virtual Enterprise companies throughout the world!
- Create a comprehensive promotional plan for your business including advertisements, sales promotions, commercials, and trade show booths

Although there is no actual transfer of funds, all the usual business transactions take place in an authentic on-line simulation where:

- Financing is obtained
- Inventory is maintained
- Orders are sent
- Invoices are issued
- Financial records are maintained
- Employees and taxes are paid

Real-life competition happens at regional and international trade shows.

0554 DIGITAL BUSINESS STRATEGIES

GRADES 10-12 ♦ SEMESTER - ½ UNIT
THIS CLASS IS ONE OF THREE REQUIRED TO RECEIVE MARKETING CTE SEAL ON YOUR DIPLOMA

Electronic Commerce has dramatically changed the way business is conducted today. Communications and transactions are firmly entrenched within the on-line, global economy!

In this authentic project-based computer course, you will learn both cutting-edge technology currently being used and how to operate an online business through the sale of items on various marketplace apps such as *letgo, Facebook*, *eBay*, etc. The topics covered are:

- Basic functions of sales and marketing
- Business aspects of e-commerce including development of an on-line store with Wix.com
- Electronic retailing—how it changed the way products and services are sold
- Internet—how it has impacted shopping, travel, banking, real estate and retail industries
- Internet security—cybercrime and auction technology
- Manage an electronic financial portfolio
- On-line marketing techniques used by industry powerhouses such as Amazon, eBay and Alibaba
- Social media—YouTube, Facebook, Pinterest, blogs, and Twitter—not just for kids anymore! How do businesses use it?

0555 INTRODUCTION TO CYBER SECURITY

GRADES 11-12 ♦ SEMESTER - ½ UNIT and THREE (3) COLLEGE CREDITS - SYRACUSE UNIV. (IST 323) [OFFERED AT SHS ONLY]

Cyber Security (IST 323) is a course that presents fundamental concepts of security, network organization and operation. It will introduce mechanisms and the history of software, hardware, and OS security. Students will differentiate between physical, organizational and personal security. Introduction to Cybersecurity consists of lecture and hands on lab components. By the end of the course, students will be able to:

- Understand how a network functions
- Monitor a network's functions and performance
- Control a network's configuration
- Determine what security is and how it relates to a network
- Detect and respond to an attack on a network
- Determine if a network is vulnerable to an attack
- Identify the threats to a network
- Prevent harm to a network
- Analyze the impact of the protection

ENGLISH COURSES AND SEQUENCE

9-11th Grade Course Offerings

Ninth graders must register for one full-year English course (one English credit).

Tenth and eleventh graders must register for one full-year English course (one English credit). They may also take either or both of the semester-long electives.

GRADE	HONORS* *(*Teacher Recommendation Required)*	REGENTS	Semester Electives (½ year)
9	**English 9 Honors***	**English 9**	
10	**English 10 Honors***	**English 10**	**Creative Writing** **Public Speaking** *These semester-long electives are open to 10-12th graders.* *These courses do not count toward the required four units of English.*
11	**English 11 Honors*** or **AP Language and Composition***	**English 11**	

12th Grade Course Offerings

Twelfth graders must register for at least one full-year English course (one English credit). They may also take either or both of the semester-long electives.

Seniors will choose from 10 full-year courses, each with a distinct concentration appealing to different student interests. Students will rank their top three choices for their senior full-year course. All courses incorporate diverse voices, media literacy, speaking and listening, and all other New York State and District Standards. Each course is a culmination of a student's English Language Arts Education and preparation for their post-secondary experience.

****Each of these courses requires a year-long Senior Inquiry into a question or problem of the student's choice, resulting in a media-supported presentation. (Description next page.)

Full-year Choices**	Semester Electives
English 12 with a Concentration in the **Art of Public Speaking, Composition, and Rhetoric****	**Creative Writing** **Public Speaking** *These semester-long electives are open to 10-12th graders. These courses do not count toward your required four units of English.*
English 12 with a Concentration in **Creative Writing****	
English 12 with a Concentration in **Critical Media Literacy****	
English 12 with a Concentration in **Film Analysis and Theory****	
English 12 with a Concentration in **Human Expression and Experience****	
English 12 with a Concentration in **Theater Arts****	
English 12 with a Concentration in **Visibility: Investigating Race, Class, Ability, and Gender in Language and Literature****	
English 12 with a Concentration in **Composition and Contemporary Texts**** *(Teacher Approval Required)*	
English 12 Honors with a Concentration in **British Literature**** *(Teacher Recommendation Required)*	
Advanced Placement English Literature and Composition** *(Teacher Recommendation Required)*	

NEW YORK STATE BOARD OF REGENTS EXAM IN ENGLISH LANGUAGE ARTS

All students must pass the New York State Regents exam in English Language Arts (Common Core). The three-hour exam is administered at the end of the eleventh grade year. It requires 24 multiple choice questions on readings, one source based argumentative essay, and a shorter text analysis.

**THE SENIOR INQUIRY

The Inquiry reflects the culmination of the English curriculum at PCSD and strives to engage students' imaginations, creativity, and passions. Every senior will generate a question or problem and, informed by planning, sustained inquiry, and research, will articulate a position on the question or problem. Students will draw from their journey of learning, their reading and reflection, to make a statement that serves as their own insight and response to their overarching question, given the work they've done to date. Students will share the results of their inquiry in writing and in a media-supported presentation. The presentation should not be a mere reading of their paper, but rather recognize the different audiences of a live presentation compared to a written piece. The senior student inquiry could take many forms—a traditional academic inquiry, an Advocacy Project, Passion Project, narrative search (i.e., I-Search), creative project, or other appropriate teacher-approved formats.

WRITING CONFERENCES

The English department is committed to the improvement of student writing. Teacher/student conferences are an integral part of the program at all levels.

LEVELS OF CHALLENGE

REGENTS

Regents courses require a solid investment of time for a wide range of students who have satisfactorily mastered the previous year's content and skills. Regents students are expected to write frequently in a variety of genres, comprehend and discuss difficult and varied literary works, and demonstrate independence in time management.

HONORS

Honors courses are designed for students who have demonstrated a high aptitude and interest in English literature and writing. Honors students are expected to learn quickly, to work independently, to read sophisticated and varied works of literature in depth, to understand abstract ideas, to participate in lively discussion, to write skillfully, and to budget time independently.
Enrollment requires teacher recommendation.

ADVANCED PLACEMENT

The AP English courses are college level courses for those students who are highly motivated and wish to pursue the serious study of literature and writing. Readings are sophisticated and varied. Required writings include multiple page papers and some research. Students choosing these courses need exemplary study skills and a serious commitment to the study of writing and literature. In order to be eligible to take AP English, **students must have a teacher recommendation from their current English teacher.** Course average could indicate readiness but is not the sole factor in teacher recommendations.

ELECTIVES (non-English credit bearing)

0043 PUBLIC SPEAKING

PREREQUISITE: ENGLISH 9
GRADES 10-12 ♦ SEMESTER - ½ UNIT

Students will write, deliver and evaluate a variety of informal and formal speeches; exemplary models will be presented for purposes of comparison. They will also learn the literary techniques and presentation skills employed in the writing and delivery of such speeches.

0044 CREATIVE WRITING

PREREQUISITE: ENGLISH 9
GRADES 10-12 ♦ SEMESTER - ½ UNIT

This course is for students who want to develop their writing skills in fiction, creative non-fiction, poetry and drama. Students will also develop criteria with which to judge their own and others' writing through reading and studying published pieces. They will develop a portfolio of their work and make an effort to publish in either the school literary magazine or local and state writing contests.

ENGLISH COURSES, 9-11th GRADES

0012 ENGLISH 9 REGENTS

GRADE 9 ♦ FULL YEAR - 1 UNIT

This course covers the major areas of English Language Arts: reading, writing, speaking, and listening. Students will read and analyze a variety of literature genres, including at least one of Shakespeare's plays. Students will focus on writing, the writing process, research skills, and literary analysis.

0011 ENGLISH 9 HONORS

PREREQUISITE: TEACHER RECOMMENDATION
GRADE 9 ♦ FULL YEAR - 1 UNIT

This course includes additional works of literature and requires writing at the honors level of challenge. The literature is taken from a variety of sources and genres. Consistent, lively, and sophisticated participation is expected.

0022 ENGLISH 10 REGENTS

PREREQUISITE: ENGLISH 9
GRADE 10 ♦ FULL YEAR - 1 UNIT

Students will study literature by genre: novel, short story, drama, poetry, and non-fiction. Essay writing is emphasized, along with the research process. Discussions and literary analysis will be conducted at the Regents level of challenge.

0021 ENGLISH 10 HONORS

PREREQUISITE: ENGLISH 9 AND TEACHER RECOMMENDATION
GRADE 10 ♦ FULL YEAR - 1 UNIT

Students will read literature from pre-classical to modern times in different genres. Students will continue developing their writing skills in exposition, literary interpretation, and research at the honors level of challenge. Consistent, lively, and sophisticated participation is expected.

0032 ENGLISH 11 REGENTS

SURVEY OF AMERICAN LITERATURE

PREREQUISITE: ENGLISH 10
GRADE 11 ♦ FULL YEAR - 1 UNIT

This course focuses on American literature from the country's earliest days to its most recent in the form of novels, plays, shorts stories, and poems. A wide variety of writing tasks develop students' skills for the Regents exam, senior level English, and their plans after high school.

The course concludes with the NYS Regents Examination in English Language Arts.

0031 ENGLISH 11 HONORS

SURVEY OF AMERICAN LITERATURE

PREREQUISITE: ENGLISH 10 AND TEACHER RECOMMENDATION
GRADE 11 ♦ FULL YEAR - 1 UNIT

This course includes literature from Colonial America to the present. Students will study the elements that make up the movements of American literature and will consistently make connections between literature and culture. Discussion and writing focus on textual analysis at the honors level. Independent study skills and active participation in class discussion are expected. Consistent, lively, and sophisticated participation are expected.

The course concludes with the NYS Regents Examination in English Language Arts.

0052 ADVANCED PLACEMENT ENGLISH LANGUAGE AND COMPOSITION

RHETORICAL STRATEGIES AND AMERICAN LITERATURE

PREREQUISITE: ENGLISH 10 AND TEACHER RECOMMENDATION, COURSE-SPECIFIC SUMMER READING
GRADE 11 ♦ FULL YEAR - 1 UNIT

An AP English Language and Composition course cultivates the reading and writing skills that students need for college success and for intellectually responsible civic engagement. The course guides students in becoming curious, critical, and responsive readers of diverse texts and becoming flexible, reflective writers of texts addressed to diverse audiences for diverse purposes. The reading and writing students do in the course should deepen and expand their understanding of how written language functions rhetorically: to communicate writers' intentions and elicit readers' responses in particular situations. Students will also complete the AP WE Service Project to build and demonstrate skills such as: civic engagement; leadership; critical thinking and analysis; and communication and collaboration.

ENGLISH 12 COURSE OFFERINGS

0040.PS ENGLISH 12

WITH A CONCENTRATION IN THE ART OF PUBLIC SPEAKING, COMPOSITION, AND RHETORIC

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

What makes some speeches more memorable than others? What makes some speakers more memorable than others? Why do we need to skillfully communicate aloud in a digital world? Should all public speaking be persuasive? In this course, we will write, deliver, and evaluate a variety of formal and informal speeches and learn how to critique each other's work and exemplary texts. We will practice a host of rhetorical techniques and presentation skills in our own writing and delivery. Through extensive reading, writing, and practice, the course will cultivate confidence for a variety of speaking situations, including academic, professional, social, and persuasive.

*****All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.***

0040.CW ENGLISH 12

WITH A CONCENTRATION IN CREATIVE WRITING

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

Why do we write? Where do we find inspiration? What is good writing? How do authors engage readers? Students will broaden their writing skills in fiction, creative non-fiction, poetry, and drama, developing their own style and imagination in a workshop environment. Students will also critique their own and others' writing, and experiment with different styles, structures, and techniques. Good writers read a lot and write a lot. We will do both.

*****All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.***

0040.MED ENGLISH 12

WITH A CONCENTRATION IN CRITICAL MEDIA LITERACY

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

What sources of information affect our attitudes, behaviors, and values? How are so many of us enticed and manipulated by media? How do we know what to believe? What does it mean to be media literate? In this course we will develop the skills necessary to critically consume and create media. Through extensive reading, analysis, and writing, students will learn how to understand and utilize contemporary media and examine its philosophical, psychological, and social impacts.

*****All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.***

0040.FLM ENGLISH 12

WITH A CONCENTRATION IN FILM ANALYSIS AND THEORY

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

Why study film? Is film art? Is it entertainment? Does it determine or reflect popular culture? What makes a film great? In this course, students will read extensively, including novels, and write both analyt-

(Continued next page)

ical and creative pieces. We will study film by applying much of the terminology of literary analysis to the process of "reading" a film. We will pay close attention to elements that differ from literature, including editing, camera work, mise en scene, special effects, acting, and design elements. We will also examine the major directors, genres, movements, and theories in film history.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0040.HUM ENGLISH 12

WITH A CONCENTRATION IN HUMAN EXPRESSION AND EXPERIENCE

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

What does it mean to be human? What are our enduring questions and how do we address them? How do we express ourselves? This course investigates the cultural practices and movements that define us as human beings: our art, philosophy, and beliefs. We will explore a wide range of the facets of the human condition, including literature, film, fashion, justice, art, design, architecture, dance, and music.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0040.THE ENGLISH 12

WITH A CONCENTRATION IN THEATER ARTS

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

What is the place of live theater in the modern, digital world? What is the relationship among the audience, the performance, and the text? In this course, we will read and analyze dramatic literature that reflects a wide range of styles, methods, and time periods. Students will also write in a variety of modes, both creative and analytical. In addition, the course will introduce students to aspects of theater such as: direction, stage management, production, acting, rehearsal, performance, lighting, and sound. Students will explore warm-up exercises, improvisation, projection and diction, stage movement, script analysis, and design elements.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0040.VIS ENGLISH 12

WITH A CONCENTRATION IN VISIBILITY: INVESTIGATING RACE, CLASS, ABILITY, AND GENDER IN LANGUAGE AND LITERATURE

PREREQUISITE: ENGLISH 11

GRADE 12 ♦ FULL YEAR – 1 UNIT

How can literature help us understand ourselves and others? What about us is visible? What about us is invisible? How is representation important? In this course, students will investigate and thoughtfully respond to the portrayal of race, class, ability, gender, and other perspectives presented in literature. We will seek understanding of historically marginalized groups through writing, reading, discussion, and analysis of social and cultural issues reflected in a variety of text types, including novels, non-fiction, short stories, poetry, film, and other media.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0040.COM ENGLISH 12

WITH A CONCENTRATION IN COMPOSITION AND CONTEMPORARY TEXTS

PREREQUISITE: ENGLISH 11 AND TEACHER APPROVAL

GRADE 12 ♦ FULL YEAR – 1 UNIT

How can we get other people to understand our ideas? What options do we have when we communicate and create? How do we improve what we have created? How do reading and writing help us understand ourselves and the world? This course will prepare students for college and career by improving writing, reading, discussion, and analysis skills. We will write extensively, in both analytical and creative modes, employing all stages of the writing process. Studies will include relevant issues in modern-day literature, nonfiction, and media. This class will be limited in size in order to meet individual needs.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0041 ENGLISH 12 HONORS

WITH A CONCENTRATION IN BRITISH LITERATURE

PREREQUISITE: ENGLISH 11 AND TEACHER RECOMMENDATION, COURSE-SPECIFIC SUMMER READING

GRADE 12 ♦ FULL YEAR – 1 UNIT

How have British authors, culture, and history influenced our language and literature? How are British classics, including poetry, relevant today? How can studying this literature help us understand ourselves and others? This survey course offers a rigorous, in-depth study of prose and poetry with an emphasis on literary movements, from the Anglo-Saxon to the present, and their respective contributions to the Western intellectual tradition. Readings will also include literary criticism. We will write in the various modes expected in college, including both analytical and creative responses.

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0051 ADVANCED PLACEMENT ENGLISH LITERATURE AND COMPOSITION

PREREQUISITE: ENGLISH 11 or AP ENGLISH LANGUAGE AND COMPOSITION; TEACHER RECOMMENDATION; COURSE-SPECIFIC SUMMER READING

GRADE 12 ♦ FULL YEAR - 1 UNIT

Why should we study literature? How can an advanced study of literature be both practical and personally fulfilling? How can we develop a discerning eye and an appreciation for the written word? In this course we will generate questions and seek answers through critical analysis of texts. According to the College Board course description, "The AP English Literature and Composition course focuses on reading, analyzing, and writing about imaginative literature (fiction, poetry, drama) from various periods. Students engage in close reading and critical analysis of imaginative literature to deepen their understanding of the ways writers use language to provide both meaning and pleasure. As they read, students consider a work's structure, style, and themes, as well as its use of figurative language, imagery, and symbolism. Writing assignments include expository, analytical, and argumentative essays that require students to analyze and interpret literary works. The AP English Literature and Composition course aligns to an introductory college-level literature and writing curriculum."

All students will complete a substantial Senior Inquiry project culminating in a paper and media-supported presentation.

0828 HEALTH EDUCATION

GRADE 10 ♦ SEMESTER - ½ UNIT

The Health Education requirement for secondary students is met by successfully completing a semester of instruction in grade 10.

The goal of Health Education is to help students acquire the skills and knowledge necessary to independently make healthy and responsible choices regarding their personal wellness throughout their lifetime. Health Education provides students a safe, structured environment in which they can explore and discuss with their peers and teacher important health issues. Skills and topics included in this course are selected based on guidance from NYS Standards and mandates, National Health Education Standards, as well as local Youth Risk Behavior Statistics. Students in Health Education will also receive active training in the New York State mandate of Hands-Only CPR and a basic introduction to the Automatic External Defibrillator (AED).

Skills and knowledge taught in Health Education include:

Wellness: Stress management, time management, sleep, nutrition, positive body image, humor, goal setting, and lifestyle diseases.

Mental Wellness: Mental health, depression, anxiety disorders, eating disorders, suicide prevention, self-injury prevention; accessing community resources for help; how to be a supportive friend.

Substance Abuse Prevention: Perceptions of peer drug use, drug categories, nicotine, alcohol, addiction, DWI, and the NYS mandate of heroin/opioid abuse.

Relationships: Healthy/unhealthy/dangerous relationships, communication, expectation, limitations, and individual rights.

Sexual Health: abstinence, birth control and condoms, pregnancy, sexually transmitted illnesses, HIV and AIDS, components of human sexuality, consent, sexual assault, sexting laws and issues, and sexual decision-making.

LIBRARY EDUCATION INSTRUCTIONAL PROGRAM

The School Library instructional program is based on the national standards of the American Association of School Librarians. These standards promote inquiry-based learning and foster the development of foundational, transferable skills that students will use to continue learning throughout their lives. Students are encouraged and empowered to become independent thinkers, skilled researchers and creative communicators.

Students are taught how to plan and structure their research, apply effective online search strategies and evaluate information according to specific criteria. They learn to use a variety of tools and media to effectively communicate, create and share their knowledge with others. As members of a learning community, they are taught to respect intellectual property and to adhere to the principles governing the legal and ethical use of information and ideas.

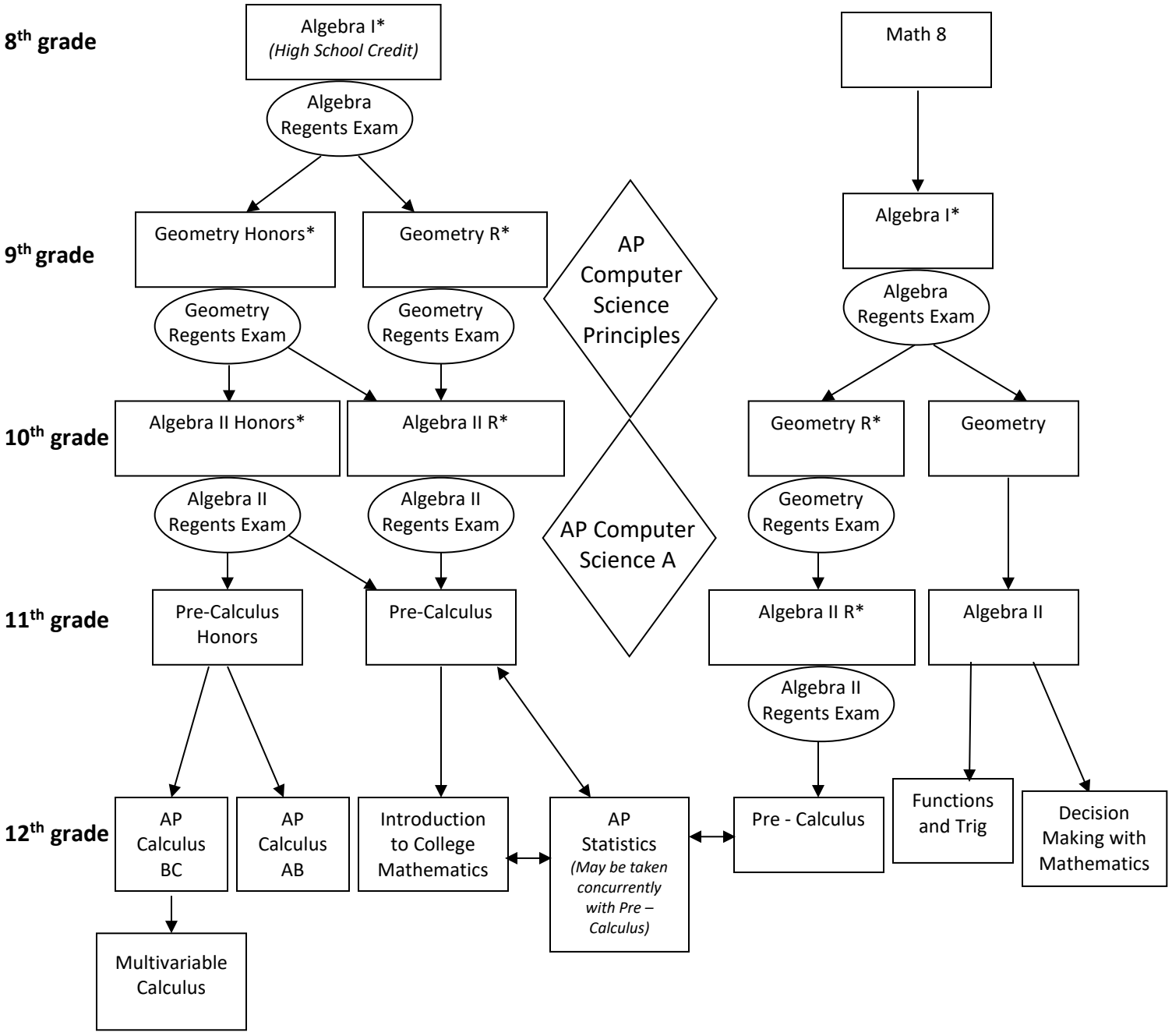
Working with rich collections of print and digital materials, students learn to use multiple sources of information and to seek out diverse opinions and perspectives as they construct their own understandings. Reading for enjoyment is encouraged and supported by strong collections of popular fiction, non-fiction and graphic novels. Reader's advisory services are available from all library staff.

Resources
With their extensive collections of carefully selected books, eBooks, periodicals, online databases, and digital repositories of downloadable images, audiobooks and video recordings, the MHS and SHS libraries provide students and staff with access to millions of high-quality educational resources. As members of the BOCES School Library System and Rochester Regional Library Council, the libraries can borrow materials for students and staff from hundreds of area school, public and college libraries. The library's Web-based catalog and online resources can be accessed from any Internet-connected device twenty-four hours a day, seven days a week.

Facilities
The school library has instructional spaces equipped with computers, interactive boards and multimedia projectors as well as quiet spaces for individual and group study and reading. Computers, copiers, printers and scanners are available for use by classes and individuals.

Staff
Each library is staffed by a full-time school librarian. School librarians hold Master's Degrees and New York State Teacher certification. The library support staff includes paraprofessionals and a secretary.

MATHEMATICS COURSES AND SEQUENCE



*For those courses that culminate in a Regents exam, course credit is awarded only upon completion of that exam.

Students entering ninth grade are required to successfully complete a minimum of three years of high school mathematics and achieve a passing grade on the NYS Algebra I Regents Exam. In addition to the Regents Diploma requirements, students pursuing the Regents Diploma with Advanced Designation will need to achieve a passing grade on the NYS Geometry and NYS Algebra II Regents Exams.

CALCULATORS

Graphing calculators are required for all NYS Regents Exams in Mathematics. They will be used in lessons, assignments, and assessments throughout the year to develop students' mathematical reasoning and technology skills to aid in problem solving. If purchasing a graphing calculator, the mathematics department recommends the TI-NspireCX (the latest model is the Nspire CX II CAS). The CAS feature must be turned off during Regents Exams.

The CAS (Computer Algebra System) is allowed on the College Board AP Calculus and AP Statistics Exams.

0217 ALGEBRA I

PREREQUISITE: MATH 8
FULL YEAR - 1 UNIT

Students begin the high school mathematics program studying key features of linear, exponential, and quadratic functions. Students translate between verbal descriptions and algebraic representations, using interpretation and reasoning. They recognize arithmetic sequences as linear functions and geometric sequences as exponential functions. Students learn to solve quadratic equations using a variety of methods including factoring, the quadratic formula and completing the square. The students solve systems of equations graphically and algebraically, including a quadratic linear pair and rational solutions. Students represent and analyze data using two-way frequency tables, regression lines, and box plots. Students are required to use a graphing calculator in this course. The course concludes with the NYS Algebra I Regents exam.

0216 GEOMETRY R

PREREQUISITE: ALGEBRA I
FULL YEAR - 1 UNIT

In this course students begin to formalize and broaden their geometry experiences with precise definitions, proof, trigonometry, and three-dimensional shapes. Congruence and similarity are explored and understood through coordinate geometry, proof, and transformations. Right triangle trigonometry and the Pythagorean theorem are applied to real-world and mathematical problems. Students reason with two and three-dimensional models to solve a wide variety of volume application problems. Students use a graphing calculator and/or dynamic software to visualize and investigate geometric constructions, circles and theorems about triangles and quadrilaterals. This course concludes with the Geometry Regents Exam.

0216H GEOMETRY HONORS

PREREQUISITE: ALGEBRA I AND TEACHER RECOMMENDATION
FULL YEAR - 1 UNIT

This course is offered to very motivated students who have shown a high aptitude in mathematics and outstanding performance in Algebra I. Topics listed in Geometry (above) will be studied in this class in greater depth with more challenging applications. Students will develop a precise approach to proof that includes indirect proof. Rigorous problem-solving skills continue to develop connecting advanced algebra skills to geometry concepts. Students are required to use a graphing calculator in this course. This course concludes with the NYS Geometry Regents exam.

0219 GEOMETRY

PREREQUISITE: ALGEBRA I
FULL YEAR - 1 UNIT

In this first year of Geometry, students will explore the topics of planar geometry, and polygons with a focus on triangles and quadrilaterals, circles, measurement, and three-dimensional solids. Students apply and reinforce their algebra skills by solving geometry problems in context and investigating applications. Students verify attributes of figures using coordinate geometry and transformations. Students are introduced to the concept of geometric proof. Students are required to use a graphing calculator in this course. (Students have the option to take the Regents exam.)

0218A ALGEBRA II R

PREREQUISITE: GEOMETRY R
FULL YEAR - 1 UNIT

Students continue their study of functions including polynomial, exponential, rational and radical functions. They build and interpret functions that model a relationship between two quantities by analyzing key features of the graphs and equations. Students make sense of periodic behavior as they study trigonometric functions and build fluency with values of sine, cosine, and tangent at various angle measures. Equation solving strategies expand to include higher degree polynomials and quadratics over the complex number system and exponential equations using the properties of logarithms. Coursework includes probability, statistics, modeling and applications with extensive use of the graphing calculator**.** The course concludes with the NYS Algebra II Regents exam.

0218H ALGEBRA II HONORS

PREREQUISTE: GEOMETRY H AND TEACHER RECOMMENDATION
FULL YEAR - 1 UNIT

For students who have shown a high aptitude in math and outstanding performance in previous math classes, this course continues the study of algebra at the intermediate level covering the same topics as above but in greater depth with challenging extensions. The course concludes with the NYS Algebra II Regents exam.

0218R ALGEBRA II

PREREQUISITE: GEOMETRY R OR GEOMETRY
FULL YEAR - 1 UNIT

Students enrolled in this course study the intermediate algebra portion of the Algebra II R curriculum. They continue their study of functions including polynomial, exponential, rational, radical and logarithmic functions. They build and interpret functions that model a relationship between two quantities by analyzing key features of the graphs and equations. Equation solving strategies expand to include higher degree polynomials and quadratics over the complex number system. Systems of simultaneous equations including polynomial systems, are solved analytically and graphically. Throughout the course, the graphing calculator is used for modeling and applications. This course concludes with a local final exam.

0248H PRECALCULUS H

PREREQUISITE: ALGEBRA II HONORS AND TEACHER RECOMMENDATION
FULL YEAR - 1 UNIT

This course is designed for the most capable students who will study function theory and applications of polynomials and rational functions, inequalities, trigonometry, exponents and logarithms, polar coordinates and equations, conic sections, parametric equations and limits. A few weeks of the year will be devoted to calculus topics including the derivative and its application to curve sketching. This course concludes with a local final exam.

0248A PRECALCULUS

PREREQUISITE: ALGEBRA II R AND at least a 3 on the ALGEBRA II Regents Exam
FULL YEAR - 1 UNIT

This course is designed for students who successfully completed Algebra II R. In this course students study function theory and applications of polynomials and rational functions, inequalities, trigonometry, exponential and logarithmic functions and limits.

0248R FUNCTIONS AND TRIGONOMETRY

PREREQUISITE: ALGEBRA II
FULL YEAR - 1 UNIT

Students in this course study functions and trigonometry. Topics include relations and functions, rational equations, exponential and logarithmic functions, transformations and trigonometry, mathematical modeling, and applications of algebra and trigonometry. Students continue to use graphing calculators to investigate relationships among functions and critical attributes of a wide variety of functions.

0245 INTRODUCTION TO COLLEGE MATH

PREREQUISITE: PRECALCULUS
GRADE 12 ♦ FULL YEAR - 1 UNIT

This course is available to students who have successfully completed Pre-calculus. During the first semester, calculus is explored through the interpretation of graphs and tables as well as analytic methods. The second semester is a survey of mathematical topics which may include: statistics, number theory, finance, matrices, logic and history. Students will continue to use graphing calculators throughout this course.

0280 DECISION MAKING WITH MATHEMATICS

Blended Learning Course
PREREQUISITE: ALGEBRA II AND 3 YEARS OF HIGH SCHOOL MATHEMATICS
GRADE 11 OR 12 ♦ FULL YEAR - 1 UNIT

This course is available to students who have successfully completed at least 3 years of mathematics, including Algebra II. The Blended Learning model of instruction combines in-class instruction with interactive online learning. Students will learn to use mathematics to inform decision making in statistics and finance through the study of data analysis, modeling, probability, and the mathematics of financial applications. The goals of this course also include the development of self-pacing skills, digital communication, college online readiness and appropriate use of technology/online resources.

0251 ADVANCED PLACEMENT CALCULUS AB

PREREQUISITE: PRECALCULUS H AND TEACHER RECOMMENDATION
FULL YEAR - 1 UNIT

This is a college level course comparable to the first semester of college calculus, based on the AB syllabus of the College Board. Material studied will include limits and continuity, differential and integral calculus, their applications, and elementary differential equations. The course is intended not only for the extremely able student but for the mature, highly motivated student whose past performance in math has been excellent, and who is willing to spend an average of six to eight hours a week in outside study of the subject. The student's commitment to meeting the challenge of the course is critical to his/her success. High School course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

0253 ADVANCED PLACEMENT CALCULUS BC

PREREQUISITE: PRECALCULUS H AND TEACHER RECOMMENDATION
FULL YEAR - 1 UNIT

This is a rigorous college level course comparable to the first and second semester of college calculus, based on the BC syllabus of the College Board. Material studied will include limits, differential and integral calculus, their applications, infinite series, and differential equations. The course is intended not only for the extremely able student but for the mature, highly motivated student whose past performance in math has been superior, and who is willing to spend an average of six to eight hours a week in outside study of the subject. The student's commitment to meeting the challenge of this course is critical to his/her success. High School course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

0252 ADVANCED PLACEMENT STATISTICS

PREREQUISITE: PRECALCULUS OR PRECALCULUS CONCURRENTLY
FULL YEAR - 1 UNIT

This is a college level non-calculus based introductory course in statistics. It is intended for strong math students who have successfully completed Pre-calculus or are currently enrolled in Pre-calculus. Good writing skills are necessary. The purpose of this course is to introduce students to the major concepts and tools for collecting, analyzing, and drawing conclusions from data. The syllabus is divided into four major themes: exploratory analysis, planning a study, probability and statistical inference. High School course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year. Many colleges award advanced placement, credit or both on the basis of examination results.

0254 MULTI-VARIABLE CALCULUS

PREREQUISITE: BC CALCULUS
FULL YEAR - 1 UNIT

This is a rigorous college level class equivalent to Calculus III in some schools of higher education. Students will study equations of lines and planes in 3 dimensions, using fundamental vector properties. In particular, they will study vector functions, their derivatives and integrals. The Calculus of functions in Cartesian, cylindrical and spherical coordinate systems as well as vector calculus are part of the program. Students will use computer and calculator technology to enhance their experience. Additional advanced topics may be uncovered based on student interest and time available.

0780AP ADVANCED PLACEMENT COMPUTER SCIENCE PRINCIPLES

PREREQUISITE: ALGEBRA I AND GEOMETRY CONCURRENTLY
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This course is designed to introduce students to the world of programming using a variety of languages with a focus on Java. Students work in teams to develop computational thinking, solve problems and utilize computational tools that foster creativity. Students practice problem solving with structured activities and progress to open-ended projects and problems that require them to develop planning, documentation, communication, and other professional skills. Problems allow for various levels of entry whether students are novice or developing programmers. Each unit focuses on one or more computationally intensive career paths. The course invites students to consider the societal impact of computing, both present and future.

0255 ADVANCED PLACEMENT COMPUTER SCIENCE A

PREREQUISITE: COMPUTER SCIENCE PRINCIPLES
FULL YEAR - 1 UNIT

This is a programming course with a major emphasis on methodology, algorithms, logic, and data structures using Java and based on the College Board syllabus. Object-oriented programming is studied and applied using hands-on structured lab components to design, implement, and analyze solutions to problems. High School course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

MUSIC EDUCATION COURSES AND SEQUENCE

COURSES:

Band (Wind and Percussion)

Concert Band	1 Full Unit
Wind Ensemble	1 Full Unit

Orchestra (Strings)

Chamber Orchestra	1 Full Unit
Symphony Orchestra	1 Full Unit

Choral

Concert Choir	1 Full Unit
Polyphonic Choir	1 Full Unit or ½ Unit
Treble Choir	1 Full Unit or ½ Unit

Electives

Voice Class	1 Full Unit or ½ Unit
Music History	½ Unit
AP Music Theory	1 Full Unit
Applied Music (Piano)	¼ Unit
Applied Music (Guitar)	¼ Unit

SEQUENCES:

A 5-unit sequence (four full years of a Band, Orchestra or Choral Ensemble and one year of AP Music Theory OR three full years of a Band, Orchestra or Choral Ensemble, AP Music Theory and one additional full unit elective) in music is one of the possible pathways to achieve a NYS Regents Diploma with Advanced Designation.

HONORS DISTINCTION PROGRAM:

Students participating in any major performing ensemble may elect to pursue an Honors Distinction for these courses. Students may apply for participation in the fall of any year. By participating in various pre-determined activities such as solo festivals, extra-curricular performing ensembles, musicals, approved community ensembles, etc., students acquire points towards the honors distinction. Application contracts and details are available from all music teachers.

REQUIREMENTS:

One full year of a Band, Orchestra or Choral Ensemble fulfills the New York State requirement of one credit of Fine Art. Prerequisites are listed by class. Some require an audition.

0816 VOICE CLASS

NO PREREQUISITE
GRADES 9-12 ♦ FULL YEAR - 1 UNIT*

Voice classes will foster the development of the fundamentals of vocal production and techniques. This course provides students the opportunity to learn solo repertoire appropriate to the individual's vocal ability. These concepts provide the foundations for students to participate in solo festivals at all levels. If enrollment for this class warrants, two sections will be run with students placed in the section most appropriate for their individual development and ability. ***Voice class may be taken multiple times.**

0822 POLYPHONIC CHOIR

NO PREREQUISITE
GRADES 9-12 ♦ FULL YEAR - 1 UNIT*

This choir offers an opportunity to develop and improve individual singing skills while participating in a major performing ensemble. Teaching emphasis is placed on correct vocal techniques, sight-reading ability, production of choral tone, and interpretation of various choral styles. A variety of choral literature using a variety of languages will be rehearsed and performed in periodic public concerts. This choir will perform a minimum of three times during the year, and these performances are a required aspect of this course. ***Polyphonic Choir may be taken multiple times.**

0821 CONCERT CHOIR

PREREQUISITE: AUDITION
GRADES 10, 11, 12 ♦ FULL YEAR - 1 UNIT

The concert choir is a select vocal ensemble of advanced singers who perform difficult repertoire and concert works of various styles and time periods for school, community, special programs and competitions. The repertoire will be selected from NYSSMA levels 5 and 6, as well as a variety of other sources selected by the director. Designed for the more experienced singer, the Concert Choir studies the major elements of choral music which includes, but is not limited to, control and refinement of voice production, tone color, dynamics, articulation, intonation, balance and diction in a variety of languages. Auditions for this choir will be done during the second semester of the previous school year. This choir will perform a minimum of three times during the year, and these performances are a required aspect of the course.

Note: Members of this ensemble wear specified concert attire for their performances.
***Concert Choir may be taken multiple times.**

0823 TREBLE CHOIR

PREREQUISITE: OPEN TO ALL TREBLE VOICES
GRADES 9-12 ♦ FULL YEAR - 1 UNIT*

Treble Choir offers an opportunity for students to study literature written for treble voices. Emphasis will be placed on vocal technique, blending and development of the upper voice. The repertoire includes music of various styles and historical periods. This choir will perform a minimum of three times during the year, and these performances are a required aspect of the course.

Note: Members of this ensemble wear specified concert attire for their performances.

***Treble Choir may be taken multiple times.**

0818 CHAMBER ORCHESTRA

PREREQUISITE: TEACHER RECOMMENDATION
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Chamber orchestra is comprised of the four major string instruments — violin, viola, cello, and string bass. This major instrumental ensemble is comprised of students who generally have a minimum of four years of playing experience. The repertoire includes classical string orchestra masterpieces by various composers and encompasses a wide variety of musical styles. Students are required to participate in rehearsals, performances, and weekly rotating lessons. This orchestra will perform a minimum of three times during the year, and these performances are a required aspect of the course. The enrollment will encompass students in grades 9-12. ***Chamber Orchestra may be taken multiple times.**

0810 SYMPHONY ORCHESTRA

PREREQUISITE: AUDITION AND TEACHER RECOMMENDATION
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

Symphony Orchestra is a select ensemble comprised of the four major string instruments, violin, viola, cello, and string bass. The repertoire includes both string orchestra and full orchestra works by a variety of composers. Music is selected from many musical styles and periods and represents a performance level of V or VI in the NYSSMA manual. Each member of the orchestra is required to attend rotating class instrumental lessons in school once per week. This orchestra will perform a minimum of three times during the year, and these performances are a required aspect of the course. Activities may include evening concerts, competitions, and school and community performances. At designated concerts, winds, brass and percussion from the wind ensemble are added to the orchestra. These students join the orchestra rehearsals at designated times, in preparation for full orchestra concerts. **Auditions for this ensemble are held early 2nd semester and are open to upcoming 10th, 11th, and 12 graders.**

Note: Members of this ensemble wear specified concert attire for their performances.
***Symphony Orchestra may be taken multiple times.**

0811 WIND ENSEMBLE

PREREQUISITE: AUDITION AND TEACHER RECOMMENDATION
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

Wind Ensemble is a major instrumental ensemble comprised of selected students. Placement into this ensemble is based on audition and teacher recommendation. Repertoire ranges from classical to contemporary and represents a performance level of V or VI in the NYSSMA manual. This band will perform a minimum of three times during the year, and these performances are a required aspect of the course. Activities may include assemblies, evening concerts, competitions, and community performances. Some students may be selected to perform with the symphony orchestra, as needed. Each member is required to attend rotating class instrumental lessons in school once per week on their primary instrument. **Auditions for this ensemble are held early 2nd semester and are open to upcoming 10th, 11th, and 12th graders.**

Note: Members of this ensemble wear specified concert attire for their performances.
***Wind Ensemble may be taken multiple times.**

0812 CONCERT BAND

PREREQUISITE: TEACHER RECOMMENDATION
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Concert Band is a major instrumental ensemble comprised of students who generally have a minimum of four years of playing experience. Placement into this ensemble is based on teacher recommendation. Repertoire ranges from classic to contemporary and represents a performance level IV and higher, based upon the NYSSMA manual. Each member is required to attend rotating class instrumental lessons in school once per week on their primary instrument. This band will perform a minimum of three times during the year, and these performances are a required aspect of the course. The enrollment will encompass students in grades 9-12. ***Concert Band may be taken multiple times.**

0825 ADVANCED PLACEMENT MUSIC THEORY

PREREQUISITE: MUSIC THEORY, OR PLACEMENT EXAM AND TEACHER RECOMMENDATION
GRADE 12 ♦ FULL YEAR - 1 UNIT

The Advanced Placement Music Theory course consists of a college level teaching approach to the theoretical music concepts of form, analysis, part writing, composition and advanced ear training. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year. Many colleges and schools of music award credit on the basis of these exam results. Students are required to demonstrate proficiency through a placement exam and/or coupled with the teacher's recommendation.

0820 MUSIC HISTORY

GRADES 9-12 ♦ SEMESTER - ½ UNIT
[MHS: OFFERED IN 2026-2027 AND 2028-2029, SHS: OFFERED IN 2027-2028 AND 2029-2030]

This class will take the learner from the beginning of recorded time and the impact music had on the world, working through all of the time periods of music through today! Music History will include music of the Eastern and Western Worlds though it will look mostly at Western Music and its impact on today's music. Genres such as musical theater, jazz, opera, and contemporary music will be studied as well. There will be a performance piece as a part of the class utilizing keyboards and a professional computer generated music composition program such as Sibelius or Finale. This class will earn the student ½ credit toward their New York State Requirement in the Arts. The student can take an additional qualified ½ credit course to achieve their required Arts Credit.

0824P APPLIED MUSIC – PIANO

GRADES 9-12 ♦ FULL YEAR - ¼ UNIT

Students who study piano privately may receive ¼ credit per year provided certain requirements are met. For application forms and enrollment information, students should contact the building or District Leader for Music. ***Applied music – Piano may be taken multiple times.**

0824G APPLIED MUSIC – GUITAR

GRADES 9-12 ♦ FULL YEAR - ¼ UNIT

Students who study guitar privately may receive ¼ credit per year provided certain requirements are met. For application forms and enrollment information, students should contact the building or District Leader for Music. ***Applied music – Guitar may be taken multiple times.**

PHYSICAL EDUCATION

GRADES 9-12 ♦ FULL YEAR - ½ UNIT PER YEAR

Physical Education is a New York State–mandated graduation requirement; therefore, no exemptions are permitted. Students with chronic absences will be required to complete an approved make-up plan. Failure to fulfill this requirement may result in denial of credit.

PCSD PHYSICAL EDUCATION MISSION STATEMENT

The mission of the physical education curriculum is to engage students in authentic learning experiences that develop the physical, social, emotional and cognitive skills necessary for all students to be healthy and active for a lifetime. We believe a comprehensive K-12 curriculum offers…

- Developmentally appropriate tools necessary to help students set and achieve their individual fitness goals
- Rigorous authentic experiences and is responsive to all learners regardless of ability
- Next generation learning skills that fosters positive character development

Our program is guided by both the National and State Standards for Physical Education

National Standards for K-12 Physical Education

The physically literate individual:

Standard 1 - demonstrates a variety of motor skills
Standard 2 - applies knowledge related to movement and fitness concepts
Standard 3 -develops social skills through movement
Standard 4 - develops personal skills, identifies personal benefits of movement, and choose to engage in physical activity

PHYSICAL EDUCATION INSTRUCTIONAL UNITS MAY INCLUDE (But not limited to):
Aerobics, Archery, Badminton, Basketball, Cross Country Running / Jogging, CPR, Dance, Fitness Walking, Flag Football, Floor Hockey, Golf, Indoor Soccer, Kayaking, Lacrosse, Lifetime Activities (ie. Frisbee golf, bocce, cornhole & shuffleboard), Orienteering, Personal Fitness/Weight Training, Pickleball, Project Adventure / Cooperative Games, Rugby, Self-Defense, Soccer, Softball, Speedball, Swimming, Table Tennis, Team Handball, Tennis, Volleyball, Ultimate Frisbee, Yoga.

ADAPTED PHYSICAL EDUCATION
An adapted program is available for students with medical and special needs. Student placement in this program is determined by the Committee on Special Education.

INTRAMURAL ACTIVITIES MAY INCLUDE (Based on sufficient student interest):
Badminton, Weight Training/Conditioning/Personal Fitness, Basketball, Table Tennis, Team Handball, Floor Hockey, Pickleball.

SCIENCE COURSES AND SEQUENCES

Students should be exposed to each of the four core science disciplines (Earth Science, Biology, Chemistry, and Physics) prior to graduation to ensure scientific literacy.

Core Offerings

Earth and Space Science R**

↓

Life Sciences: Biology R**

↓

Chemistry (Non-Regents) or
Physical Sciences: Chemistry R**

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Physics (Non-Regents) or
Physical Sciences: Physics R or**
College Physics

** For those courses that culminate in a Regents exam, course credit is awarded only upon completion of that exam.

Advanced Placement Offerings

AP Physics AP Biology AP Chemistry AP Environmental Science

Science Elective Offerings

Sutherland High School

Animal and Human Behavior
Astronomy
Criminalistics
Human Anatomy and Physiology I
Human Anatomy and Physiology II
Oceanography

Mendon High School

Animal and Human Behavior
Astronomy
Criminalistics
Genetics
Human Anatomy and Physiology I
Human Anatomy and Physiology II
Microbiology
Oceanography

Incoming 9th graders requesting to take two Regents-level science courses concurrently, need to complete and submit the PCSD 8 go 9 Science Pre-Requisite Form by March 15th. This form is available in the counseling office at each middle school.

Science Course Descriptions

0311 EARTH AND SPACE SCIENCES R

PREREQUISITES: ALGEBRA I or ALGEBRA I CONCURRENT
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Earth and Space Sciences is an inquiry-based exploration of the dynamic interactions shaping our planet and the vastness of the cosmos. This course is based on the New York State Science Learning Standards (NYSSLS) and designed to engage students in authentic science practices providing students with a deep understanding of Earth and space. Key topics include space systems, history of the Earth, Earth's systems, weather and climate and human sustainability. There is an additional lab period associated with this course.

The course concludes with the NYS Earth and Space Sciences Regents exam.

0321 LIFE SCIENCE: BIOLOGY R

PREREQUISITES: GRADE 9: EARTH AND SPACE SCIENCES R AND ALGEBRA I or ALGEBRA I CONCURRENT
GRADES 10-12: EARTH AND SPACE SCIENCES R
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Biology is a dynamic and inquiry-based exploration of life science based on the New York State Science Learning Standards (NYSSLS). This course is designed to engage students in authentic science practices, fostering a deep understanding of the fundamental principles that govern living organisms. Key topics include structure and function, inheritance and variation of traits, matter and energy in organisms and ecosystems, interdependent relationships in ecosystems, natural selection, and evolution. There is an additional lab period associated with this course.

The course concludes with the NYS Life Science: Biology Regents exam.

0331 PHYSICAL SCIENCE: CHEMISTRY R

PREREQUISITE: TWO UNITS OF REGENTS SCIENCE and ALGEBRA I
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

Chemistry is a dynamic and inquiry-based exploration of the chemical sciences based on the New York State Science Learning Standards (NYSSLS). This course is designed to engage students in authentic science practices, fostering a deep understanding of the fundamental principles that govern matter and its interactions. Key topics include the structure and properties of matter, chemical reactions, the interactions of matter and energy in systems, and roles of chemical processes in our daily lives. There is an additional lab period associated with this course.

The course concludes with the NYS Physical Science: Chemistry Regents exam.

0332 CHEMISTRY (Non-Regents)

PREREQUISITE: TWO UNITS OF REGENTS SCIENCE AND ALGEBRA I or TEACHER RECOMMENDATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This course is designed for junior and senior students, who are interested in everyday applications of Chemistry. Objectives are to develop an appreciation of scientific methods and a familiarity with basic scientific facts and principles. The topics are similar to those in Regents Chemistry. The teacher may require an independent study or research project. Students should be familiar with the use of equations to solve problems. The class meets five periods per week.

0341 PHYSICAL SCIENCE: PHYSICS R

PREREQUISITE: TWO UNITS OF REGENTS SCIENCE CONCURRENT ALGEBRA II R
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

Physics is a dynamic and inquiry-based exploration of physical science based on the New York State Science Learning Standards (NYSSLS). This course is designed to engage students in authentic science practices, fostering a deep understanding of the fundamental principles that govern matter and energy in the natural world. Key topics include motion and stability, forces and interactions, energy transformations, waves and their applications, and the structure and properties of matter. There is an additional lab period associated with this course.
The course concludes with the NYS Physical Science: Physics Regents exam.

0342C COLLEGE PHYSICS*

PREREQUISITE: TWO UNITS OF REGENTS SCIENCE CONCURRENT ALGEBRA II R or TEACHER RECOMMENDATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This is an algebra-based college level introductory Physics course. This course should be considered by students who wish to pursue careers in science, pre-health, engineering, math, physics related fields, and is strongly recommended for students considering AP Physics C. This course presents a modern view of Physics with major emphasis on the fundamental concepts underlying this science. Topics include mechanics, waves, electricity, magnetism and atomic and nuclear physics. Extensive use is made of computers – no programming experience is needed. There is an additional lab period associated with this course.
Students will have the option of taking the NYS Physical Science: Physics Regents exam.
Students enrolled in this course can pay tuition (at a significantly reduced rate) to MCC. Upon successful completion, students will receive credit from both Pittsford and MCC.

0343 PHYSICS (Non-Regents)

PREREQUISITE: ALGEBRA I AND GEOMETRY R or TEACHER RECOMMENDATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This course is offered for the student who wishes to learn more about the scientific aspects of the physical world in a more practical, less theoretical way than Regents Physics. Most of the student's understandings develop from laboratory experiences and should help the student to gain an appreciation for the scientific method, increase a willingness to change beliefs after carefully weighing new evidence, and provide an opportunity to develop critical thinking. Emphasis is on the Physics of everyday events and applications, the practical understanding of Physics. This course meets five periods per week.

0351 ADVANCED PLACEMENT BIOLOGY

PREREQUISITE: 3 UNITS OF REGENTS LEVEL SCIENCE (INCLUDING LIFE SCIENCE: BIOLOGY R and PHYSICAL SCIENCE: CHEMISTRY R)
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

The emphasis of this course is on inquiry-based learning of essential concepts. Students are provided the opportunity to develop advanced inquiry and reasoning skills, such as designing a plan for collecting data, analyzing data, applying mathematical routines, and connecting concepts in and across domains. The major themes that recur throughout the course are: The process of evolution drives the diversity and unity of life; Biological systems utilize free energy and molecular building blocks to grow, to reproduce and to maintain dynamic homeostasis; Living systems store, retrieve, transmit and respond to information essential to life process; Biological systems interact, and these systems and their interactions possess

complex properties. The course concludes with a nationally administered examination approved by the College Entrance Board and all other assignments through the end of the PCSD school year. Many colleges award advanced placement status, credit, or both on the basis of the examination results. There are additional lab periods associated with this course.

0352 ADVANCED PLACEMENT CHEMISTRY

PREREQUISITE: 3 UNITS OF REGENTS LEVEL SCIENCE (INCLUDING PHYSICAL SCIENCE: CHEMISTRY R)
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

AP Chemistry provides a college-level foundation in chemistry, focusing on the development of a strong conceptual understanding of chemical principles and their applications. Students explore chemical phenomena at multiple levels while mastering skills such as modeling, data analysis, and scientific reasoning. Inquiry-based labs allow students to design experiments, analyze results, and refine their understanding of chemistry. Key topics include atomic structure, chemical reactions, kinetics, equilibrium, acids and bases, and thermodynamics. This course prepares students for advanced studies in chemistry by building critical thinking and problem-solving skills. The course concludes with the Advanced Placement College Board exam, and all other assignments through the end of the PCSD school year. Many colleges award advanced placement status, credit, or both on the basis of the examination results. There are additional lab periods associated with this course.

0355 ADVANCED PLACEMENT PHYSICS C

PREREQUISITE: 3 UNITS OF REGENTS LEVEL SCIENCE (INCLUDING PHYSICAL SCIENCE: PHYSICS R OR COLLEGE PHYSICS) AND AP CALCULUS CONCURRENT
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

Class work and laboratory work combine to derive the basic physical laws in the correct mathematical form rather than the approximation used for the Regents courses. The areas that will be explored are mechanics, electricity, and magnetism. The "C" program is more demanding mathematically and may result in college credit for the potential Physics major. It is the equivalent of one semester of Mechanics and one semester of Electricity and Magnetism. Each part may be taken separately for a semester's worth of college credit. Since calculus is used extensively, advanced study in mathematics is highly recommended. The course concludes with the completion of the Advanced Placement College Board exam, and all other assignments through the end of the PCSD school year. Many colleges award advanced placement status, credit, or both on the basis of the examination results. There are additional lab periods associated with this course.

0353 ADVANCED PLACEMENT ENVIRONMENTAL SCIENCE

PREREQUISITE: 3 UNITS OF REGENTS LEVEL SCIENCE
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

The goal of the AP Environmental Science course is to provide students with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world, to identify and analyze environmental problems both natural and human-made, to evaluate the relative risks associated with these problems, and to examine alternative solutions for resolving or preventing them. Environmental science is interdisciplinary; it embraces a wide variety of topics from different areas of study. Yet there are several major unifying constructs, or themes, that cut across the many topics included in the study of environmental science. The course concludes with the Advanced Placement College Board exam, and all other assignments through the end of the PCSD school year. Many colleges award advanced placement status, credit, or both on the basis of the examination results. There are additional lab periods associated with this course.

SCIENCE ELECTIVES

0327 ANIMAL AND HUMAN BEHAVIOR

PREREQUISITE: LIFE SCIENCES: BIOLOGY R
GRADES 10-12 ♦ SEMESTER - ½ UNIT

This course investigates and observes the responses to change in an animal's internal and external environment. The course focuses only on animals and examines how the process of evolution has resulted in the variety of animal life on earth. We will also see patterns emerge from the simplest to the most complex animals and see the interconnectedness of different animal species with each other. This course will include many hands-on activities, projects and presentations. The major topics of study may include: instinct vs. learned behaviors, adaptations, social behaviors, animal communication, aggression, courtship, parenting, and play behaviors.

0340 CRIMINALISTICS

PREREQUISITE: LIFE SCIENCE: BIOLOGY R
GRADES 11-12 ♦ SEMESTER - ½ UNIT

Criminalistics will introduce students to the role of forensic science in criminal investigations. In order to merge theory with practice, a hands-on approach will be taken in the presentation of course materials and laboratories. The major topics of study may include: physical properties of evidence, hair, fiber, and paint analysis; fingerprints, tool marks and other impressions; forensic serology and DNA.

0344 HUMAN ANATOMY AND PHYSIOLOGY I (FALL)

PREREQUISITE: LIFE SCIENCES: BIOLOGY R
GRADES 10-12 ♦ FALL SEMESTER - ½ UNIT

This course examines the structure and function of the human body and mechanisms for maintaining homeostasis within the body. It includes the study of basic chemistry, cells, tissues, and the integumentary, skeletal, muscular, and nervous systems. Activities include microscope work, case studies and dissection. It is intended as a survey course for students who are interested in pursuing careers in medicine or allied health fields.

0345 HUMAN ANATOMY AND PHYSIOLOGY II (SPRING)

PREREQUISITE: LIFE SCIENCES: BIOLOGY R and HUMAN ANATOMY AND PHYSIOLOGY I
GRADES 10-12 ♦ SPRING SEMESTER - ½ UNIT

This course is a continuation of Human Anatomy and Physiology I. It includes the study of the circulatory, immune, digestive, respiratory, excretory, and reproductive systems. Activities include microscope work, case studies and dissection. It is geared toward students who are interested in pursuing careers in medicine or allied health fields.

0347 ASTRONOMY

PREREQUISITE: EARTH AND SPACE SCIENCES R
GRADES 10-12 ♦ SEMESTER -½ UNIT
[OFFERED 2027-2028 AND 2029-2030]

This semester-long course invites science enthusiasts to explore the fascinating field of Astronomy and our place in the cosmos. Students will journey through the universe, starting with its origins and structure, and delve into the tools of discovery, such as light analysis and advanced telescopes. Topics include the mysteries of relativity, the evolution of stars, the nature of galaxies, and the search for extraterrestrial life. The course also explores cutting-edge fields like exoplanet research, cosmology, and space explora-

tion, including the challenges and possibilities of interplanetary and interstellar travel. Throughout, students will engage with the latest discoveries and technologies that continue to expand our understanding of the universe.

0348 OCEANOGRAPHY

PREREQUISITE: EARTH AND SPACE SCIENCES R or LIFE SCIENCES: BIOLOGY R PRIOR TO OR CONCURRENT
GRADES 10-12 SEMESTER - ½ UNIT
[OFFERED 2026-2027 AND 2028-2029]

This semester-long course is designed for science students with an interest in exploring the dynamic field of Oceanography. Students will begin by examining the history and evolution of oceanographic research, including the technologies shaping our understanding of the oceans today. The course covers the physical, chemical, and geological aspects of the ocean, such as ocean currents, climate regulation, and seafloor dynamics, while integrating topics like ocean acidification and the impacts of climate change. The course concludes with an exploration of Marine Biology, focusing on marine ecosystems, biodiversity, and the interconnected roles of ocean life in sustaining global systems.

SCIENCE ELECTIVES - MENDON HIGH SCHOOL ONLY

0324 MICROBIOLOGY

PREREQUISITE: LIFE SCIENCE: BIOLOGY R
GRADES 10-12 ♦ SEMESTER - ½ UNIT
[MHS: OFFERED IN 2027-2028 AND 2029-2030]

Microbiology is a course designed for students interested in exploring the vital roles microorganisms play in our world, from their beneficial applications to their impact on public health. Students will investigate the life cycles, genetic mechanisms, and interactions of viruses, bacteria, protists, and parasitic organisms, with a focus on emerging and re-emerging pathogens such as SARS-CoV-2, antibiotic-resistant bacteria, and zoonotic diseases. The course emphasizes the relevance of microbiology in addressing global challenges like pandemics, antimicrobial resistance, and biotechnology. Students will also gain hands-on experience with advanced lab techniques, including sterile culture methods, media preparation, staining protocols, oil immersion microscopy, and molecular techniques like PCR and DNA sequencing.

0325 GENETICS

PREREQUISITE: LIFE SCIENCE: BIOLOGY R
GRADES 10-12 ♦ SEMESTER - ½ UNIT
[MHS: OFFERED IN 2026-2027 AND 2028-2029]

In this course, students will study traditional inheritance mechanisms and their role in understanding genetic disorders, the regulation of gene expression, alongside emerging fields like genomics and epigenetics. Topics include innovations such as CRISPR gene editing, genetic testing, and personalized medicine, as well as applications of genetic engineering and their ethical and societal implications.

SOCIAL STUDIES COURSES AND SEQUENCE

REGENTS SEQUENCE:

Global History and Geography 9R	**NINTH GRADE (Required)**
Global History and Geography 10R *or* AP World History	**TENTH GRADE (Required)**
U.S. History and Government 11R *or* AP U.S. History	**ELEVENTH GRADE (Required)**
Economic Issues 12R *or* AP Economics ***and*** Participation in Government *or* AP Government and Politics	**TWELFTH GRADE (Required)**
AP European History AP Psychology World Religions Contemporary Issues Criminal Law Diversity Studies Early Military History Modern Military History Sociology and Psychology	**ELECTIVES**

All students must complete Global History and Geography 9R, Global History and Geography 10R or AP World History, U.S. History and Government 11R or AP US History, and meet a fourth year requirement for Economics (one semester) and Participation in Government (one semester), in order to fulfill New York State graduation requirements. Seniors may take Economic Issues and Participation in Government; unless substituting AP Economics (#0154) or AP Government and Politics (#0153) respectively.

A consultant teacher may be in the Regents level courses to provide additional support to all students.

SOCIAL STUDIES CURRICULUM - REQUIRED COURSES

0111 GLOBAL HISTORY AND GEOGRAPHY 9R

GRADE 9 ♦ FULL YEAR - 1 UNIT

This course will focus on the study of Europe, Africa, South Asia, East Asia, Southeast Asia, the Middle East and Latin America. Each area will be studied up to 1750, and will be developed around the geographic/historic setting, the dynamics of change, contemporary nations and cultures, economic development, and its place within a global context. This is a one year course.

0121 GLOBAL HISTORY AND GEOGRAPHY 10R

GRADE 10 ♦ FULL YEAR - 1 UNIT

This course will focus on the study of Europe, Africa, South Asia, East Asia, Southeast Asia, the Middle East and Latin America. Each area will be studied from 1750 to the present, and will be developed around the geographic/historic setting, the dynamics of change, contemporary nations and cultures, economic development, and its place within a global context. ***The course concludes with the NYS Global History and Geography Regents exam.***

0150 ADVANCED PLACEMENT WORLD HISTORY

PREREQUISITE: TEACHER RECOMMENDATION, A minimum of a 90% in previous SOCIAL STUDIES course AND STRONG WRITING SKILLS
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

The AP World History course focuses on developing students' understanding of world history from approximately 1200 to the present. The course has students investigate the content of world history for significant events, individuals, developments, and processes in four historical periods. The course also provides a look at the connections among historical developments in different times and places encompassing the five major geographical regions of the globe: Africa, the Americas, Asia, Europe, and Oceania. The students get the opportunity to participate in debates, defend/refute controversial historical positions and role play individuals and empires. The course prepares students for the National Advanced Placement Examination in May. Many colleges award advanced placement, credit, or both, on the basis of these examination results. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

All students who wish to participate in this course are given a recommended summer reading list. Selected content from the recommended readings will be assessed during the first quarter of the academic year.

0131 U.S. HISTORY AND GOVERNMENT 11R

GRADE 11 ♦ FULL YEAR - 1 UNIT

This course consists of an in-depth study of the Constitution and American Government followed by a brief study of early American events. It continues with a study of the post-Civil War United States (circa 1865 - present) with a major emphasis on the Industrial and Post-Industrial society of today. ***The course concludes with the NYS U.S. History and Government Regents exam.***

0151 ADVANCED PLACEMENT U.S. HISTORY

PREREQUISITE: TEACHER RECOMMENDATION, SOCIAL STUDIES AVERAGE IN THE A RANGE AND STRONG WRITING SKILLS

GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This course consists of a survey of American History from the Pre-colonial Period to present day. American history is studied through extensive chronological coverage and readings on a broad variety of topics in special historical fields including economic, cultural and intellectual, social, political-constitutional, and diplomatic. This will be accomplished through a variety of student-centered methods which might include debates, press conferences, discussions, research, and reading. The course prepares students for the National Advanced Placement Examination in May. Many colleges award advanced placement, credit, or both, on the basis of these examination results. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

All students who wish to participate in this course are given a recommended summer reading list. Selected content from the recommended readings will be assessed during the first quarter of the academic year.

0141 PARTICIPATION IN GOVERNMENT 12R

GRADE 12 ♦ SEMESTER - ½ UNIT

This course consists of an examination of the attitudes, policies, and processes that shape contemporary American public policy. Students will work toward acquiring legal consciousness and analysis skills necessary for effective participation in and development of a more democratic society. Students will be responsible for completing a community service component and attend a government meeting.

0153 ADVANCED PLACEMENT GOVERNMENT AND POLITICS

U.S. AND COMPARATIVE

PREREQUISITE: PREVIOUS SOCIAL STUDIES INTEREST AND ABILITY, STRONG WRITING SKILLS

GRADE 12 ♦ FULL YEAR - 1 UNIT

This Political Science course has two components, which study the government and politics of the United States and six other nations - United Kingdom, Russia, China, Iran, Mexico and Nigeria. United States government and politics is concerned with the nature of the American political system, its development over the past two hundred years, and how it works today. Comparative Government is an introduction to various political systems in our contemporary world, which will familiarize students with the most important methods, concepts and theories in the field of comparative politics. Our studies will examine through the lens of six diverse case studies of political systems, institutions and the role of the citizen in each state. This class will allow students to have a deeper understanding of not only the United States Government and political system but the six other countries studied in Comparative Government, making students more informed citizens. This course prepares students for two National Advanced Placement Examinations in May – one in United States Government and one in Comparative Government. Many colleges award advanced placement, credit, or both, on the basis of these examination results. High school credit

will be awarded upon the completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

0142 ECONOMIC ISSUES 12R

GRADE 12 ♦ SEMESTER - ½ UNIT

This course consists of an in-depth study of the foundational principles of economics. It also examines the general principles of microeconomics and macroeconomics focusing on the U.S. economic system.

0154 ADVANCED PLACEMENT ECONOMICS

MACROECONOMICS AND MICROECONOMICS

GRADE 11-12 ♦ FULL YEAR - 1 UNIT

This introductory college level course is divided into two elements – Microeconomics and Macroeconomics. Microeconomics gives students an understanding of the principles of economics that apply to the decisions of consumers and businesses in the larger economic system. Primary emphasis is placed on the role of markets and how individuals, firms, and government promote profits, efficiency, and equity in the economy. Macroeconomics gives students a thorough understanding of the principles that apply to an economic system as a whole. Primary emphasis is placed on the study of national income, economic performance measures, economic growth, and the international trade.

This course prepares students to take two National Advanced Placement Examinations in May – one in Microeconomics and one in Macroeconomics. Many colleges award advanced placement, credit, or both, on the basis of these examination results. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

SOCIAL STUDIES CURRICULUM - ELECTIVES

0152 ADVANCED PLACEMENT EUROPEAN HISTORY

PREREQUISITE: PREVIOUS SOCIAL STUDIES INTEREST AND ABILITY, STRONG WRITING SKILLS
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This college level course consists of a chronological survey of modern European History from the Renaissance (circa 1400) to the present in four historical periods. The students get to participate in debates, defend/refute controversial historical positions, and role play historical figures and empires. The course prepares students for the National Advanced Placement Examination in May. Many colleges award advanced placement, credit, or both, on the basis of these examination results. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

0155 ADVANCED PLACEMENT PSYCHOLOGY

GRADE 11-12* ♦ FULL YEAR - 1 UNIT

This course is an introductory survey of the major concepts in the scientific study of human behavior, human development, motivation, learning personality, and social behavior. Emphasis is placed on understanding, integrating and applying theoretical and methodological issues to the study of psychology. The course prepares students for the Advanced Placement examination in May. Many colleges award advanced placement, credit, or both, based on these examination results. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

0156 WORLD RELIGIONS

GRADES 11-12 ♦ SEMESTER - ½ UNIT
[MHS AND SHS OFFERED IN 2026-2027 AND 2028-2029]

This course addresses the essential elements of the world's major religions including Hinduism, Buddhism, Judaism, Christianity and Islam along with other faiths. We will discuss the impact of contemporary issues on religions, as well as analyze the similarities and differences among the faiths, and gain a better understanding of how people live their faith. Primary readings, discussions, films, student research, guest speakers, and/or field trips will be utilized to enhance student understandings of these topics. Students who enroll in this class are eligible to receive three (3) hours of college credit through Nazareth College.

0157 DIVERSITY STUDIES

GRADES 11-12* ♦ SEMESTER - ½ UNIT
[MHS AND SHS OFFERED IN 2025-2026 AND 2027-2028]

Students will investigate the contributions of historically marginalized groups including immigrants, Black Americans, Latinx Americans, Asian Americans, Native Americans, members of the LGBTQ+ community, religious minorities, and people with disabilities. Students will also discuss discrimination and persecution of these groups, as well as their response to discrimination. The class is driven by conversation and all students are encouraged to take part. The class will also include many student-centered activities including research, debates, and presentations.

0145 CONTEMPORARY ISSUES

GRADES 11-12* ♦ SEMESTER - ½ UNIT
[MHS AND SHS OFFERED IN 2026-2027 AND 2028-2029]

This course is designed to provide students with an in-depth look at national and international contemporary issues. It will provide students with the opportunity to take content from the required history courses and apply it to real-world scenarios. Topics to be studied may include: global and national issues in the 21st century, population and food production, the global environment and utilization of national resources, national and local politics, and global conflicts. The class is driven by conversation and all students are encouraged to take part. The class will also include many student-centered activities including research, debates, and presentations.

0146E EARLY MILITARY HISTORY

GRADES 9-12* ♦ SEMESTER - ½ UNIT
[MHS AND SHS OFFERED IN 2025-2026 AND 2027-2028]

This course explores warfare through the ages from Ancient Greece and Rome up to the Age of Napoleon. A special emphasis is placed on the impacts of key generals, conquerors, weapons, technologies, armor, tactics and military strategies on the course of human history. In class, you will explore the workings and features of the Greek phalanx, the Roman legion and the Medieval castle. This elective is meant to build on and/or better prepare students for other general history courses by digging into the details of famous historical conflicts. Over the span of many historical BattleSim games, where you take on the role of general, can you change the course of history?

0146M MODERN MILITARY HISTORY

GRADES 9-12* ♦ SEMESTER - ½ UNIT
[MHS AND SHS OFFERED IN 2026-2027 AND 2028-2029]

This course explores warfare from the Civil War through today. A special emphasis is placed on the impact of key generals, conquerors, weapons, technologies, armor, tactics and military strategies on the course of human history. In class, you will explore the workings of trench warfare, tank battles and dog fights in the sky. The military history electives are meant to build on and/or better prepare students for other general history courses by digging into the details of famous historical conflicts. Over the span of many historical BattleSim games, where you take on the role of general, can you change the course of history?

0148 SOCIOLOGY AND PSYCHOLOGY

GRADES 10-12* ♦ SEMESTER - ½ UNIT

A discussion format will be employed to introduce sociology and psychology basics, origins and underlying principles. Sociology will address the concepts of how individuals and groups make decisions. Psychology will focus on individual behaviors and the effect these behaviors may have on society.

0149 CRIMINAL LAW

GRADES 10-12* ♦ SEMESTER - ½ UNIT

This course provides students with an overall view of the criminal legal system in the United States and New York State. Topics will include crimes and defenses, criminal procedure and the jury system. Local cases and issues will be explored as well. Activities may include debates on legal issues, a mock trial, presentations by guest speakers and a field trip to the Monroe County Hall of Justice.

**** Seniors are given preference in case of overload.***

TECHNOLOGY EDUCATION COURSES AND SEQUENCE

Technology classes offer insight into the careers, education, technical skills, problem solving, designing, materials, tools, and products of our future. The purpose of technology education is to provide an exploration of career opportunities available in the technical world we live in. Technology Education also fosters an attitude in students that will assist them in attaining their goals as citizens in our technological society.

Project Lead the Way

The district has incorporated the engineering curriculum into the Technology Education Program. This program starts at the middle school level with an introduction to engineering and continues to more in-depth studies at the high school level. The courses are specifically designed to prepare students for further education and careers in engineering.

Design and Drawing for Production (DDP) fulfills the Fine Arts requirement

The Regents Action Plan permits students to satisfy the high school art/music graduation requirement by substituting the Design and Drawing for Production course for the Studio Art course. Students interested in selecting this alternative may speak with their counselor.

TECHNOLOGY EDUCATION – 5 unit Regents sequence

A 5-unit sequence in Technology Education is one of the possible pathways to achieve a NYS Regents Diploma with Advanced Designation.

Requirement: 5 units total (each ½ year = ½ unit)

Foundation Courses:

Must include 2 units of foundation courses (each ½ year = ½ unit).

Design and Drawing for Production (PLTW) (1 Unit)
Principles of Engineering (PLTW) (1 Unit)
Transportation Systems (½ Unit)
Construction Systems (½ Unit)
Production Systems (½ Unit)

The remaining 3 units can be from ANY of the foundation or elective courses

Elective Courses:

Civil Engineering and Architecture (1 Unit)
Computer Integrated Manufacturing (PLTW) (1 Unit)
Engineering Capstone (PLTW) (1 Unit)
Automotive I (½ Unit)
Automotive II (½ Unit)
Automotive III (½ Unit)
Computer Aided Drawing (½ Unit)
Manufacturing Systems (½ Unit)

Student Example 5 unit Sequence:

Design Drawing for Production (1 Unit)
Principles of Engineering (1 Unit)
Automotive I (½ Unit)
Computer Integrated Manufacturing (1 Unit)
Engineering Design and Development (1 Unit)
Production Systems (½ Unit)

TECHNOLOGY EDUCATION COURSES AND DIFFICULTY LEVELS

SUTHERLAND HIGH SCHOOL

LEVEL 1 (BASIC)
Design and Drawing for Production (PLTW) 1 Unit – full year course – grades 9-12
Production Systems ½ Unit – one semester course – grades 9-12
Transportation Systems ½ Unit – one semester course – grades 9-12
Construction Systems ½ Unit – one semester course – grades 9-12
Automotive I* ½ Unit – one semester grades 11-12

LEVEL 2 (ADVANCED)
Civil Engineering and Architecture 1 Unit – full year course – grades 10-12
Automotive II* ½ Unit – one semester grades 11-12
Automotive III* ½ Unit – one semester grades 11-12
Manufacturing Systems ½ Unit – one semester course – grades 9-12
Computer Aided Drawing (CAD) ½ Unit – one semester course – grades 10-12
Principles of Engineering (PLTW) 1 Unit – full year course – grades 10-12
Computer Integrated Manufacturing (PLTW) 1 Unit – full year course – grades 10-12
Engineering Capstone (PLTW) 1 Unit – full year course – grade 12

***Automotive Courses are offered to Sutherland students but are conducted at Mendon High School**

MENDON HIGH SCHOOL

LEVEL 1 (BASIC)
Design and Drawing for Production (PLTW) 1 Unit – full year course – grades 9-12
Production Systems ½ Unit – one semester course – grades 9-12
Transportation Systems ½ Unit – one semester course – grades 9-12
Automotive I ½ Unit – one semester grades 11-12
Construction Systems ½ Unit – one semester course – grades 9-12

LEVEL 2 (ADVANCED)
Civil Engineering and Architecture 1 Unit – full year course – grades 10-12
Automotive II ½ Unit – one semester grades 11-12
Automotive III ½ Unit – one semester grades 11-12
Manufacturing Systems ½ Unit – one semester course – grades 9-12
Computer Aided Drawing (CAD) ½ Unit – one semester course – grades 10-12
Principles of Engineering (PLTW) 1 Unit – full year course – grades 10-12
Computer Integrated Manufacturing (PLTW) 1 Unit – full year course – grades 10-12
Engineering Capstone (PLTW) 1 Unit – full year course – grade 12

COLLEGE CREDIT OPPORTUNITIES

Pittsford Central Schools' technology teachers are certified to teach the following courses for college credit from RIT. The process is very similar to the Advanced Placement courses administered in the core areas. Students pay a reduced tuition rate to RIT and they receive credit from both Pittsford and RIT.

Class	RIT
Design Drawing for Production	3 credits
Principles of Engineering	3 credits
Computer Integrated Manufacturing	3 credits

Technology Education Course Descriptions

0711 DESIGN & DRAWING FOR PRODUCTION (DDP)

GRADES 9-12 ♦ FULL YEAR - 1 UNIT (PLTW Basic Course) and THREE (3) COLLEGE CREDITS - RIT

Design & Drawing for Production is a blend of technical drawing, and computer aided design & drawing (CADD) all rolled into one course. Students will learn how to solve real world problems presented in the class by using their knowledge, communication, and computer drawing skills that they will be developed during a year. Students will brainstorm new solutions, quickly design their ideas on paper, and then mockup their designs using Autodesk Fusion 360 3D software. Students will be given opportunities to build prototypes and test working models of their problem-solving techniques. Students practice working in groups and as individuals on problem solving projects. They may give presentations to the class on their findings and designs. Students will then be given an opportunity to evaluate themselves at the end of these activities. Activities may include designing, building and testing a Puzzle Cube or an Automata. Students will be using the laser engraver to make plaques, key chains and snowflakes. Students will also be using several different 3D printers to make parts they have designed. When the students are done with these activities, they get to take their projects home and keep them!
This course is a project-based curriculum.

0723 COMPUTER AIDED DRAWING (CAD)

GRADES 10-12 ♦ SEMESTER - ½ UNIT

This course makes extensive use of computer CAD software as both a design and a drawing tool. Students increase proficiency in problem solving skills and develop sophisticated assembly drawings. This course also allows the student to enhance their creative ability through the design of new and innovative product ideas. Students will use the laser engraver and 3D printer to physically build their designs.

0721 CIVIL ENGINEERING AND ARCHITECTURE (CEA)

GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This course is designed to provide students with a solid background in Architectural Design and an introduction to Civil Engineering. Students complete individual as well as group design activities. The students learn to use design problem solving techniques to draw complete plans for their designs. These plans include site plans, floor plans, elevations, detail drawings, electrical and plumbing plans, and structural calculations for residential and small commercial projects. Computer Aided Drawing skills as well as presentation skills will develop through the presentation of projects to the class. Computers will be used to complete the drawing projects. Students will explore, on an introductory level, the many skills used in civil engineering. These range from surveying to soil testing and structural design activities.

0731 PRINCIPLES OF ENGINEERING (POE)

PREREQUISITE: DDP

GRADES 10-12 ♦ FULL YEAR - 1 UNIT (PLTW Advanced Course) and THREE (3) COLLEGE CREDITS - RIT

This course is an innovative, hands-on, laboratory-based set of engineering activities that convey the concepts, principles, skills, activities, and attitudes needed to be successful in the field of engineering. This course will provide direct application of math, science and technology concepts to real world design problems. Students will complete a variety of activities (both hands-on and research based) to further develop their skills in modeling, systems, optimization, technology/society interaction, design, ethics, and basic engineering activities. Engineering activities include: earthquake resistant building, robotics, electricity/electronics, fluid mechanics, trajectory, simple and compound machines, and green energy. This course is a highly project-based curriculum.

0743 COMPUTER INTEGRATED MANUFACTURING (CIM)

PREREQUISITE: DDP

GRADES 10-12 ♦ FULL YEAR - 1 UNIT (PLTW Advanced Course) and THREE (3) COLLEGE CREDITS - RIT

CIM applies principles of programming, rapid prototyping, robotics, and automation. This course builds upon the computer solid modeling skills developed in Design and Drawing for Production. Students will use 3D printers, CNC milling machines, and laser cutters to construct physical models of their three-dimensional designs. This class will also introduce the fundamentals of programming and robotics and how they are used in automated manufacturing. Students will learn to program a robotic arm to perform various tasks, including interaction with other machines. This course is a highly project-based curriculum.

0733 ENGINEERING CAPSTONE (previously EDD)

PREREQUISITE: DDP, POE

GRADE 12 ONLY ♦ FULL YEAR - 1 UNIT (PLTW Advanced Course)

Engineering Capstone challenges students to work individually and collaboratively to research, design and construct solutions to engineering problems. Students apply principles developed in the preceding PLTW courses and are guided by an instructor/mentor. The majority of the course will consist of large scale, long term, team-based challenges. They will present progress reports, create multimedia presentations and evaluate their designs in real-world actual testing. As the designs progress, students will improve their communication skills as they become adept at collaborating with each other as well as professionals in the discipline of their design. This course is a highly project-based curriculum.

0712 PRODUCTION SYSTEMS (Wood I)

GRADES 9-12 ♦ SEMESTER - ½ UNIT

Production Systems is a basic woodworking course. Students will learn how to safely use the woodworking tools, machines, and equipment available in the wood lab, including the miter saw, router table, table saws and much more. This course is designed to teach the fundamentals of materials processing (taking rough cut wood and making it into usable items.) Students learn the proper construction process: gluing, sanding, and finishing wooden projects. Students learn how to make cutting boards, picture frames, keepsake boxes, display shelves and more.

0722 MANUFACTURING SYSTEMS (Wood II)

PREREQUISITE: PRODUCTION SYSTEMS
GRADES 9-12 ♦ SEMESTER - ½ UNIT
[MHS AND SHS: OFFERED IN 2026-2027 AND 2028-2029]

Manufacturing Systems is the advanced woodworking course. Students must take production systems (Wood I) before they sign up for this class. This course is designed to teach the more advanced techniques (Continued next page) of materials processing and manufacturing. Students learn how to design, develop, estimate cost, and mass-produce a product. Students learn the proper construction process: gluing, sanding, and finishing the wooden projects. Students also learn how to make more advanced woodworking projects such as; a mission style desktop lamp, poker/game tables, large cutting boards, trophy shelves, wall shelves, book shelves, jewelry boxes, and more. This course is a project-based curriculum.

0732 CONSTRUCTION SYSTEMS

GRADES 9-12 ♦ SEMESTER - ½ UNIT
[MHS AND SHS: OFFERED IN 2027-2028 AND 2029 - 2030]

This course is based on the systems approach to building construction. Students will learn the various processes used to build a structure both on-site and prefabricated. Students will complete activities such as wall construction, modular construction, and cost estimation. Students will also have activities in each of the different types of utilities within a buildings construction such as plumbing, electrical, HVAC and drywall. Students will be building units for each one of these utilities. Students will also be investigating and building projects in the new field of green energy. This course also includes rough and finish carpentry methods and techniques. This course is a project-based curriculum.

0729 AUTOMOTIVE I

GRADES 11-12 ♦ SEMESTER - ½ UNIT (Conducted at Mendon High School)

Automobile maintenance is a fact of life today. The increasing complexity of automobiles provides greater challenges to owners and mechanics than ever before. This basic course offers instruction in the theory of four stroke cycle engines, brake systems, cooling systems, tire and wheel care, fuel systems, exhaust systems, lubrication, buffing and waxing, and interior care. Instruction is also provided in engine trouble-shooting and the use of automotive test equipment. Related laboratory activities include seasonal maintenance, minor general repairs, and brake service. It is helpful, but not mandatory, for the student to have access to a car for lab activities.

0736 AUTOMOTIVE II

PREREQUISITE: AUTOMOTIVES I
GRADES 11-12 ♦ SEMESTER - ½ UNIT (Conducted at Mendon High School)

This course is a continuation of Auto Technology I. It is designed for those students who want in-depth understanding of automotive systems and how they are serviced. This course provides instruction in sus-pension systems, diagnosis, troubleshooting, using several types of testing equipment, buying used cars, and career options in automotives. Included in this course is an independent activity of the student's choice. This activity could involve anything from installing a stereo system in their car to mounting running boards or shock absorbers. It is helpful, but not mandatory, for the student to have access to a car for lab activities.

0746 AUTOMOTIVE III

PREREQUISITE: AUTOMOTIVES I, II

GRADES 11-12 ♦ SEMESTER - ½ UNIT (Conducted at Mendon High School)

This course provides students with the opportunity to build upon skills mastered in Auto I and Auto II. Activities performed are designed for students seeking a career in an automotive related field. Specific activities relate to engine diagnosis/troubleshooting and operation. Students test electrical systems, adjust steering systems and develop skills related to engine operation and function. Included in this course is a mandatory completion of an activity of their choice, which allows students to explore an area of automotive that they have specific interest in.

0728 TRANSPORTATION SYSTEMS

GRADES 9-12 ♦ SEMESTER - ½ UNIT

This course dives into the different types of transportation, such as aerospace, watercraft, flight, and land transportation. Projects include building rockets, planes, boats and cars to study each mode of transportation, the associated science, and their functionality. This course is hands-on and project-based.

STATEMENT OF BELIEFS

The study of languages and cultures gives one a powerful key to entry into the global community. In studying classical and modern languages and cultures, students develop the ability to communicate with others with knowledge, respect, and understanding of their values, history, traditions, and customs. They develop understanding of their own language and culture and comprehend the role and responsibilities of our nation in the interdependent world community. Students of languages other than English reflect on their ways of thinking and on their function as citizens in a multicultural world. They also develop the skills of creative thinking and critical inquiry that make them effective contributing members of a complex society.

WORLD LANGUAGE SEQUENCES

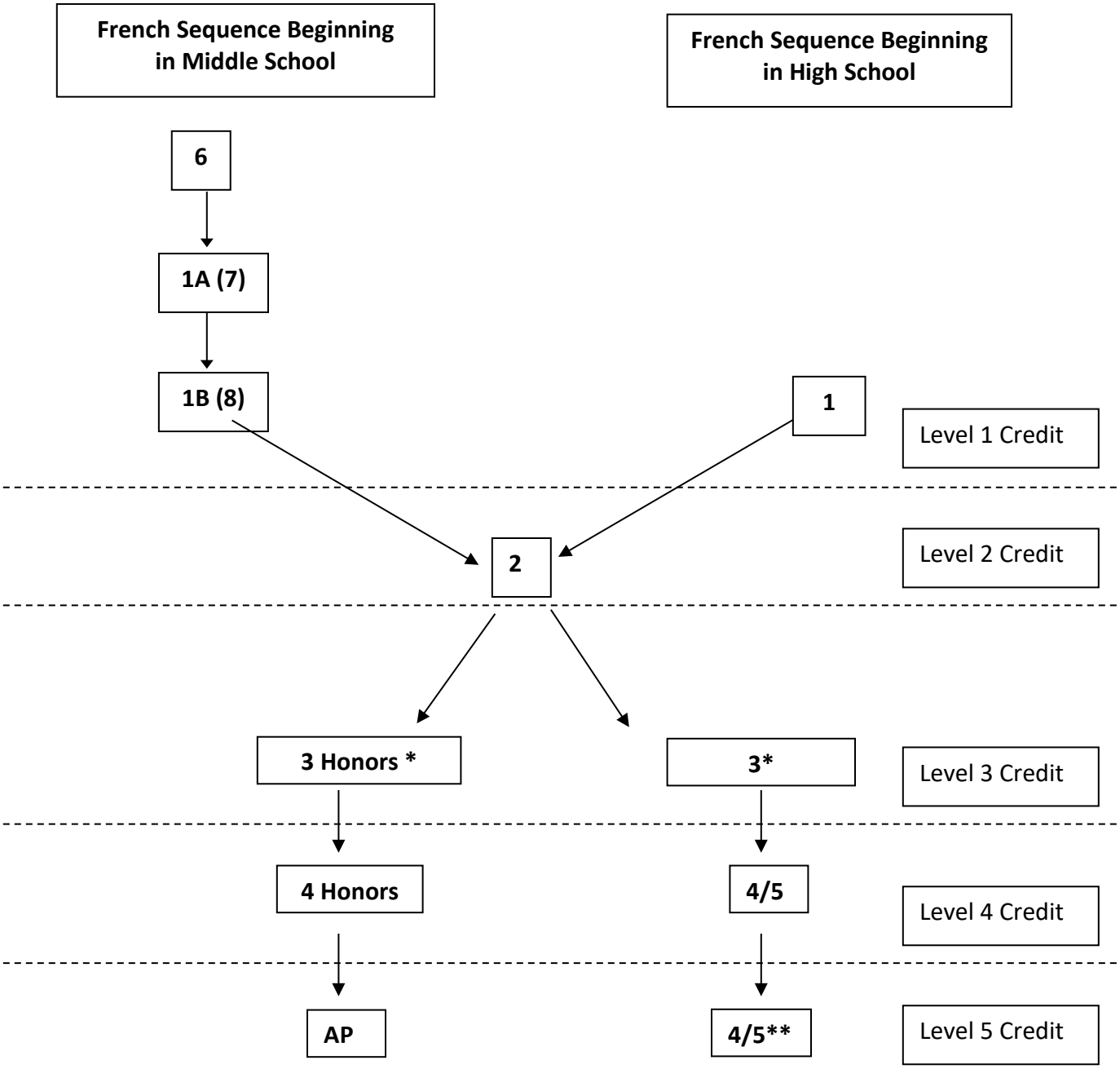
With Level 1 already completed in the middle school, students who complete 2 more units of language will satisfy the requirements for a Regents Diploma with Advanced Designation. Students must successfully complete the level 3 course and the Checkpoint B Exam in order to fulfill the requirement.

A Regents Diploma requires one high school year of World Languages study or equivalent.

Note that more and more colleges are seeking candidates who have continued language study beyond level 3.

There is the potential for college dual credit available for French 5, Spanish 5, and Latin Lit Honors.

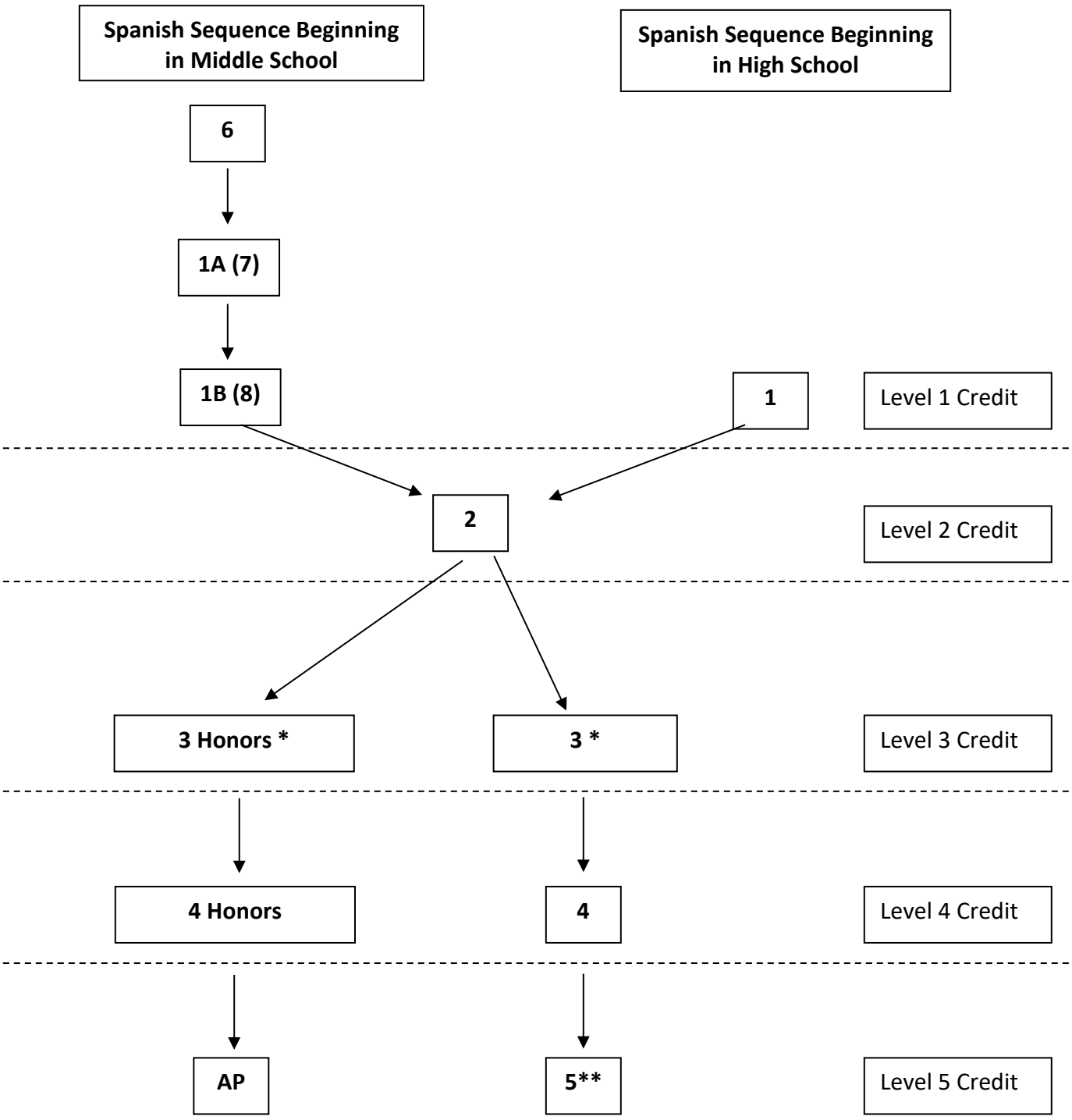
WORLD LANGUAGE SEQUENCE - FRENCH



* Comprehensive final exam aligned to NYS Checkpoint B Standards

** Potential for dual credit available through Nazareth University

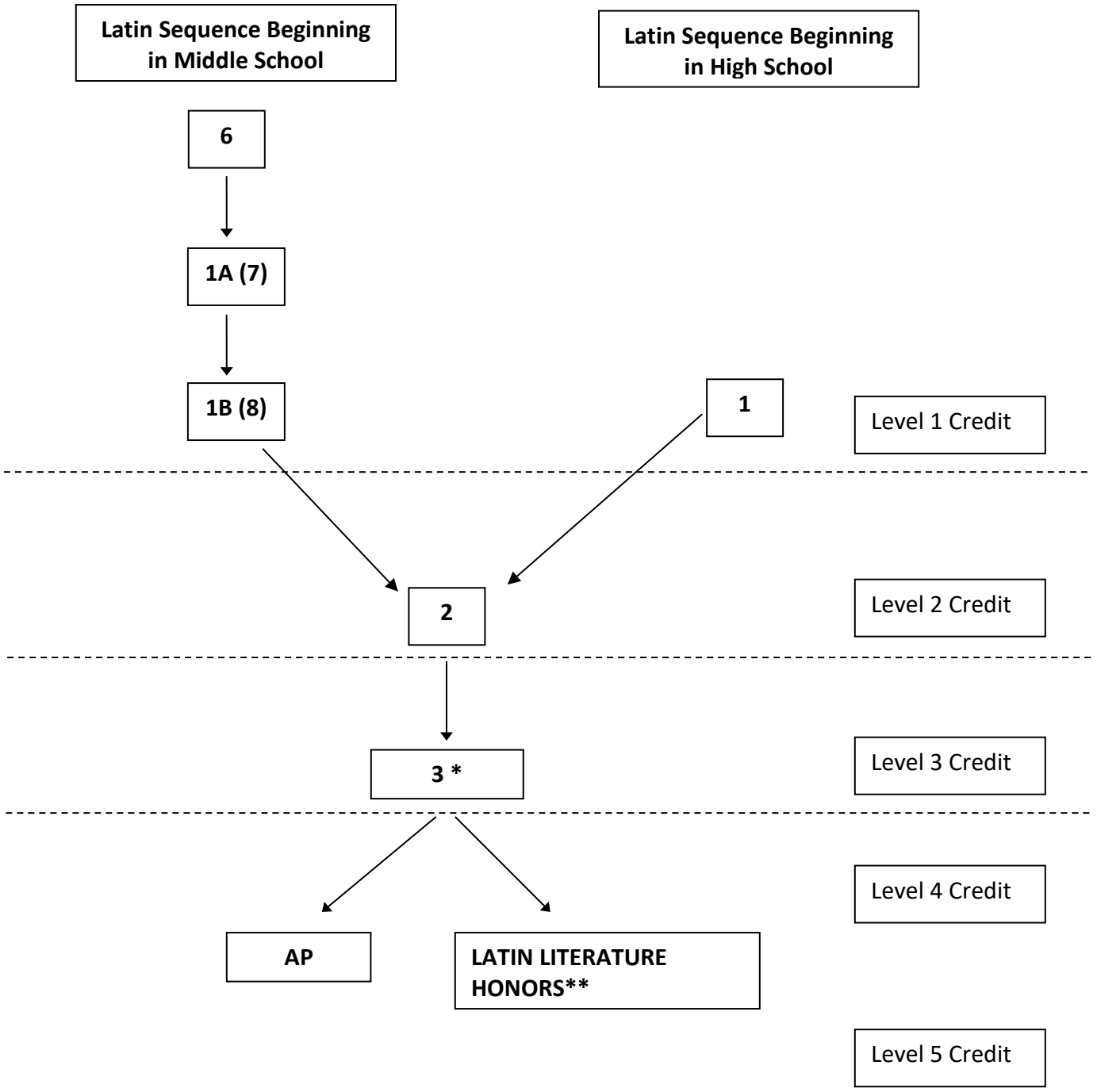
WORLD LANGUAGE SEQUENCE - SPANISH



* Comprehensive final exam aligned to NYS Checkpoint B Standards

** Potential for dual credit available through Nazareth University

WORLD LANGUAGE SEQUENCE - LATIN



* Comprehensive final exam aligned to NYS Checkpoint B Standards

** Potential for dual credit available through SUNY Albany

FRENCH

0411 FRENCH 1

PREREQUISITE: NONE
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

This course is offered for those students who have had no previous training in French and for those who need refinement of the basic skills. It is also appropriate for those who wish to begin the study of a second world language. Emphasis is on listening, speaking, reading and writing. Students acquire basic vocabulary including simple idiomatic expressions and learn the basic structure of the French language. The study of the culture of the French-speaking world is an integral part of the course.

0422 FRENCH 2

PREREQUISITE: FRENCH 1 OR 1B
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

This course is a continuation of the sequence begun in grade six or French 1 begun at the high school. Students develop new vocabulary within the context of language and culture. Oral proficiency, reading comprehension and accuracy of written expression are skills which are emphasized at this level. Students have the opportunity to actively interact in French as they learn about culture and communication in the target language.

0433 FRENCH 3

PREREQUISITE: FRENCH 2
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This course emphasizes acquisition of new vocabulary and more advanced idiomatic expressions within the language and culture of Francophone countries. Basic grammatical structure and verb tenses are reviewed, and more complex grammar is introduced. Oral fluency, reading and listening comprehension, and accuracy in written expressions are developed. The course concludes with the Comprehensive Final Exam aligned to NYS Checkpoint B Standards.

0421 FRENCH 3 HONORS

PREREQUISITE: FRENCH 2 AND TEACHER RECOMMENDATION
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This course begins an accelerated sequence which culminates with the Advanced Placement French Language Examination in the twelfth grade. While some review is incorporated into the course, more attention is given to conversation, vocabulary expansion, grammar, in-depth reading and writing at an advanced level. The course concludes with the Comprehensive Final Exam aligned to NYS Checkpoint B Standards.

0432 FRENCH 4 HONORS

PREREQUISITE: FRENCH 3 HONORS AND TEACHER RECOMMENDATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This advanced course continues an accelerated sequence which culminates with the Advanced Placement Examination in the French Language in the twelfth grade. This course offers in-depth study of previously introduced concepts with emphasis on advanced speaking, listening, reading and writing. French civilization and Francophone cultures are studied through readings, recordings and videos in the target language.

0441 FRENCH 4/5*

PREREQUISITE: FRENCH 3 AND CHECKPOINT B EXAMINATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This course is a combined fourth and fifth-level high school program designed around a two-year rolling curriculum. Students who take this course in their junior year are eligible, and encouraged, to continue in the course during their senior year. Successful completion of one year of this course fulfills an **additional** world language sequence. At this level, students continue their advancement of the four language skills: speaking, listening, reading and writing. Special emphasis is placed on the development of conversational skills. Students review the grammar and structure of French and apply it to their daily work in a creative context. This course consists of a series of cultural units, to be selected from the following: current events, culture and society, travel, the culinary arts, art and music, professions, vacations and leisure time and education. Representative readings from both modern and classical French literature are also included. The use of technology enables students to expand and enhance their knowledge of French language and culture.

French 5: Potential for dual credit for seniors in this course through Nazareth University.

0451 ADVANCED PLACEMENT FRENCH LANGUAGE AND CULTURE

PREREQUISITE: FRENCH 4 HONORS AND TEACHER RECOMMENDATION
GRADE 12 ♦ FULL YEAR - 1 UNIT

In this advanced course students will attain proficiency in the areas of listening, speaking, writing, reading and some literary analysis. As candidates for advanced placement in college, students acquire the ability to understand spoken French in connected discourse, to speak with ease and fluency in conversational French and to write persuasively and accurately on a variety of topics. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year.

Many colleges award advanced credit and/or standing on the basis of the examination results.

SPANISH

0413 SPANISH 1

PREREQUISITE: NONE
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

This course is offered for those students who have had no previous training in Spanish and for those who need refinement of the basic skills. It is also appropriate for those who wish to begin the study of a second world language. Emphasis is on listening, speaking, reading and writing. Students acquire basic vocabulary including simple idiomatic expressions and learn the basic structure of the Spanish language. The study of the culture of the Hispanic world is an integral part of the course.

0425 SPANISH 2

PREREQUISITE: SPANISH 1 OR 1B
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

Students develop new vocabulary within the context of language and culture. Oral proficiency, reading comprehension and accuracy of written expression are skills which are emphasized at this level. Students have the opportunity to actively interact in Spanish as they learn about culture and communication in the target language.

0436 SPANISH 3

PREREQUISITE: SPANISH 2
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This is the 3rd level of the Spanish sequence. It is the continuation of Level 2. Basic grammatical structures and vocabulary are reviewed. There is an emphasis on acquisition of new vocabulary and more advanced grammar. Reading, writing, listening and speaking are improved through activities that reinforce targeted vocabulary and grammar. An appreciation of the language and of Hispanic culture is developed by means of varied cultural activities. The course concludes with the Comprehensive Final Exam aligned to NYS Checkpoint B Standards.

0424 SPANISH 3 HONORS

PREREQUISITE: SPANISH 2 AND TEACHER RECOMMENDATION
GRADE 10 ♦ FULL YEAR - 1 UNIT

This course begins an accelerated sequence which culminates with the Advanced Placement Spanish Language Examination in the twelfth grade. While some review is incorporated into the course, more attention is given to conversation, vocabulary expansion, grammar, in-depth reading and writing at an advanced level. The course concludes with the Comprehensive Final Exam aligned to NYS Checkpoint B Standards.

0434 SPANISH 4

PREREQUISITE: SPANISH 3 AND CHECKPOINT B EXAMINATION
GRADES 11-12 ♦ F ULL YEAR - 1 UNIT

This is a fourth-level high school program. Successful completion of this course fulfills an **additional** world language sequence. At this level emphasis is on conversation and culture. Through current events, cultural readings and videos, students continue their refinement of listening, speaking, reading and writing skills. Discussions, debates and original skits in Spanish are included throughout the course. The course consists of a series of cultural units of varying lengths, some of which are selected from among the following: current events, culture and society, music and dance, the culinary arts, immigration, challenges of indigenous cultures, and festivals. Grammar and vocabulary are reviewed, expanded and incorporated into each unit as appropriate for advancing proficiency.

0435 SPANISH 4 HONORS

PREREQUISITE: SPANISH 3 HONORS AND TEACHER RECOMMENDATION
GRADES 11-12 ♦ FULL YEAR - 1 UNIT

This advanced course continues an accelerated sequence which culminates with the Advanced Placement Examination in the Spanish Language in the twelfth grade. This course offers in-depth study of previously introduced concepts with emphasis on advanced speaking, listening, reading and writing. Hispanic civilization and cultures are studied through readings, recordings and videos in the target language.

0444 SPANISH 5*

PREREQUISITE: SPANISH 4
GRADE 12 ♦ FULL YEAR - 1 UNIT

This fifth year course continues the advancement of the four language skills of speaking, listening, reading and writing. The course consists of a series of units of varying length, some of which are selected from among the following: relationships, current events, travel and leisure, business, medical, and media and technology. Grammar and vocabulary are reviewed, expanded and incorporated into each unit as appropriate for advancing proficiency.

***There is the potential for college dual credit for students enrolled in Spanish 5 through Nazareth University.**

0452 ADVANCED PLACEMENT SPANISH LANGUAGE AND CULTURE

PREREQUISITE: SPANISH 4 HONORS AND TEACHER RECOMMENDATION
GRADE 12 ♦ FULL YEAR - 1 UNIT

In this advanced course, students will attain proficiency in the areas of listening, speaking, writing, reading and some literary analysis. As candidates for advanced placement in college, students acquire the ability to understand spoken Spanish in connected discourse, to speak with ease and fluency in conversational Spanish and to write persuasively and accurately on a variety of topics. High school course credit will be awarded upon completion of the Advanced Placement College Board exam associated with the course, and all other assignments through the end of the PCSD school year. Many colleges award advanced credit and/or standing on the basis of the examination results.

LATIN

0406 LATIN 1

PREREQUISITE: NONE
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

The course is for students beginning the study of Latin. It is especially appropriate for those who wish to begin the study of a second world language. The enhancement of language skills, both Latin and English as well as Latin's influence upon English vocabulary and grammar, are central to the curriculum. This is a traditional course designed to bring students quickly to the stage of reading Latin passages about Roman culture and civilization in the early Roman Empire. Grammar, mythology, and ancient customs are woven into the context of the stories.

0427 LATIN 2

PREREQUISITE: LATIN 1 OR LATIN 8
GRADES 9-12 ♦ FULL YEAR - 1 UNIT

This is the second unit of credit in the Regents sequence. Students' grammar, translation, and comprehension skills expand significantly as they learn to assimilate previous material on a broader basis. Active student involvement via projects, reading aloud, and memorization help expand both Latin and English vocabularies. Grammar and culture intertwine as students read about Roman culture and civilization in the early Roman Empire.

0437 LATIN 3

PREREQUISITE: LATIN 2
GRADES 10-12 ♦ FULL YEAR - 1 UNIT

This is the third unit of credit in the Regents sequence. Students are increasingly called upon to use their knowledge of Latin to comprehend both authentic and adapted passages. The grammar principles are more sophisticated as is the word study and derivation. Stories about Ulysses (Odysseus), Hercules, and Jason will prepare students to read selections from the following ancient authors: Martial, Caesar, Cicero and Vergil. Baths, gladiatorial games, weddings and funerals, as well as acknowledgment of Rome's expansion under Julius Caesar and the emperors are among cultural topics studied. The spring semester concludes with an introduction to poetry. A comprehensive final exam aligned to the NYS language requirements is administered at the conclusion of this course.

0453 ADVANCED PLACEMENT LATIN

PREREQUISITE: LATIN 2, LATIN 3
GRADES 11-12 ♦ FULL YEAR - 1 UNIT
[MHS AND SHS OFFERED IN 2026-2027 AND 2028-20279]

This is a Latin Prose and Poetry course. The AP Latin curriculum affords students the opportunity to read from Books I, IV, V, and VI of Julius Caesar's *De Bello Gallico* and from Books I, II, IV, and VI of Vergil's *Aeneid*. The historical and cultural background of Julius Caesar's campaigns in Gaul and the heroic epic story of Aeneas and the Trojan expatriates allow students to experience history, legend, and mythology as well as to find satisfaction in their own significant reading skills. Students will master literary techniques, elements of style, and specific vocabulary and idioms of Caesar and Vergil. The course will include the study of political, social and cultural backgrounds in the age and rule of Julius Caesar and his heir Augustus. The course concludes with the taking of the nationally administered Advanced Placement Latin Examination and all other assignments through the end of the PCSD school year. Many colleges award advanced placement credit, advanced standing, or both, on the basis of these examination results.

0454 LATIN LITERATURE HONORS

PREREQUISITE: LATIN 2, LATIN 3
GRADES 11-12 ♦ FULL YEAR - 1 UNIT
[**MHS and SHS OFFERED IN 2025-2026 AND 2027-2028]**

This is a Latin literature course with college credit opportunity. The works of Catullus combined with those of Horace or Ovid or Cicero are read during the year. The 1st century B.C. provides the backdrop for the literature of the poet Catullus and one of the other writers in a given year. Students will master literary techniques, elements of style and each author's specific vocabulary. The course will include the study of the political, social, and cultural backgrounds in the age and reign of Augustus. Students enrolled in this course can pay tuition (at a significantly reduced rate) to the University of Albany. Upon successful completion, students will receive credit from both Pittsford and the University of Albany.

***There is the potential for dual credit for students who enroll in this course through SUNY Albany.**

0528 LEADERSHIP DEVELOPMENT SEMINAR

Grades 9-12 ♦ SEMESTER (18 classes)

This seminar is open to all students. If you would like high school credit for your Career Internship Program (CIP) you must complete Leadership Development Seminar (LDS). LDS students attend seminar once a week, for one semester only, during their high school experience. The seminars will help you make a successful "Career Connection" by developing and refining your workplace leadership skills.

We suggest students take LDS during their Freshman year when they have more flexibility in their schedule.

0845 CAREER INTERNSHIP PROGRAM

PREREQUISITE: LEADERSHIP DEVELOPMENT SEMINAR
GRADES 11-12 ♦ SEMESTER 1, 2, SUMMER

The Career Internship Program (CIP) is a school-business partnership that provides students the opportunity to obtain non-paid, on-site, career exploration experiences. The major objectives of the program are to:

- Provide students with real world experiences to obtain an awareness of interested careers so they make informed career and college choices for the future;
- Obtain first-hand understanding and appreciation of the knowledge, skill, occupation outlook and education requirements necessary for various occupations; and
- Introduce students to positive mentors who can help instill, reinforce and demonstrate important behaviors such as a positive attitude, integrity, ethics, human relations, teamwork, timeliness, etc.

Acceptance into the program is based on:

- Completion of Leadership Development Seminar prior to starting internship
- Defined field of interest
- Good academic standing
- Student/Parent provided transportation

The summer application deadline is the Friday prior to February break. Applications for an internship during the school year must be submitted 6-8 weeks prior to the requested start date. Internships cannot be guaranteed. If a specific internship is not available, other options can be explored with the student.

This is a NYS accredited course and summer students need to be prepared to devote an adequate amount of time for the working hours, the learning associated with an internship and any paperwork requirements. Maximum of one internship per student.

Apply online at: Pittsfordschools.org/career exploration

0547 WORK-BASED LEARNING EXPERIENCE*

GRADES 9-12 ♦ FULL YEAR - ½ TO 1 UNIT OBTAINABLE EACH OF THE FOUR YEARS OF HIGH SCHOOL THIS CLASS IS *REQUIRED* TO RECEIVE A CTE SEAL ON YOUR DIPLOMA

The Work-Based Learning Experience Program provides students who are taking courses in the Business Department with an opportunity to gain practical work experience related to their classroom instruction by working in jobs within the community. Upon successfully completing the requirements of the work-based learning experience program, you will earn:

- one-half (½) unit of academic credit for 150 hours of work experience
- or one (1) unit of academic credit for 300 hours of work experience for each year that you are enrolled in the program

Successful completion of the course is based on hours worked and attendance and participation in weekly seminars. This program is under the supervision of a certified teacher coordinator. If you are enrolled in the Cooperative Work Experience Program, you must have also completed Leadership Development Seminar.

Work-Based Learning Experience Program is referenced in more detail under Business Education Dept.

0846 COMMUNITY SERVICE PROGRAM

GRADES 6-12 ♦ ¼ - 1 UNIT CREDIT DURING SCHOOL YEAR/SUMMER

Pittsford Central School District's accredited Community Service Program supports student grades 6-12 (School year starts July 1). Community Service is encouraged but not required. Students can receive school credit on their transcript by performing valuable and useful non-paid service in the community. Volunteer information and assistance is available in the Community Service Offices at the middle and high schools or online at pittsfordschools.org/community service.

For each completed service activity, students are required to submit a Community Service Form with parent verification (Under 10 hours) and agency verification (over 10 hours with one organization).

Submissions are reviewed and credit is applied for hours that meet community service guidelines. School credit is awarded and placed on the student's school transcript in June of the junior year and September, January and June of the senior year:

75	non-paid service hours:	.25 Credit
150	non-paid service hours:	.50 Credit
225	non-paid service hours:	.75 Credit
300+	non-paid service hours:	1.0 Credit

Students may receive a maximum of 1 full credit during their school career. All forms must be submitted within **one year** of service for credit and meet the criteria for community service. **Senior early decision/action applicants must submit hours by the first Friday school is in session in September.** Seniors can continue to submit all year long.

NETWORK OF COMPLEMENTARY SCHOOLS, INC.

Pittsford Central Schools is a member school in The Network of Complementary Schools, Inc. which is a group of independent and public schools that have joined together to serve their students in an unique way by sharing their specialized programs. Programs are designed to be "intensive" experiences often focused on a single topic or being fully involved in a one or two week long experience in which the student goes to a member school and stays with a host family. Most of the Network programs offered take advantage of a special strength or resource of a particular school – often based on geographical or historical factors.

Students enrolled in Network member schools can elect any Network program across the country at no cost for tuition, room and board. Transportation costs are normally borne by the student's family. Some travel scholarships are available for families that cannot afford the travel expenses.

Network exchanges are open to students in grades 9 - 12 in good academic standing. Information and applications are available in the Counseling Office.

Eastern Monroe Career Center
Career and Technical Education Programs
2026-2027

Eastern Monroe Career Center (EMCC) courses allow junior and senior students to spend a half-day at the Center and the other half of the day at their home high school taking scheduled academic courses. EMCC provides skill development and preparation for entry-level jobs and/or post-secondary education.

Three (3) or 3.5 units of high school credit can be granted. Many courses at EMCC offer the opportunity to earn college credit in addition to the high school credits.

Please see your counselor if you are interested in taking a course through EMCC.

EMCC Program Guide

Course descriptions are updated at the beginning of the school year, and it provides information about the course for the following school year. Every attempt is made to make sure this information is accurate at the time it is distributed, however, for the most up-to-date information on EMCC programs, please visit our webpage at: https://emcc.monroe.edu/programs.