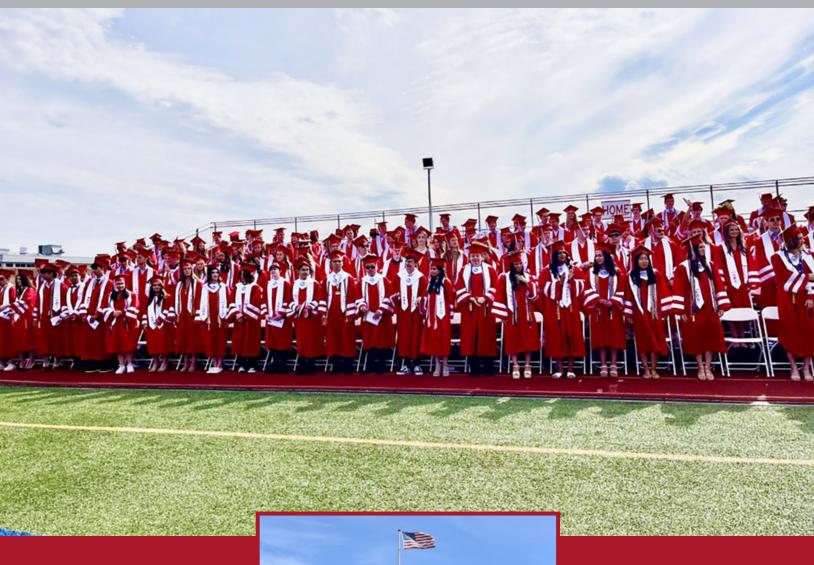


SOMERS HIGH SCHOOL COURSE SELECTION GUIDE 2024-2025









SOMERS HIGH SCHOOL



"Democracy cannot succeed unless those who express their choice are prepared to choose wisely. The real safeguard of democracy, therefore, is education."

– FRANKLIN D. ROOSEVELT

TABLE OF CONTENTS



Mission, Vision & Values	2
Planning an Academic Program	3
Higher Level Course Options	6
Counseling Services	7
English	8
Social Studies	14
Science	22
Mathematics	30
World Languages and Literatures	38
Visual Arts	42
Performing Arts	48
Technology and Engineering	54
Health and Physical Education	58
Specialized Options	62
International Baccalaureate	64
Alternative High School	68
Independent Study	71
Support Services and Special Programs	72
Consultant Teacher Direct Skills Class	73
SHS Academic Support Center	74
SHS Writing Center	74
SHS Transitional Support Program	75
BOCES Tech	76
Four Year Academic Planner	77

GUIDING INSTRUCTIONAL PRINCIPLES OF SOMERS CENTRAL SCHOOL DISTRICT

Our Mission

Somers Central School District will ignite a passion in each student by engaging students at a personal level to ensure success in a global society.



Our Vision

The vision for SCSD encompasses three fundamental areas, each an important component of the Whole Child —

· 21st Century Knowledge & Skills

 Social-Emotional-Physical Wellness
 Global Citizenship

Our Values We desire to be a school district that –

- Believes our schools are the center of our community a safe place to be and grow.
- Leads by example and encourages students to follow their passions.
- Holds high expectations for student achievement and character.
- Develops a k-12 curriculum, instructional resources, and assessments intended to prepare students to thrive in a global community.
- Recognizes and celebrates the collective efforts and achievements of the Somers community and embraces a healthy balance of participation from all stakeholders.
- Values social/emotional/physical wellness as much as academic achievement.
- Believes the arts are vital to the core curriculum.
- Gives back to the community through service to others.
- Understands the law, the constitution, and our civic, ethical and personal responsibilities to each other.
- Develops relationships that are characterized by honesty, respect and integrity.
- Learns from and works collaboratively with individuals from diverse cultures, religions and lifestyles in a spirit of mutual respect and open dialogue.
- Supports and encourages professional collaboration, district-wide and with local organizations, to promote student learning.
- Is driven by a sense of continuous improvement.

PLANNING AN ACADEMIC PROGRAM

The purpose of this manual is to assist students, parents and guardians in understanding and choosing between the range of academic course offerings at Somers High School. SHS practices guided enrollment in course selection, allowing students to choose their level of challenge with the assistance of teacher and counselor advisement. This guided enrollment practice is qualified by minimum course enrollment requirements and successful completion of any pre-requisite courses.

Course selection should be a highly individualized process that strives to accomplish a healthy blend of academic challenge and support. We respect the fact that each student's workload tolerance will be different, and can change from year to year. In addition to satisfying NYS graduation requirements, each student must also consider her or his individual educational and career interests, past academic performance, demonstrated commitment, learning style, current academic habits, and extra-curricular commitments.

As noted below, higher level courses will require independent reading and learning, as well as application of that independent learning to new problems in the classroom and in assessment. While these are all important factors in decision making, SHS recognizes that student learning is not static. Each student's academic journey will differ with the experience of academic successes and challenges from year to year. This experience in learning will evolve over the course of a lifetime. High school is one step of that journey.

COURSE SELECTION TIMELINE

January: Course offerings and descriptions are made available to students in grades 8-11. This also begins the teacher advisement period for the following year's courses.

February-

- March: Students meet individually with counselors to select courses for the following year.
- **April:** Course requests are open for review online. The open enrollment period deadline will be communicated to students, parents and guardians.
- **May:** Course requests are tallied by building administration, and the following year's master schedule is created. Note that courses with insufficient enrollment requests may not run.
- **June:** Verifications of courses that can be scheduled are open for review online. This is not an actual schedule, but a communication of which courses are able to be scheduled among all of a student's requests.
- August: Student's schedules, including period, teacher and room assignments are open for review online.

COURSE LEVEL OPTIONS BEYOND THE COLLEGE PREP

Students seeking to enroll in an academic level that is higher than what has been advised may do so by completing an Academic Advising Form. This form does not prevent the student from pursuing a higher level, but serves to ensure clear communication of information between school and home regarding course selection.

Honors (H): These courses represent a more rigorous alternative to the Regents curriculum. Regents standards will be met and explored in greater depth. Where required, courses may culminate in a NYS Regents Exam. These courses assume a strong foundation and academic curiosity in the chosen discipline. Students may also be required to complete a summer assignment. These courses assume a high level of academic curiosity in the chosen discipline, and will require independent reading and learning, as well as application of that independent learning to new problems in the classroom and in assessment. Honors courses carry a transcript weighting of plus 3 points.

Dual Enrollment (DE): These courses follow a college level curriculum (see pg. 6), affording students the opportunity to earn both high school and college credit simultaneously. To earn credit, students must pay a discounted tuition rate, and earn a final course average of 75 or higher. DE courses may be subject to a college's enrollment criteria, which would supercede SHS open enrollment practice. DE courses carry a transcript weighting of plus 3 points.

Advanced Placement (AP): These courses follow a highly rigorous College Board curriculum that culminates in an AP Exam in May. By demonstrating proficiency on an AP Exam with a score of 3, 4 or 5, students may be eligible to earn college credit, or bypass entry level courses at the college level. AP courses carry a transcript weighting of plus 6 points.

PLANNING AN ACADEMIC PROGRAM ... continued

International Baccalaureate (IB): These courses are available to students in grades 11 and 12, and follow a highly rigorous, internationally developed curriculum. Through an international lens, IB courses offer greater depth and breadth of knowledge in related course work. Students have the opportunity to take stand alone IB courses, or to pursue the distinction of an IB Diploma (see pg. 62). By demonstrating proficiency on an IB Exam with a score of 4, 5, 6 or 7, students may be eligible to earn college credit, or bypass entry level courses at the college level. IB courses carry a transcript weighting of plus 6 points.

Course weighting note: Please be aware that colleges may disregard the SHS weighting system and apply their own values to courses. Also note that weighting applies only to the final average, and not to a student's quarterly, honor roll calculation.

GRADUATION REQUIREMENTS

New York State requires that students complete a minimum of 22 credits, and pass 5 Regents Exams to earn a diploma. Students are advised, when possible and appropriate, to challenge themselves beyond the minimum course requirements noted below, particularly in those major academic subject areas where less than four years are required. It is also important to note that some undergraduate majors require specific courses for admission, particularly in fields related to science or math.

Course	Credits
English	4
Social Studies	4
Math	3
Science	3*

Course	Credits
World Languages	1**
Art/Music/IED	1
Physical Education	2
Health	0.5

Plus electives as needed to total 22 credits.

In order to graduate and earn a Regents Diploma, students must score 65 or above on four required Regents Exams (English, one social studies, one math and one science), plus one Regents Exam in a content area of choice (math, science, social studies, or a Career and Technical Education Exam through an approved BOCES program). Safety nets for students with disabilities and exceptions for general education students exist. See your counselor for details. Please note that the type of diploma earned is only recorded on the student's physical diploma, and not on the official transcript. A student's diploma status is not a factor in college admissions or future employment opportunities.

COURSE ENROLLMENT REQUIREMENTS: Students in grades 9-11 must be enrolled in a minimum of 6.5 credits including physical education per semester per academic year. Students in grade 12 must be enrolled in a minimum of 5.5 credits including physical education per semester. Time required for support classes may be considered towards these minimum enrollment requirements. Students are strongly encouraged to take additional courses according to their special interests and college/career plans.

ADD/DROP COURSE PROCESS: The add/drop policy at Somers High School was developed to assist students in making responsible academic decisions, to provide equitable opportunities for all students in the scheduling of classes, and to maintain the integrity of the academic program. Note that an Add or Drop applies to new courses. Level changes apply to courses in the same subject area.

- 1) Students seeking to add a course at the start of a semester must do so no later than the 16th day of instruction. Students seeking to add a course beyond this date must acquire special administrative permission. Students are responsible for work missed.
- 2) Fall semester courses dropped five days after the first quarter interim period, and spring semester courses dropped five days after the third quarter interim period will be designated as "W" or "W/F", on the transcript.
- 3) Full year courses dropped five days after the end first quarter will be designated as "W" or "W/F", on the transcript. Full year courses cannot be dropped more than five days after the end of the second marking period.
- 4) Course level changes that occur five days after the first quarter interim period will carry the grade from the prior level to the new course level. Course level changes will not be permitted after the end of the first quarter without administrative approval.
- 5) Written parent permission is required for all schedule change requests.
- 6) Changes to senior schedules made after the point of application will be communicated to colleges to which the student has applied.

^{*} At least one course must be life science and at least one must be physical science. A course in technology can be used as the third unit of credit in science or math, but not both.

^{**} New York State's general Regents graduation requirement in World Languages (one year), is lower than many college or university minimum entrance requirements.

7) Changes that would result in a student in grades 9-11 being enrolled in less than 6 ½ credits, or in grade 12 being enrolled in less than 5 ½ each semester are not permitted, absent extrordinary circumstances approved by building administration. An Independent Study cannot be counted as one of these credits.

CREDITS AND TRANSCRIPTS

All school-based courses (taken at SHS or transferred from another accredited high school), corresponding final averages, and credits earned are maintained on a permanent record for each student to comprise a student's official high school transcript. The recording of courses follows the SHS Add/Drop Course Process in order to provide an accurate reflection of a student's academic history. Both a weighted and unweighted cumulative GPA are presented on student transcripts for college admissions or scholarship consideration. Students at SHS are not ranked. Official transcripts may be sent to colleges, future employers, or other agencies upon completion of an Official Transcript Request Form.

Academic courses taken either online or through a college will only become part of the high school transcript if they have been administratively approved in advance of the student enrolling. To be approved for inclusion on the transcript, courses must be required for graduation, offered by an accredited institution, and align with the school's curriculum. An approved course for which the student has demonstrated evidence of a passing mark, will be recorded on the transcript with a grade of "P".

Courses that may be approved are courses taken for credit recovery, courses required for earning a diploma, or courses required under unique circumstances as determined by the SHS administration. Note that a semester of an approved college course (taken online or at the college) will be awarded one full high school credit.

When a failed course is successfully recovered, the prior year's failed course grade will be changed to an 'F'. This will create an accurate indication of the student's academic history, but will not factor into the student's cumulative GPA. To be eligible to participate in a course recovery or summer school program, students must have not missed more that 45 days of instruction of a full year course, 23 days of a half year course, or the equivalent home instruction hours in the failed course. Exceptions to this rule can only be made with administrative approval.

QUARTERLY AVERAGE AND CUMULATIVE GPA CALCULATIONS

Quarterly averages are computed at the end of each marking period for the purpose of honor roll recognition. Honor Roll recognition is achieved by earning an 85 average or better, and High Honor Roll is achieved by earning a 90 average or better. This is an unweighted average, calculated by averaging all courses. Course values in the calculation may differ, based on the credit students are eligible to earn in that course. (A 90 average in a full year course and an 85 average in a half year course are factored as 90 plus 42.5, divided by 1.5.) This same formula applies to the calculation of a cumulative unweighted GPA. A course can only be factored into the GPA once a final average is earned. If the course carries academic weight (Honors, DE, AP or IB), the associated course weight is applied to the final average recorded on the transcript. See pg. 3-4 for course level weighting information.

To minimize competition among students, Somers High School does rank students for the purpose of college admissions. SHS is proud of the many accomplishments of our students and wishes to promote a more holistic review of each of our students through the college admissions process. Class rank will only be calculated for the purpose of determining the senior class Valedictorian and Salutatorian, or for direct submission to scholarships that mandate the reporting of class rank. This calculation will be a weighted average of all grades earned through the end of a student's junior year. Transfer students to SHS are eligible for Valedictorian or Salutatorian status if they have completed at least two full years of course work at SHS by the end of eleventh grade. Since all schools use their own weighting system, for those eligible students who transfer to SHS at the beginning of sophomore year, a weighted average will be calculated (for those courses taken at another school) that is commensurate with our current system of weighting for Honors, Dual Enrollment, AP and IB courses.

COURSE LEGEND:



The course has been approved by NCAA Clearinghouse for college athletics.

The course offers college credit.

DUAL ENROLLMENT (COLLEGE CREDIT) COURSES

In addition to opportunities to earn college credit through AP and IB assessments, students may also earn college credit through the following courses:

Course	College	Credit	2023-2024 Cost
Advanced College Italian DE	Westchester Community College	3	\$207
Calculus DE	Westchester Community College	4	\$276
College Level Italian DE	Westchester Community College	3	\$207
College Level Spanish DE	SUNY Albany	3	\$190
PLTW: Civil Engineering and Architecture DE	Rochester Institute of Technology	3	\$225
PLTW: Digital Electronics DE	Rochester Institute of Technology	3	\$225
PLTW: Intro to Engineering Design DE	Rochester Institute of Technology	3	\$225
PLTW: Principles of Engineering DE	Rochester Institute of Technology	3	\$225
PLTW: Principles of Biomedical Science	Rochester Institute of Technology	3	\$225
PLTW: Human Body Systems	Rochester Institute of Technology	3	\$225
SUPA Public Policy DE	Syracuse University	3	\$345
Intermediate Science Research (10-11 Summer)	SUNY Albany	2	\$190
Intermediate Methods of Research	SUNY Albany	4	\$190
Advanced Science Research (11-12 Summer)	SUNY Albany	2	\$190
Advanced Methods of Research	SUNY Albany	4	\$190

Note that tuition charges may increase for the following school year. Students must independently complete each college's enrollment information by prescribed deadlines provided by SHS teachers. Science research summer work is not HS credited, but eligible for college credit for students who enroll with Albany's UHS. Not all colleges will accept credit for dual enrollment courses. Check with your college of enrollment regarding acceptance of credit.

ADVANCED PLACEMENT COURSES

AP English Language	AP Economics	AP Biology	AP Spanish Language
AP English Literature	AP Calculus AB	AP Chemistry	AP Music Theory
AP World History	AP Calculus BC	AP Physics I	AP Art and Design
AP American History	AP Statistics	AP Physics C	
AP European History	AP Computer Science Principles	AP Environmental Science	

INTERNATIONAL BACCALAUREATE COURSES

IB English Language and Literature HL Yr 1	IB Mathematics: Applications & Interpretation SL Yr 1	IB French SL, HL
IB English Language and Literature HL Yr 2	IB Mathematics: Analysis & Approaches SL Yr 1	IB Spanish SL, HL
IB Literature and Performance SL	IB Mathematics: Applications & Interpretation SL Yr 2	IB Visual Arts SL
IB History HL Yr 1	IB Mathematics: Analysis & Approaches SL Yr 2	IB Film SL, HL
IB History HL Yr 2	IB Business Management SL	IB Dance SL/HLs
IB Psychology SL	IB Environmental Systems & Societies SL	
IB Theory of Knowledge Yr 1*	IB Sports, Exercise, and Health Science SL	
IB Theory of Knowledge Yr 2*		

*IB Diploma Candidates

COUNSELING SERVICES

Mission

We, the Somers Central School District Counseling Department, will nurture our school community by advocating for and promoting a healthy learning environment in order to ensure individual student success in current and future endeavors.

Vision

Our school counseling program is designed to foster authentic student to counselor relationships wherein each student is valued and able to recognize his or her own self-worth. We will make a concerted effort to communicate and demonstrate our concerns for and commitment to our students. As a result, each student will feel that he or she is valued as a member of our school community. In the Somers counseling department:

- Attention is focused on facilitating the successful transition of our students between the four schools.
- Each student and family is provided the information, assistance, and support that enable them to develop personalized educational and career goals.
- The social-emotional well-being and academic progress of each child are regularly monitored, and appropriate services are initiated as needed.
- The resources of the department are available to individual students, families, classes, grade levels, and teachers.
- Professional learning is encouraged and supported in a collaborative environment.

Collective Commitments

In order to advance our shared vision of an excellent counseling program, we will:

- Provide each child with a safe and caring environment that enables him or her to develop appropriate educational and career goals.
- Collaboratively monitor the social and emotional wellness of each child and deliver personalized services.
- Grow as a professional team and build on our strengths.
- Recognize and respect the different developmental levels of readiness of each of our students.
- Provide support to students and families in the present and future.
- Model the honesty, integrity, and respect we hope to develop in our students.
- Provide appropriate confidentiality to colleagues, parents/guardians, and children.
- Collaboratively work with our school community to deliver the most effective programs, services and resources possible.

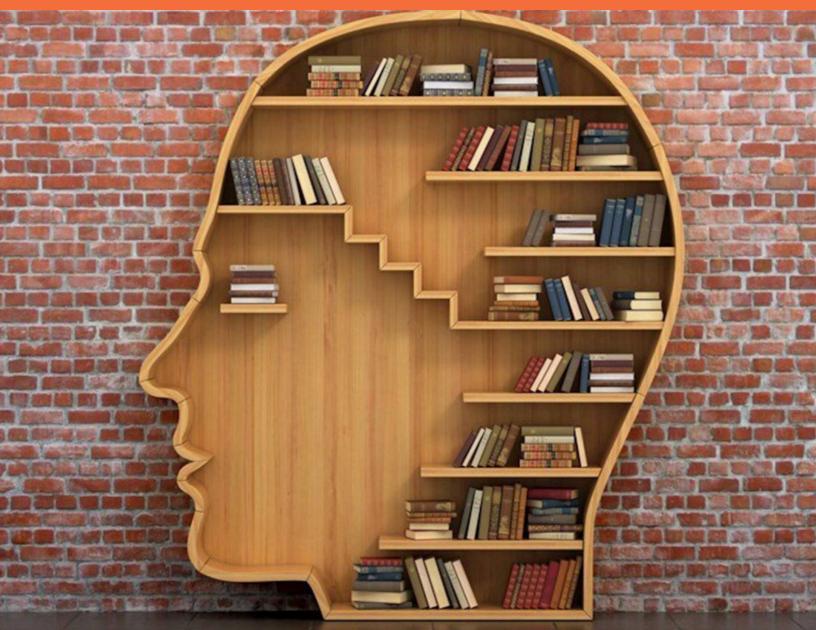
In addition to the school counselors, students can obtain support from the

school psychologists, school social worker and/or the student assistance counselor. For a complete list of counseling resources, including the SHS College Planning Guide, please visit the SHS Guidance and Counseling web page.

Counseling Office Information Phone: (914) 248-8585 • Fax: (914) 248-5286

Mr. Kavanagh, Director of School Counseling & Student Support	ext. 4303, or pkavanagh@somersschools.org	
Mr. Carino, School Counselor	ext. 4302 or accarino@somersschools.org	
Ms. Cawley, School Counselor	ext. 4306, or ecawley@somersschools.org	
Ms. Pappas, School Counselor	ext. 4304, or cpappas@somersschools.org	
Ms. Rivero, School Counselor	ext. 4305, or arivero@somersschools.org	
Ms. Tracy, College and Career Counselor	ext. 4314, or mtracy@somersschools.org	
Ms. Candido, School Psychologist	ext. 4313, or spersichilli@somersschools.org	
Ms. Conlin, School Psychologist	ext. 4312, or jconlinosoria@somersschools.org	
Ms. Rigaglia, School Social Worker	ext. 4310, or krigaglia@somersschools.org	
Ms. Scavelli, School Social Worker	ext. 4307, or sscavelli@somersschools.org	
Counseling support staff: Ms. Cominsky and Ms. Gambelli		

Counseling support staff: Ms. Cominsky and Ms. Gambelli

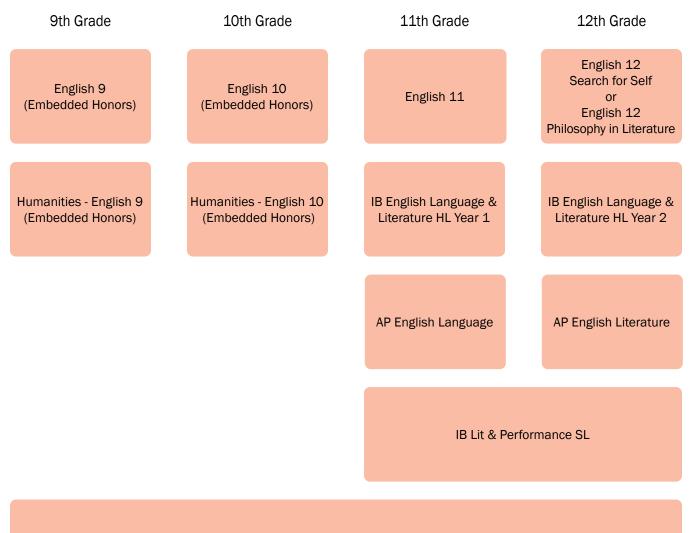


ENGLISH

In keeping with current research in language arts and the New York State Common Core curriculum, the English Department believes that the essential purpose of language study is to enable students to make meaning from and through spoken and written communication. Further, we believe that students become skilled in reading, writing, speaking, and listening through the integrated practice of these activities. Students in all English classes will participate in projects and activities that require research experiences.



ENGLISH COURSE OFFERINGS



Creative Writing Mindfulness Through Literature

Graduation Requirements:

Students must earn four credits in English and pass the Regents exam in 11th grade.

FRESHMAN ENGLISH

EMBEDDED HONORS MODEL Students in English 9 will have the exciting opportunity to extend their learning and earn an Honors designation. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth and level of enriched learning experiences with varied reading and writing options. Furthermore, these tiered assessments offer the opportunity to explore differing depths of complexity, creativity, and skill, while personalized learning offers heightened autonomy and choice. Students will earn honors credit for the year upon completion of a predetermined percentage of tiered assessments at the honors level.

ENGLISH 9

1 Credit

The ninth-grade curriculum involves both literature and language arts study. We will examine various literary genres (e.g., short story, novel, poetry, drama, essay, biography) through works by authors such as Alice Walker, Sandra Cisneros, John Steinbeck, Ray Bradbury, Homer, and William Shakespeare. Our language study stresses writing mechanics and vocabulary, with an emphasis on application in extended writing assignments. We will focus on developing and fostering independence in our learning as we strive to become lifelong readers and writers.

HUMANITIES - ENGLISH 9

NCAA (with embedded honors)

1 Credit

All students who successfully complete this course will earn credit for both Global History and Geography 9 and English 9. The course explores integral concepts related to the human experience - especially the theme of how identity is shaped and influenced - through the blended study of global history, geography, literature, and language arts. This class provides students with an opportunity to study the central themes, historical periods, and texts used in the ninth-grade English and Social Studies courses with a focus on personal inquiry, research, and writing. All students in this class will have the opportunity to extend their learning and earn an Honors designation through the completion of a predetermined number of tiered assessments at the advanced level. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit through advanced options; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the

opportunity to monitor their own growth with varied reading and writing options. Furthermore, tiered assignments offer the opportunity to explore differing depths of complexity, creativity, and skill. Personalized learning offers heightened autonomy and choice.

SOPHOMORE ENGLISH

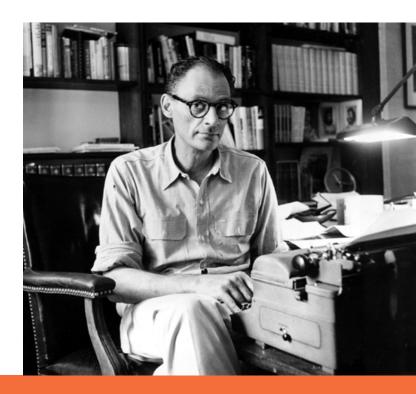
EMBEDDED HONORS MODEL As in 9th grade, all students in English 10 will have the opportunity to extend their learning and earn an Honors designation. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth and level of enriched learning experiences with varied reading and writing options. Furthermore, these tiered assessments offer the opportunity to explore differing depths of complexity, creativity, and skill, while personalized learning offers heightened autonomy and choice. Students will earn honors credit for the year upon completion of a predetermined percentage of tiered assessments at the honors level.

ENGLISH 10

NCAA

1 Credit

The tenth-grade curriculum includes an in-depth examination of American literature accomplished through readings including non-fiction, poetry, and selected works by such authors as Hansberry, Salinger, Miller, and Shakespeare as well as some



non-fiction and film. Attention is given to speaking and listening skills through oral reports and class presentations and to writing skills through the study of narrative, expository, persuasive, and descriptive writing. Students will also engage in the research and writing of essays and projects/presentations on free-choice reading. Student success in this course helps to determine readiness for 11th grade English, AP English Language, or IB English HL Year 1 in junior year.

HUMANITIES - ENGLISH 10NCAA(with embedded honors)1 Credit

All students who successfully complete this course will earn credit for both English 10 and Global History and Geography 10. The course builds upon the foundations established in Humanities 9, exploring how the concepts of identity and conflict intertwine in history and literature. This class provides students with an opportunity to study the central themes, historical periods, and texts used in the tenth-grade English and Social Studies courses with a focus on personal inquiry, research, and writing. All students in this class will have the opportunity to extend their learning and earn an Honors designation through the completion of a predetermined number of tiered assessments at the advanced level. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit through advanced options; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth with varied reading and writing options. Furthermore, tiered assignments offer the opportunity to explore differing depths of complexity, creativity, and skill. Personalized learning offers heightened autonomy and choice.

JUNIOR ENGLISH

ENGLISH 11 NCAA

1 Credit

The English 11 class emphasizes communication and critical thinking skills that are honed through class discussion, oral reports, literary analysis, and a great deal of writing. Longer fictional texts will be supplemented by independent reading, short stories, essays, poetry, and the summer reading selections. Students produce a major research paper and other smaller research-based writing tasks during the course, and they all take the Common Core Regents Examination in English Language Arts at the end of the year.

AP ENGLISH LANGUAGE

1 Credit

This full year, college level course is designed for students who have an advanced command of the mechanics of language and seek to engage in higher level reading, analysis and discussion of writing. Students learn how to use language more effectively. and to think critically and analytically. To this end, students read a variety of both fiction and non-fiction from a wide range of time periods in order to learn how to read texts closely, paying careful attention to the subject, purpose, audience, and rhetorical strategies of the author. Students study genres including expository, narrative, argumentative, personal, and fiction; featured fiction works include Lord of the Flies. The Great Gatsby, Slaughterhouse-Five, and The Things They Carried; among the non-fiction writers studied are Thomas Jefferson, Frederick Douglass, Elizabeth Cady Stanton, Ho Chi Minh, Annie Dillard, Dr. Martin Luther King, Jr., Abraham Lincoln, Zora Neale Hurston, Jamaica Kincaid, David Sedaris, Virginia Woolf, and George Orwell. Students must take both the AP Language and Composition exam and the New York State Regents exam.

IB ENGLISH LANGUAGE & LITERATURE YEAR 1 NCAA College Grade 11

Grade 11 • 1 Credit

This language and literature course aims to develop skills of textual analysis and the understanding that texts, both literary and non-literary, can relate to culturally-determined reading practices. The course also encourages students to question the meaning generated by language and texts. An understanding of the ways in which formal elements are used to create meaning in a text is combined with an exploration of how that meaning is affected by reading practices that are culturally defined and by the circumstances of production and reception. The study of literature in translation from other cultures is especially important to IB Diploma Candidate students because it contributes to a global perspective. Texts include: The Things They Carried, Macbeth, The Handmaid's Tale, and The Narrative of the Life of Frederick Douglass as well as numerous other shorter texts chosen from a variety of sources, genres, and media.

SENIOR ENGLISH

SENIOR REQUIREMENTS :

**All seniors are required to take a full year of English. For seniors who are not enrolled in AP or IB courses, there are two full-year course options (see below).

ENGLISH 12 – SEARCH FOR SELF NCAA

1 Credit

In the first semester of this full-year course, students will have opportunities to develop and strengthen their reading and writing skills, with an emphasis on college readiness tasks such as close reading, planning and organization for essay writing, revision, and formatting. Literary units are based on a variety of themes, using fiction and non-fiction selections to explore ideas concerned with understanding oneself, learning about and developing identity, introspection, and much more. In the second semester, students will explore additional content areas including creative writing, reading beyond the classics, and public speaking. The course will culminate in a student-driven project or internship in May and June.

ENGLISH 12 – PHILOSOPHY IN LITERATURE NCAA

1 Credit

In the first semester of this full-year course, students will explore 20th - 21st century philosophy and literature, using various literary forms as vehicles for discovery. This course will focus on overarching tenets presented by famous thinkers. Coursework will include research and discussion on such philosophical concepts as Buddhism, existentialism, aesthetics,

and more. Students will incorporate their understanding of these philosophical ideas and branches with both short texts and major works from such authors as J.D. Salinger, August Wilson, Margaret Atwood, and Simon Rich. In the second semester, students will explore enriching topics including writing, independent reading, and presentations. The course will culminate in a student-driven project or internship in May and June.

IB ENGLISH LANGUAGE AND LITERATURE HL YEAR 2 NCAA

Grade 12 • 1 Credit

This course is a continuation of IB English Language and Literature Year One, which is a prerequisite for Year Two. It counts as a Group 1 class for IB Diploma Candidates, or it may be taken as a certificate course. Possible texts include: Purple Hibiscus, Persepolis, and the translated poetry of Wistawa Szymborska as well as numerous other shorter texts chosen from a variety of sources, genres, and media. The course will culminate with submission of all IB English internal and external assessments as well as a student-driven project or internship.

AP ENGLISH LITERATURE



1 Credit

This full-year, college-level course has been designed for the 12th-grade student who loves literature. The course will emphasize close reading of poetry and prose and writing about literature with clarity and sophistication. A seminar approach emphasizing student participation will focus on the works of such writers as Ernest Hemingway, August Wilson, Denis



Johnson, Yaa Gyasi, Terrance Hayes, and William Shakespeare. Students will take the AP examination in May, after which they will complete a student-driven project or internship.

ENGLISH ELECTIVES

IB LITERATURE AND PERFORMANCE SL NCAA

Grades 11-12 • 1 Credit

This course is an interdisciplinary combination of an English class and a theater class, in which participants will examine both the literary and theatrical elements of 5 works chosen from among novels, plays, short stories, and poetry. Students will study and write about the literary aspects of these works, study the features of bringing drama to life on the stage (dialogue, body language, lighting, direction, sound, costume, acting, etc.), turn an excerpt of a novel or short story or poem into a dramatic work that they direct and/or perform, and reflect on the dramatic choices they make. This potentially college-credit bearing IB course has two formal projects and a culminating examination. It can be taken by any senior as the 12th grade English requirement, by any junior as an elective English course, and by an IB Diploma Programme Candidate as a Group 1 SL course during junior or senior year. To meet the required 150 hours for an IB SL course, it will run for one year with an additional lab.

CREATIVE WRITING

Grades 9-12 • ¹/₂ Credit

This course is offered to students in all grades. The students in this half-year course will work in many forms, including but not limited to fiction, nonfiction, and poetry. Students will study the techniques of exciting contemporary writers while honing their own craft through imaginative exercises and projects. Indeed, both words of the course's title ring true: the course emphasizes creativity and how it manifests through the writing process.

MINDFULNESS THROUGH LITERATURE

NCAA

NCAA

Grades 9-12 • 1/2 Credit

This course is offered to students in all grades. What does it mean to be "happy"? How does literature, journalism, writing, autobiography, song lyrics, podcasts, and research help us understand the Human Condition and connect to our authentic selves? Why do we love? Why do we hate? What does it mean to live a life of presence and purpose? Does money truly make us happy? How does taking time to be present and off of technology help us center and literally "rewire" our brains? We will examine life's big questions by reading excerpts from Steve Jobs, Chris Rock, JayZ, U2, Eminem, Thoreau, Tibetan Buddhists, Deepak Chopra, Janice Kaplan, and a collection of advice columns, various podcasts, TEDtalks, viewing movie clips ("Grand Canyon" "Jojo Rabbit," etc), and MUCH MORE!. And of course, the goal is to explore the meaning of life in reading, writing, presenting, and approaches to mindfulness. We will seek to "go to the woods... to live deliberately" -- "I went to the woods because I wished to live deliberately, to front only the essential facts of life, and see if I could not learn what it had to teach, and not, when I came to die, discover that I had not lived" (Henry David Thoreau).



Many stories matter. Stories have been used to dispossess and to malign. But stories can also be used to empower, and to humanize. Stories can break the dignity of a people. But stories can also repair that broken dignity.

Chimamanda Ngozi Adichie

SOCIAL STUDIES DEPARTMENT

Students are required to study four years of social studies and pass at least one Regents Exam in either Global History and Geography or United States History and Government in order to graduate from high school. Students can apply passing of a second Social Studies Regents Exam as their fifth required exam.

Social studies courses help students understand cultures, observe connections to the past, recognize the community of people across time, appreciate the delicate balance of rights and responsibilities in a democratic republic, and develop the habits of thoughtful analysis and reflective thinking.



In social studies classes, students confront questions about the interactions of humankind in the world. They consider essential questions such as: How have humans defined themselves? What characteristics of cultures are similar or different? Who are we as a nation? How has our past shaped our future? How have we found unity in the midst of our diversity? What is the cost of progress? What are our responsibilities to ourselves and our future? From these essential questions, students develop enduring understandings.

The goal of the social studies department is to develop critical and creative thinking skills among our students. Students read and analyze primary and secondary sources, participate in simulations, develop research techniques, work in cooperative groups, and create performance-based projects in which they apply, evaluate and synthesize what they learn. In their research, students utilize the library media center in order to explore a variety of print and electronic resources.

The New York State Learning Standards include history, geography, economics, government and civics. The long-term objective of the state's social studies core curriculum is that students will become responsible and productive citizens and active contributors to a society that is increasingly diverse and interdependent.

LEVELS OF COURSES

Social Studies classes develop skills that are specific to the curriculum such as interpreting political cartoons, graphs and charts; reading maps; and analyzing primary and secondary sources. Reading and writing are daily expectations. Emphasis is placed on literacy, historical thinking skills, and content mastery. Placement in and selection of course levels are based on the abilities, skills and needs of students.

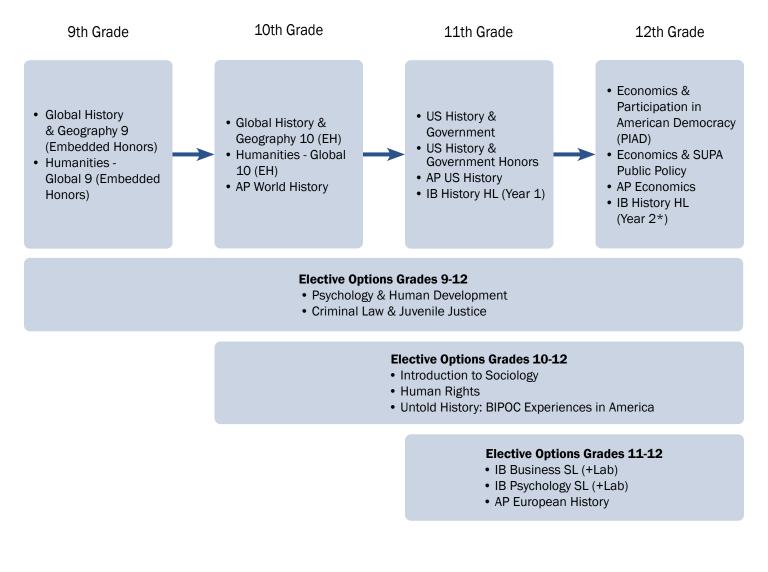
Regents courses develop the social studies skills and key themes outlined in the NYSED core curriculum. Through the use of a variety of resources and activities, students read, write and speak about what they have learned. Course material and learning activities help prepare students for college work.

Honors courses follow the NYSED core curriculum and allow students to meet the same requirements as Regents courses. Additionally, a strong emphasis is placed on independent reading and learning. Honors courses are best suited for highly motivated independent learners.

Advanced Placement courses are a good fit for highly motivated students who have demonstrated outstanding skills in content, reading, writing, and historical thinking. AP courses require particularly strong written and analytical skills and are characterized by extensive supplemental reading and intensive research experiences.

International Baccalaureate courses are a good fit for those students who identify with the IB learner profile. Students are encouraged to ask questions, think critically, and develop into globally-minded citizens.

SOCIAL STUDIES COURSE OFFERINGS



Graduation Requirements:

Students are required to study four years of social studies and pass at least one Regents Exams in either Global History and Geography or United States History and Government in order to graduate from high school. Students can apply passing of a second Social Studies Regents Exam as their fifth required exam.

Please note that IB History HL Yr 1 is a prerequisite for IB History Yr 2 HL.

GLOBAL HISTORY AND GEOGRAPHY

Taught in grades 9 & 10, Global History and Geography is a two-year chronological study that emphasizes common themes of history, geography, economics and civics that recur across time and place during eight historical periods. At the end of grade 10, students must take the Global History and Geography Regents Exam in June.

GLOBAL HISTORY AND GEOGRAPHY 9

NCAA (with embedded honors) Grade 9 • 1 Credit

The course covers a span of time from prehistory to 1750. Beginning with an introduction to global history, students will investigate historical analysis, elements of geography, theory and practice of different economic systems and forms of government. The chronological study begins with civilizations and religions of the ancient world civilizations in India, the Far East, Middle East, Africa and Europe and continues to the Age of Absolutism (1550-1800).

Embedded Honors Model: Every student in Global 9 will have the exciting opportunity to extend their learning and earn an Honors designation. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth and level of enriched learning experiences with varied reading and writing options. Furthermore, these tiered assessments offer the opportunity to explore differing depths of complexity, creativity, and skill, while personalized learning offers heightened autonomy and choice. Students earn will earn honors credit for the year upon completion of a predetermined percentage of tiered assessments at the honors level.

HUMANITIES - GLOBAL 9

NCAA

(with embedded honors)

1 Credit

All students who successfully complete this course will earn credit for both Global History and Geography 9 and English 9. The course explores integral concepts related to the human experience – especially the theme of how identity is shaped and influenced – through the blended study of global history, geography, literature, and language arts. This class provides students with an opportunity to study the central themes, historical periods, and texts used in the ninth-grade English and Social Studies courses with a focus on personal inquiry, research, and writing. All students in this class will have the opportunity to extend their learning and earn an Honors designation through the completion of a predetermined number of tiered assessments at the advanced level. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit through advanced options; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth with varied reading and writing options. Furthermore, tiered assignments offer the opportunity to explore differing depths of complexity, creativity, and skill. Personalized learning offers heightened autonomy and choice.

GLOBAL HISTORY & GEOGRAPHY 10

NCAA (with embedded honors) Grade 10 • 1 Credit

Global History and Geography 10 examines world history from 1750 to the present. The course focuses on themes such as revolution/rapid change, nationalism, imperialism, human rights, global conflict, current global issues and more. Global 10 focuses on the skills needed in order to succeed on the new Global History and Geography Regents exam in June which all students are required to take. These skills include, but are not limited to, in depth analysis of primary and secondary sources, essay writing, critical and creative thought and more.

Embedded Honors Model: Every student in Global 10 will have the exciting opportunity to extend their learning and earn an Honors designation. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth and level of enriched learning experiences with varied reading and writing options. Furthermore, these tiered assessments offer the opportunity to explore differing depths of complexity, creativity, and skill, while personalized learning offers heightened autonomy and choice. Students earn will earn honors credit for the year upon completion of a predetermined percentage of tiered assessments at the honors level.

HUMANITIES - GLOBAL 10

NCAA (with embedded honors)

1 Credit

All students who successfully complete this course will earn credit for both English 10 and Global History and Geography 10. The course builds upon the foundations established in Humanities 9, exploring how the concepts of identity and conflict intertwine in history and literature. This class provides students with an opportunity to study the central themes, historical periods, and texts used in the tenth-grade English and Social Studies courses with a focus

on personal inquiry, research, and writing. All students in this class will have the opportunity to extend their learning and earn an Honors designation through the completion of a predetermined number of tiered assessments at the advanced level. While engaging in rich coursework, students will be invited, encouraged, and supported to pursue Honors credit through advanced options; however, this enrichment opportunity is not required to be successful throughout the year. Students will have the opportunity to monitor their own growth with varied reading and writing options. Furthermore, tiered assignments offer the opportunity to explore differing depths of complexity, creativity, and skill. Personalized learning offers heightened autonomy and choice.

AP WORLD HISTORY: MODERN



1 Credit

In AP World History: Modern, students investigate significant events, individuals, developments, and processes from 1750 to the present. Students develop and use the same skills and methods employed by historians: analyzing primary and secondary sources; developing historical arguments; making historical connections; and utilizing reasoning about comparison, causation, and continuity and change. The course provides six themes that students explore throughout the course in order to make connections among historical developments in different times and places: humans and the environment, cultural developments and interactions, governance, economic systems, social interactions and organization, and technology and innovation. The course is designed to provide students with the analytical and written skills associated with the Advanced Placement exam administered in May.

Prerequisite: Global History and Geography 9 or Humanities 9.

U.S. HISTORY & GOVERNMENT REGENTS OR HONORS

NCAA

Grade 11 • 1 Credit

The history of the United States is the history of a great experiment in a republic and democracy. The basic principles outlined in the Declaration of Independence became the guiding ideas that shaped our nation's development. The Constitution codified these principles into a government of the people. This survey course includes intensive analysis of the Constitution and its influence on the political, social and economic history of the United States.

Prerequisite: Global History and Geography 9 and 10 or Humanities 9 and 10.

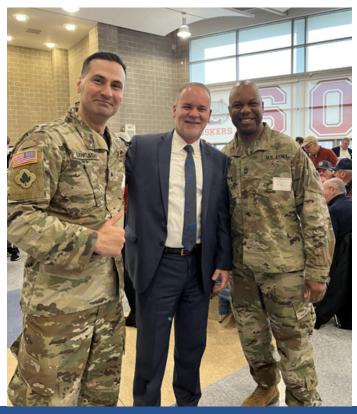
Honors Level: The honors level is for students seeking more from their history class. Honors students delve deeper into the curriculum, both in and out of the classroom. Honors students have substantial reading and writing assignments that are completed alongside the in-class experience. Students hoping to take an honors class should be able to produce clear and coherent written work, read and comprehend grade-level texts without support from the teacher, and manage multiple concurrent assignments.

AP UNITED STATES HISTORY

Grade 11 • 1 Credit

This course presents a traditional chronological survey of American history as befits a freshman in college. The general areas of investigation include the Colonial Period, the American Revolution, the Early Federal Period, the Jacksonian Era, the Civil War and Reconstruction, Populism and Progressivism, the New Deal and the post-1945 era of change in domestic and foreign affairs. Primary source materials, interpretive articles, as well as a text and supplemental books are used. Emphasis is on the discussion of readings and on writing numerous reaction papers. All students enrolled in the course must take the AP exam in May. The course is open to juniors who would also take the U.S. History and Government Regents exam, which is required as a final exam.

Prerequisite: Global History and Geography 9 and 10, or Humanities 9 and 10.



SENIOR YEAR COURSES

All seniors must take two 1/2 credit classes: **Economics and Public Affairs OR Participation in American** Democracy OR W.I.S.E. Government with the exception of seniors who take AP Economics or IB History HL (Year 2)

ECONOMICS NCAA

NCAA

18

Grade 12 • ¹/₂ Credit

This course provides students with an introduction to the fundamental concepts of economics through analysis and evaluation of topics including: economic systems; supply and demand; money; credit and banking; personal finance; business organization and finance; labor unions; taxation; fiscal and monetary policy; and international trade.

Economics is a one-semester program and is a New York State requirement for graduation.

AP IN MACRO AND MICROECONOMICS

Grade 12 • 1 Credit

This college level course prepares students for the advanced placement assessment in Macro & Microeconomics. Students will sit for BOTH the Macro and Microeconomics exams in May. Microeconomics involves analyzing individual economic sectors and their behavior in the economy. Topics will include but not be limited to: supply, demand, prices, opportunity cost analysis, market success, theory of the firm etc. Macroeconomics studies the economy as a holistic entity and its impact on individuals, corporations, government and the global world. Students will study the business cycle, employment, inflation, and how the government influences economic activity. Students will be expected to study and construct various economic models and engage in quantitative analysis such as "game theory", graphic and algebraic studies. This course will integrate the Government 12 course through the lens of Economics but students may enroll in Public Affairs OR Participation in American Democracy as an elective if they choose. Students should be comfortable with math topics from Course I, II, and III or their equivalents. They should expect to use algebra, geometry, mathematics with decimals, fractions and percentages. A departmental recommendation and the expectation of serious study and due diligence should accompany this choice. This completion of this course satisfies the ½ year credit toward Government 12.

SUPA PUBLIC POLICY DE

NCAA

Grade 12 • ½ Credit

Syracuse University Project Advance is a cooperative program between the Maxwell School of Public Affairs & Citizenship at Syracuse University and Somers High School that allows high school students to enroll in a freshman level college course. Students who register for the three college credits and successfully complete the course are entitled to a regular Syracuse University transcript recording the credits earned. The course, which is taught by an adjunct instructor of Syracuse University, enables students to gauge their abilities to do college work in an introductory freshman-level course prior to full-time college study. The Public Policy course is designed to improve student's abilities to analyze, evaluate, synthesize, apply, identify, and forecast the basic components of a public policy. The stages of creating a public policy begin with learning how to locate, collect, use, and present information from surveys, print and on-line resources, and interviews. Students will participate in efforts to develop a public policy, assess its costs and effects, and create strategies for its implementation.

Course requirements include: Five Module Papers and a Team Policy Exercise (TPE).

PARTICIPATION IN AMERICAN DEMOCRACY NCAA Grade 12 • ½ Credit

This course aims to provide students with opportunities to become engaged in the political process by acquiring the knowledge and practicing the skills necessary for active citizenship. Course content, methods, learning activities and research are directed toward the Regents level college bound student. Participation in American Democracy is a onesemester course required for graduation unless a student is enrolled in SUPA Public Affairs, or AP Economics.

IB HISTORY HL – YEAR ONE



Grade 11 • 1 Credit

This is the first year of the two-year higher level (HL) IB History course. This course covers major developments in the Americas, from post-colonial nation-building forward. Other topics include imperialism in the Americas, the Cold War in the Western Hemisphere, and the Civil Rights Movement in the United States.

In this course, students can expect to write a number of athome essays based on a variety of primary and secondary sources. Students will also conduct a historical investigation on

a topic of their choosing. This course is designed for advanced and ambitious students who seek an authentic challenge in history.



Grade 12 • 1 Credit

This is the second year of the two-year high level (HL) IB History course. This course covers 20th century world history, where we will examine authoritarian states, causes and effects of wars and Apartheid in South Africa. In this course, students can expect to write a number of at-home and in-class essays based on a variety of primary and secondary sources. Students will also complete a historical investigation on a topic of their choosing and prepare for their exams in May. This course is designed for advanced and ambitious students who seek an authentic challenge in history.

ELECTIVE COURSES

IB PSYCHOLOGY SL (WITH LAB)

Grades 11-12 • 1 Credit

The IB Diploma Programme standard level psychology course aims to develop an awareness of how research findings can be applied to better understand human behavior and how ethical practices are upheld in psychological inquiry. Students learn to understand the biological, cognitive and sociocultural influences on human behavior and explore alternative explanations of behavior. They also understand and use diverse methods of psychological inquiry.

IB BUSINESS MANAGEMENT SL (WITH LAB)

NCAA College Credit

Grades 11-12 • 1 Credit

The IB SL Business Management class is a one-year course designed to "develop students' knowledge and understanding of business management theories, as well as their ability to apply a range of tools and techniques," according to the IB organization. The IB explains that the goals of this course are to:

- encourage a holistic view of the world of business
- empower students to think critically and strategically about individual and organizational behaviour
- promote the importance of exploring business issues from different cultural perspectives
- enable the student to appreciate the nature and significance of change in a local, regional and global context
- promote awareness of the importance of environmental, social and ethical factors in the actions of individuals and organizations develop an understanding of the importance of innovation in a business environment.

This course will meet for one period every day, with an additional lab period every other day to accommodate the 150-hour SL requirement, and it is open to juniors or seniors. It may be taken to fulfill the IB Diploma requirement for Group 3 at the SL level, or as a certificate course.



AP EUROPEAN HISTORY



Grades 11-12 • 1 Credit

Advanced Placement European History is designed for 11th and 12th grade students to further their study of intellectual, cultural, and political European history and how those ideas are reflected in trends of philosophy, popular literature, and the arts. The course will chronologically cover the major events and movements in Europe since 1450. Students will develop an understanding of the major themes of European history, the ability to analyze historical evidence and interpretation, and the ability to express one's historical opinion in writing. The course prepares students for the demands of a college education by providing experience in college level reading, writing and responsibility for learning. Both on-sight and virtual fieldtrips are used to enhance students' understanding of these concepts. Upon completion of the course students may have the opportunity to receive college placement and/or credit.

INTRODUCTION TO SOCIOLOGY



Grades 10-12 • ¹/₂ Credit

This one semester course provides a foundation for the study of sociology. Concepts such as social norms, group behaviors, urbanization, culture and ethnocentrism will be examined. Students will question how cultural beliefs, customs, mores and taboos come to influence people's lives. Problems that students will research include inequalities of gender, race, socio-economic levels, ethnicity and age in our society. They will also examine present day problems in human behavior which impact the human rights of the individual and propose solutions. By using the course's Blackboard site, multimedia, and periodicals, students will achieve a comprehensive understanding of the extent in which social customs impact a human's life. The course will be primarily seminar based. Multiple methods of assessment will be used. No prerequisites necessary.

UNTOLD HISTORY: BIPOC EXPERIENCE IN AMERICA NCAA

Grades 10-12 • ¹/₂ Credit

This is a course that celebrates the achievements and stories of perseverance of BIPOC or Black, Indigenous and People of Color. Many of the events of heroism and struggle are sometimes learned narrowly or seldomly told in the general American history curriculum standards. The course is tailor made to have student interest navigate the topics and depth of the material covered. Documentaries, independent text, short story readings, lectures and analysis of contemporary music such as folk, Motown and hip hop will be used to study more in depth the social dynamics behind these major historical events.

PSYCHOLOGY & TOPICS IN HUMAN DEVELOPMENT

NCAA

Grades 9-12 • ½ Credit

This ONE semester course provides a foundation for the study of psychology. Through the exploration of a wide variety of topics students learn the varied ways Psychology helps us to better understand ourselves, human development and the society at large. Some of the topics studied are: research methods, perception, learning, consciousness, human development, intelligence, theories of personality, abnormal Psychology. We examine the influence of culture and biology on behavior. The course focuses on Psychology as a social science, using research studies as the core of learning.

CRIMINAL LAW AND JUVENILE JUSTICE NCAA

Grades 9-12 • ¹/₂ Credit

Students in this course learn about the criminal justice process from the rules that police must follow when conducting arrests, through the proceedings that occur before trial and the constitutional protections that shape the trial itself, to issues dealing with sentencing and corrections. Students will also investigate the varied career opportunities available within the law field. Current controversies in the criminal justice system are also explored. The course is enhanced by guest speakers, films, debates, role-plays, mock trials and a possible field trip.

HUMAN RIGHTS

NCAA

Grades 10-12 • ¹/₂ Credit

This project-based course traces the idea that all humans have rights, from its theoretical roots to the present day. Students will learn about the 30 basic rights from the Universal Declaration of Human Rights, study how they are being violated around the world, and plan ways that can address and spread awareness of these rights. We will focus on controversial human rights issues from history and today including genocide, slavery, gender, and children. Debate, model UN, current events, and activism are key components of this course.





SCIENCE DEPARTMENT

Students may also engage in authentic research through our Science Research class. Courses in the Environmental Science, Contemporary Issues in Science and Principles of Engineering present the opportunity for students to apply scientific principles in real world situations. New to our Somers High School science program are the International Baccalaureate courses in Environmental Science, and Physics, and Project Lead the Way Principles of Biomedical Science and Human Body Systems.

Laboratory investigation is an integral component of instruction in our science classes. All science courses utilize a laboratory component, with Regents, AP, and IB courses requiring additional laboratory time. Student lab reports verifying fulfillment of the requirement must be in the teacher's possession in order for the student to be allowed entry to the Regents exam. Students who have not completed the lab requirement will not be eligible to take the course in summer school.



Research is another aspect of science instruction. Research activities and projects are required in some science classes. These projects make extensive use of our library and its computer research facility. Students will make use of online information resources, periodical databases as well as the vast resources of the Internet.

The science faculty is committed to integrating the use of computers and graphing calculators into the science curriculum. The computer will be used by students for data collection and analysis. Simulated labs may be used to demonstrate labs students would otherwise be unable to perform. Internet resources are being used in the classroom to enrich the curriculum and bring real-time radar and satellite images into the classroom. Teachers also make use of smartboard, video technology, and student PLD's to enhance the curriculum.

NOTE: All students must pass at least one Regents exam in science to graduate from high school, and earn a minimum of three credits in science, although four are strongly recommended. At least one course must be from the physical sciences and one course must be from the life sciences. The third required credit can be either a life or physical science.



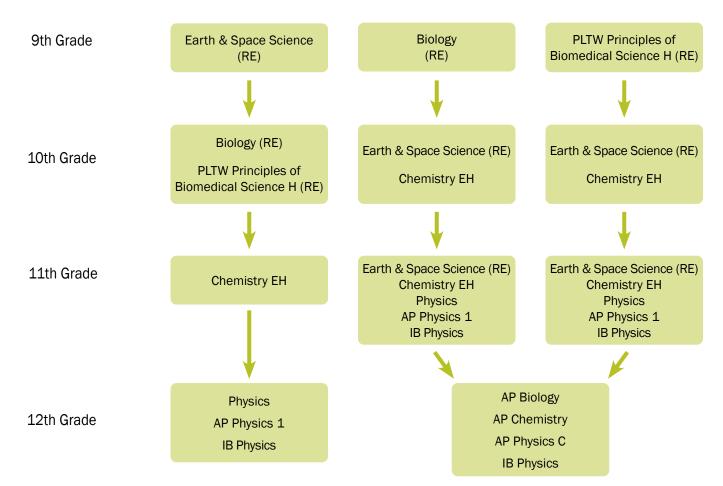
All our science courses involve scientific exploration, either in the form of laboratory investigations, research, or both. All Regents, AP, and IB courses require certain amounts of laboratory time. For Regents courses, student lab reports verifying fulfillment of the requirement must be in the teacher's possession in order for the student to be allowed entry to the Regents exam. Students who have not completed the lab requirement will not be eligible to take the course in summer school.

CORE SCIENCE PATHWAYS

The chart below represents typical pathways in core science instruction. Student learning in these content areas creates a pre-requisite foundation for future science studies. These courses also develop students' scientific reasoning skills that apply to most current and future professional environments. Courses with which Regents Exams are directly aligned are noted by "RE".

To meet NYS graduation requirements, students must:

- · earn at least three science credits (four are strongly recommended)
- earn credit in at least one physical science (E Sci, Chem, Physics) and one life science (Bio, Biomed)
- pass one Regents Exam and the corresponding course



EXTENDED AND ALTERNATIVE SCIENCE PATHWAYS

10th - 12th Grades

Science Research DEThe Science of Food (.5cr/life sci)PLTW Human Body SystemsScience in Pop Culture (.5cr/phys sci)IB Environmental Science (lab)Exploring Science in Society (.5cr/phys sci)IB Sports Exercise Health Physiology (lab)Astronomy (.5cr/phys sci)Environmental Science (.5cr/life sci)Forensic Science (.5cr/life sci)



EARTH & SPACE SCIENCE NCAA Grades 9-12

Grades 9-12 • 1 Credit

Earth Science is an investigatory approach to the study of meteorology, geology and astronomy. The course uses earth science as a means for learning how to interpret observations, reason from observation, and apply the concepts learned. Much of the class time is devoted to laboratory investigations and interpretations. The Earth Science Regents is given as the final examination. This course has scheduled lab periods.

BIOLOGY

NCAA

Grades 9-12 • 1 Credit

Biology is the study of living things from the cellular level to the biosphere. This course considers the value of biodiversity and the interrelationships of all living things. Laboratory experiences are designed to reinforce concepts as well as to practice basic scientific inquiry and the scientific method. Throughout the year, students will be expected to write clearly in the science content area. This course is designed to be an enriched science course covering the NYS living environment curriculum with additional content including: Scientific inquiry, graphing and analysis, laboratory skills and equipment, biochemistry, cells, genetics, evolution, ecology, human anatomy and physiology. The Biology Regents exam will be taken in June after students complete the required laboratory work. This course meets nine periods during a six-day cycle. After completion of this course students will have the skills and knowledge to continue onto another regents, honors or AP level science.

Recommendation: Successful completion of Regents Earth Science.

PROJECT LEAD THE WAY (PLTW) PRINCIPLES OF BIOMEDICAL SCIENCE HONORS DE



Grades 9-12 • 1 Credit

This is an excellent course for students with a passion for biological science and is ideal for students interested in the medical field. This course is a hands-on, work intensive class where students are given the opportunity to master background knowledge and then apply it in innovative ways to solve case-based problems. It is a challenging course and will require homework and study hours outside of the classroom. Students seeking careers in the medical field find the rigor and knowledge gained to be very rewarding. Students with a wide range of abilities who are self motivated and demonstrate effective academic habits can find success in this course.

PLTW: Principals of Biomedical Science (PBS) follows a national curriculum. In PBS, students explore concepts of biology and medicine by conducting medical investigations, practicing key clinical skills, investigating outbreaks and emergencies, and exploring innovative advancements in the health care field. The activities and projects allow students to master basic biology, as well as provide a strong foundation in human physiology, medicine and research processes. Additionally, students problem solve by designing models and experiments individually and in small groups. The course concludes with a standardized PLTW End of Year Assessment (EOC), and the Biology Regents Exam. College credit can be earned with a course average of 85% or better, and a requisite EoC score. This course has scheduled lab periods.

CHEMISTRY (with embedded honors)

NCAA

Grades 10-12 • 1 Credit

This course follows the Embedded Honors model, allowing students to pursue chemistry at the Regents or Honors level within the same course. In order to earn Honors designation students must complete at least 75% of the units at the honors level, including the honors level final exam. Students must complete at least three units at the honors level during the first two quarters. For all students, the course approaches the study of chemistry from a mathematical and theoretical framework. Topics covered are matter and energy, atomic structure, bonding, periodic trends, equilibrium, acid-base

theories, redox, electrochemistry, nuclear chemistry, and organic chemistry. Every student is expected to become proficient in the safe use of lab equipment. This course will develop students' scientific reasoning and independent problem-solving skills. Honors level material explores content in greater depth and has a heavier reliance on the application of mathematics within the course material. This Chemistry Regents Exam is not course requirement, but students may elect to sit for the exam. For any students who choose to sit for the exam, the result will be posted to the transcript, but not factored into the course average. A local final exam will be administered to all students. **Students should note that Chemistry is a required course for all future studies in science-based fields and is typically a requirement for admission to related programs at the college level.**

Recommendation: Students should have taken and passed either the Earth Science and/or Biology RE, and be concurrently enrolled in Geometry or higher.

PHYSICS NCAA

Grades 11-12 • 1 Credit

This course explores the concepts of the physical world while limiting the mathematical basis of physics instructions. Though math is still used regularly, the course is designed to focus on developing student understanding of concepts. Topics include motion, forces, circular motion, gravitation, energy, momentum, electrical circuits, and waves. Instruction includes laboratory investigations.

Recommendation: Successful completion of Chemistry, Concurrent enrollment in Algebra 2/Trig or higher.



AP PHYSICS 1

Grades 11-12 • 1 Credit

This college level course is for highly motivated students who have not taken a physics course before, and for those who took Physics and want to study the subject at a higher, more math-intensive level. This math intensive course is fast-paced and requires dedicated effort both within and outside of the classroom. This course requires a foundation in both algebra 2 and trigonometry (no calculus). and students will likely find that their level of success in this course correlates more closely with their level of success in previous math classes than previous science classes. All students will sit for the AP Exam in May. AP Physics 1 has a similar level of rigor as IB Physics SL, but the topics of study are significantly different. In AP Physics 1, topics of study include linear motion, forces, circular motion, gravitation, energy, momentum, rotational motion, simple harmonic motion, and the behaviors of fluids. Students who complete AP Physics 1 and want to study physics at an even higher, calculus-based level may choose to take AP Physics C the following year.

Recommendation: Strong achievement in previous math and science classes. Must have already completed Algebra 2/Trig H with a course average of at least an 85 or Algebra 2/Trig R with a course average of at least a 90.



Grades 9-12 • 1 Credit

Advanced Placement Biology is the equivalent of an introductory college biology course. The curriculum emcompasses 4 "Big Ideas": Evolution, Cellular Processes, Genetic and Information Transfer and Interactions. Content will be covered in more depth and greater expectations will be placed on interpretation and analysis of information, as well as scientific and analytical thinking. In addition, statistical analysis of data and modeling of concepts will be expected. Descriptive and experimental laboratory exercises will be assigned which provide opportunities for the students to learn a variety of skills and reinforce those facts, principles, and concepts covered in lecture, reading, and discussion. Students must take the College Board Advanced Placement national exam in May, and, depending on their score, may receive college credit.

Recommendation: A science average of 90 or higher is strongly recommended. A summer assignment is required.

AP CHEMISTRY



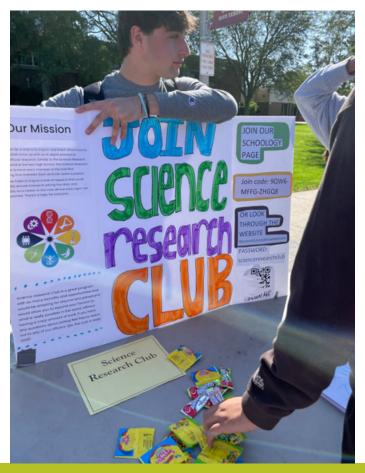
Grades 11-12 • 1 Credit

This course is equivalent to a first year college chemistry course with a strong laboratory component. The following topics will be stressed: the nature of matter and measurements, atomic structure and theory, behavior of gases, periodic table, bonding, molecular structure, thermodynamics, equilibria, reaction rates, redox reactions, and acid and bases. Laboratory experiences will use both quantitative and qualitative analysis, spectroscopy, potentiometry, and chromatography. Students will attain the ability to deal with chemical problems, think in a clear logical manner and express their ideas orally and in writing.

Students must take the College Board Advanced Placement national exam in May, and, depending on their score, may receive college credit.

Prerequisite: Successful completion of courses in Biology and Chemistry.

Recommended: Achievement in Biology and Chemistry at mastery level(85% or higher) and strong analytical skills as evidenced by concurrent enrollment in Pre-Calculus H or higher.



AP PHYSICS C

Grade 12 • 1 Credit

This fast-paced, calculus-based course represents the most challenging Physics course available to students at Somers. The topics covered in AP Physics C are: Kinematics, Forces, Energy, Momentum, Center of Mass, Rotational Motion, Oscillations, Gravitation, Electrostatics, Circuits, and Electromagnetic Induction. This course culminates in two AP exams in May, the Advanced Placement Physics C: Mechanics and Advanced Placement Physics C: Electricity and Magnetism exams, and students must take both exams.

Prerequisite: Successful completion of Honors Physics or AP Physics 1 and concurrent enrollment in Calculus, AP Calculus AB or AP Calculus BC.

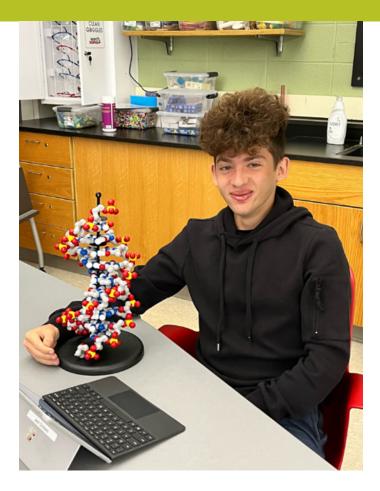
SCIENCE RESEARCH 10/DE

NCAA

Grades 10-12 • 1 Credit

This course begins a three-year sequence of study, which will focus on an understanding of research methodology in the natural, physical and social sciences. The course is directed to those students who wish to pursue independent and original research. Students will be instructed in the process of online data research and have access to scientific databases. It is divided into two distinct courses, Science Research 10, and Science Research DE. Those students who complete the three-year sequence will present their research at scientific conferences and will apply to the Regeneron Science Talent Search and participate in the Westchester Science and Engineering Fair and the Westchester/Rockland Junior Science and Humanities Symposia. Students must commit themselves to a long-term research project with a mentor from a university or independent research facility thus demonstrating initiative, perseverance and creativity. Students who do not identify a mentor by the end of the first quarter of junior year will be required to drop out of the program. Students who have not identified a mentor and wish to replace this course must make a change prior to the course add deadline in September.

This course will not satisfy the three science credits required for graduation. College credit may be obtained through the State University at Albany. Independent summer work will be required.



PROJECT LEAD THE WAY (PLTW) HUMAN BODY SYSTEMS DE

NCAA

Grades 10-12 • 1 Credit

Human Body Systems (HBS) is the second course offered in the PLTW: Biomedical Science Program. In HBS students build a strong foundation in human anatomy and physiology. The main project in HBS is to build a Maniken, one body system at a time as we learn about them throughout the year; the Maniken is a yearlong project. Additionally, there will be many hands-on activities and projects to explore both healthy and failing human body systems and the physiology behind each. The activities and projects allow students to master basic biology, as well as provide a strong foundation in human anatomy & physiology, medicine and research processes. Students will problem solve by designing models and experiments individually and in small groups.

Similar to PLTW PBS, HBS follows a national curriculum. This is an excellent course for students with a passion for biological science and is ideal for students interested in the medical field. This course is a hands-on, work intensive class where students are given the opportunity to master background knowledge and then apply it in innovative ways to solve case-based problems. It is a challenging course and will require homework and study hours outside of the classroom. Students must be highly motivated,

taking responsibility and ownership over their own learning to get the most out of this class. The course concludes with a standardized PLTW end of the year assessment (EOC). College credit can be earned with a course average of 85% or better, and a requisite EoC score.

Prerequisite: Successful completion of Biology and/or PLTW PBS

Recommendation: Mastery achievement (85% or higher) in previous science classes. Students with a wide range of abilities who are self motivated and demonstrate effective academic habits can find success in this course.

IB ENVIRONMENTAL SYSTEMS & SOCIETIES SL



Grades 11-12 • 1 Credit

Environmental systems and societies (ESS) is an interdisciplinary course offered only at standard level (SL). This course can fulfill either the individuals and societies or the sciences requirement. Alternatively, this course enables students to satisfy requirements of both subjects groups simultaneously while studying one course. During the year, each student will participate in an internal assessment in which he/she will design and conduct an individual science research project. Students will also sit for two papers during exams in May.

IB PHYSICS SL



Grades 11-12 • 1 Credit

27

This course is for highly motivated students who have not taken a physics course before, and for those who took Physics and want to study the subject at a higher, more math-intensive level. This course is fast-paced, requires strong effort, involves significant homework, and is academically challenging. This course has a similar level of difficulty as AP Physics 1, but the topics of study are significantly different. In IB Physics SL, topics include measurement, motion, forces, circular motion, gravitation, energy, momentum, thermal physics, waves, electricity, magnetism, radioactivity, nuclear reactions, the structure of matter, sources of energy generation, and astrophysics. Mathematics is extensively used for modeling and predicting physical relationships. This is a freshman collegelevel algebra and trigonometry-based physics course and as such requires college-level laboratory reports. A unique student designed ten-hour internal assessment is completed at end of the course. This course will be offered every other year; as such, it WILL be offered in the upcoming '24 - '25 school year, and it will NOT be offered in the following year.

IB SPORTS, EXERCISE, AND HEALTH SCIENCE SL



1 Credit and PE ½ Credit

The IB SEHS class is a one-year course that will meet every day with an additional period as a lab that meets every other day. All students enrolled in SEHS will be scheduled for their PE class in the period opposite the lab, during which time they will participate in their regular PE activities. The PE class will, at times, be the platform for students to collect data about their own physical activity, which will then be analyzed in the SEHS class. The goal of this schedule is to combine a science and a physical education experience so that students can study the science of their own activity. According to IB, the SEHS course "incorporates the traditional disciplines of anatomy and physiology, bio-mechanics, psychology and nutrition. Students cover a range of topics and carry out practical (experimental) investigations in both laboratory and field settings." Topics of study include anatomy, exercise physiology, energy systems, movement analysis, skill in sport, and measurement and evaluation of human performance. It will be coplanned by a member of the science department and a member of the physical education department. This course satisfies the IB Group 4 requirement for Diploma Candidates, or it may be taken as a certificate course.

EXPLORING SCIENCE IN SOCIETY

NCAA

Grades 10-12 • ½ Credit

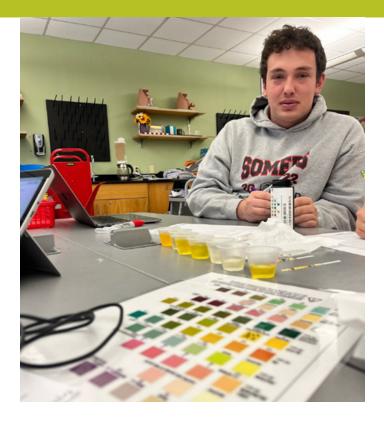
This course is intended as an exploration of various topics from all areas of science. The focus will be on topics related to current events and that have associated effects with medical, legal, financial and ethical issues. Each topic will culminate in a presentation or project. Possible topics include biotechnology, forensics, alternative energy, and bioethics. This course addresses NYS Learning Standards in the Physical Sciences.

ENVIRONMENTAL SCIENCE

NCAA

Grades 10-12 • ½ Credit

In this course, students will discover some of the ways in which humans have altered natural systems through habitat destruction and pollution. Topics of study include biodiversity, global warming, solid waste, air pollution and water pollution. This course is designed for students who enjoy science and have a general interest in the world around them. It will engage students in research and case studies of past and current environmental problems. This course addresses NYS Learning Standards in the Life Sciences.



THE SCIENCE OF FOOD Grades 1

Grades 10-12 • ½ Credit

Have you ever wondered about the food you eat? This course is an examination of food, from a science perspective. Students will conduct cooking experiments that explore food chemistry, and explore the connections between food, nutrition, and health. Students will also examine food in society, including farms and food production systems. Coursework will focus on skills related to research and discussion. Students will formulate individual research questions grounded in areas of personal interest for project-based exploration. This course utilizes Evidence Based Grading and addresses NYS Learning Standards in Life Sciences.

SCIENCE IN POP CULTURE

Grades 10-12 • ¹/₂ Credit

Science in Pop Culture is a skill-based science elective that focuses on STEAM strategies (art students can use their creativity in a scientific context). The class focuses on current events in pop culture (private space companies, wildfires in the west, climate change related news, the World Cup and the Olympics, as well as social media trends, movies, and TV shows). Assignments include experiments, essays, demos, and responses, as well as larger group projects that are rolled out over a number of days and commence in a PowerPoint, lab report, etc. Much of the learning is hands on and research based. This course addresses the NYS Learning Standards in the Physical Sciences.

FORENSIC SCIENCE

Grades 10-12 • ½ Credit

Forensic Science offers an opportunity to explore the basics of how and why forensic science is used around the world. Students will learn to observe, collect, analyze, interpret, and evaluate evidence associated with criminal cases while understanding the limitations of the laboratory and the significance of various types of evidence. Through case studies and simulated scenarios, students will investigate evidence collection, fingerprinting, blood spatter, forensic anthropology, entomology, trace evidence, ballistics, and arson. Through partnerships with local law enforcement, students will engage with guest speakers and demonstrations to see the real-world application of forensic science. This course addresses NYS Learning Standards in the Life Sciences.

ASTRONOMY NCAA

Grades 10-12 • ½ Credit

Can you escape a black hole? Is there life beyond planet Earth? What will happen when Andromeda and the Milky Way collide? In this course we will focus on the student's natural curiosity of the stars, planets, and vast universe that surrounds us. Students will investigate their unique questions regarding topics such as the history of astronomy, the solar system, the universe, deep space, stellar evolution, nebulae, and galaxies. This course includes current topics in this quickly changing field such as space exploration, the future of space travel, Space X, the Hubble Telescope and more! This course addresses NYS Learning Standards in the Physical Sciences.

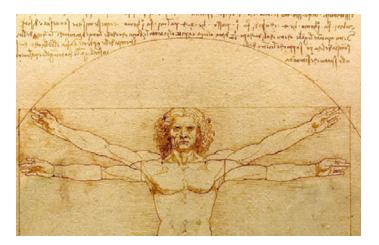




MATHEMATICS DEPARTMENT

The Somers High School Mathematics Department believes in addressing the needs of our students using the Whole Child approach. To that end, our goal is to foster engaged learning environments where all of our students develop a growth mindset and the critical and creative thinking skills required to be successful in the world of today and the future of tomorrow.

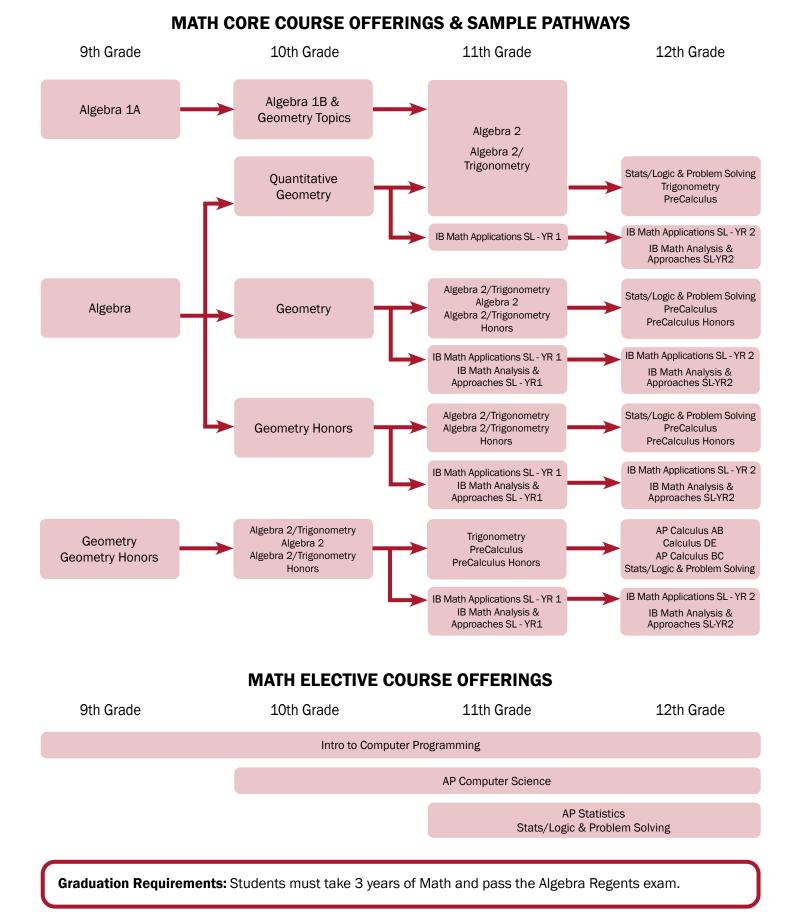
To ensure our students' success, the Somers High School Mathematics Department offers students the opportunity to build a substantial foundation in mathematics. All courses expand upon the skills that students previously developed in their study of mathematics in middle school. Students are required to



earn three math credits by passing three math courses as well as pass the Algebra Regents Exam in order to graduate.

In order to be college and career ready, all students are encouraged to complete four years of mathematics instruction. The Somers High School Math Department will continue to offer many advanced courses for students who complete their requirements in their sophomore or junior years. Included among these course offerings are Precalculus, Prealculus Honors, Calculus, Advanced Placement Calculus, Advanced Placement Statistics, Introduction to Computer Programming, AP Computer Science Principles, as well as IB Math offerings.

"Mathematics is a more powerful instrument of knowledge than any other that has been bequeathed to us by human agency." —Renee Descartes



31

ALGEBRA 1A NCAA

1 Credit

This course is part of a two course sequence designed to ensure a strong foundation in mathematical skills essential to all future studies of mathematics. This course follows the NYS Education Department curriculum. This course employs an integrated approach to the study of algebraic relationships and culminates in a local final examination. Topics covered include properties of numbers, algebra operations, linear equations in one variable, quadratics, and inequalities, with an emphasis on problem solving strategies. A graphing calculator is required.

ALGEBRA

NCAA

1 Credit

This course follows the NYS Education Department curriculum. This course employs an integrated approach to the study of algebraic relationships. This course provides an in-depth study of introductory algebra with a major emphasis placed on the fundamental laws of algebra; algebraic operations; linear, quadratic, and exponential functions, and their algebra; systems of equations, probability and statistics. Work includes analytical problem solving, involving calculations of both practical and analytical applications. A graphing calculator is required. Students will take the NYS Algebra Regents exam in June.

ALGEBRA 1B & GEOMETRY TOPICS

1 Credit

This course is a continuation of Algebra 1A, following the NYS Education Department curriculum. Topics covered in the first semester include systems of equations, exponential functions, quadratics, and statistics. Students will take the NYS Algebra Regents exam in January. During the second semester, students will be introduced to topics in Geometry, including but not limited to lines, angles, triangles, circles, and 3D geometry. These topics align with topics on national standardized tests (SAT/ACT). A graphing calculator is required.

GEOMETRY NCAA

1 Credit

This course is designed to provide extended study of geometric topics allowing for the reinforcement of algebraic techniques. This course employs an integrated approach to the study of geometric relationships. Through a consideration of Euclidean, transformational and coordinate approaches, students will investigate situations in order to justify geometric relationships and properties of geometric figures. Major emphasis will be placed on: Quadratics, Coordinate Geometry, Polygons, Transformations, Right Triangles, Trigonometry, and Proofs. Problem solving techniques and precise written and oral work are also stressed. Work includes analytical problems involving work with linear and quadratic equations. A graphing calculator is required. This course will prepare students for a cumulative final exam in June.

Recommendation: Successful completion of Algebra, and a passing grade on the NYS Regents Algebra exam.

QUANTITATIVE GEOMETRY

1 Credit

This course focuses on the core aspects of geometry to create a more accessible approach to the curriculum. Through a consideration of Euclidean, transformational, and coordinate approaches, students will investigate situations in order to justify geometric relationships and properties of geometric figures. Major emphasis will be placed on: Congruence, Similarity, Trigonometry, and Proofs. Each of these topics will include computational work as well as geometric reasoning. A graphing calculator is required.

Recommendation: A minimum course grade of 65% in Algebra, and a passing grade on the NYS Regents Algebra exam.

GEOMETRY HONORS

1 Credit

This is a challenging course designed for students with a strong interest and persistence in mathematics. We will be covering Euclidean proofs, advanced algebraic skills such as manipulating radical and rational expressions, solving rational, radical and quadratic equations, congruence, constructions, similarity, trigonometry, and three-dimensional geometry. This course stresses the ability to reason logically and to think critically, using spatial sense. Students will engage in activities that allow them to create geometric understanding. This course will formalize and extend students' geometric experiences from the middle grades. Students will explore more

complex geometric situations and deepen their explanations of geometric relationships moving toward formal mathematical arguments. The course guides students to experience mathematics as a coherent, useful, and logical subject that makes use of their ability to exercise problem-solving skills in authentic situations.

The course culminates with a local final exam in June.

Recommendation: Students should have mastered factoring and earned a minimum course grade of 90% in Algebra.

ALGEBRA 2/TRIGONOMETRY

1 Credit

This is a rigorous full year course which provides an in-depth study in advanced algebra and trigonometry. There is an extensive number of topics included in the curriculum of this course resulting in the course being very fast paced. Major emphasis will be placed on: numeracy, the real number system, factoring, rational expressions/equations, simplification/ operations of radicals and radical equations, solving quadratic equations/inequalities, relations and functions, solving systems of equations, exponential and logarithmic properties/equations and introductory trigonometry, trigonometric equations and identities.

Recommendation: Successful completion of Geometry Regents with a minimum course grade of 80% or successful completion of Geometry Honors with a minimum course grade of 75%.

ALGEBRA 2 & TRIGONOMETRY HONORS

1 Credit

This is an intensive honors course which follows the Geometry Honors course. This course follows the same curriculum as Algebra 2/Trigonometry, but at a more in depth, greater level of difficulty, and includes additional topics of study in preparation for Precalculus Honors. These topics include, but are not limited to, advanced literal equations, fractional and polynomial inequalities, absolute value equations and inequalities, functions, domain and range, theory of equations, systems of equations with three variables, and rational functions and inequalities.

Calculators, both scientific and graphing are required, and will be used throughout the year. Students will take a cumulative final exam. **Recommendation:** A minimum course grade of 95% in Geometry or 85% in Geometry Honors. Students should have mastered factoring, graphing quadratics, and all basic algebraic manipulation skills.

ALGEBRA 2

1 Credit

This course offers an intensive one-year college preparatory study of algebraic skills which extend beyond the Algebra course curriculum. Course topics focus on algebraic skills at an intermediate level. Major emphasis will be placed upon the following topics: rational functions, complex numbers, higher order polynomials, radical functions and operations, functions: domain, composition, and inverses. A graphing calculator is required. Students will take a cumulative final.

Recommendation: A minimum course grade of 75% in Algebra and Quantitative Geometry, as well as a passing grade on the NYS Regents Algebra exam.

TRIGONOMETRY

1 Credit

This course offers an intensive one-year college preparatory study of trigonometry. Major emphasis will be placed upon the following topics: right-triangle trigonometry, unit circle trigonometry, solving trigonometric equations, proving trigonometric identities, trigonometric applications as they extend to real-world situations. The students will also extend their work with exponential functions to include solving exponential equations with logarithms, as well as a deeper exploration into statistics and probability. A graphing calculator is required. Students will take a local final.

Recommendation: A minimum course grade of 75% in Algebra 2, as well as a passing grade on the NYS Regents Algebra exam.

"Believe me, if I were again beginning my studies, I should follow the advice of Plato and start with mathematics."

-Galileo Galilei

STATISTICS NCAA

1/2 Credit

This elective course is for students who are looking to pursue an introduction to statistical reasoning. Emphasis will be placed on concepts and applications rather than an in-depth coverage of traditional methods. Topics include sampling and experimentation, descriptive statistics, probability, binomial and normal distributions, estimation. Students will gain additional expertise in the use of the TI-83/84+ graphing calculator which is a requirement for this course. Students planning on majoring in business, psychology, sociology, and/or any other health related sciences will find this a good basis of statistical analysis. Preference is given to seniors, although students in other grades may take this course as well. Students often pair the Logic and Problem Solving elective with this course to produce a full year math credit.

Recommendation: Successful completion of Algebra and Geometry, or Geometry and Algebra 2, or Algebra 2/ Trigonometry.

LOGIC & PROBLEM SOLVING

1/2 Credit

This elective course teaches problem solving techniques using puzzles and real world applications. It is an introduction to mathematical logic and reasoning for those students not planning on pursuing Calculus in college. Students will work individually and in groups to learn material through discovery learning, solving problems and producing results for themselves for further study and analysis, as well as focus on the study and application of logic proofs. Preference is given to seniors, although student in other grades may take this course as well. Students often pair the Statistics elective with this course to produce a full year math credit. Students concurrently enrolled in another math course which is full year may be accepted only if there is space available, and with a teacher recommendation.

Recommendation: Successful completion of Algebra and Quantitative Geometry or Geometry, and Algebra 2 or Algebra 2/ Trigonometry.

90% of all professionals

use some form of math in their work

Source: Trade-Schools.net, 2020



Research.com

MATHEMATICS DEPARTMENT

PRECALCULUS NCAA

1 Credit

This is a rigorous full year college-preparatory course in precalculus, designed to provide students with the required skills needed be successful in a college-level Calculus course. This course takes a graphical approach to the study of continuous and discontinuous functions and their graphs, circular and transcendent functions, trigonometry, and limits. Additional topics may include probability, statistics, and regression. Both a graphing calculator as well as a scientific calculator are required, and are used to reinforce, explore and investigate applications throughout the year.

Recommendation: Successful completion of Algebra, Geometry, and Algebra 2/Trigonometry, as well as a minimum grade of 80% on the NYS Algebra Regents exam and passing grades on the SHS Geometry final exam and Algebra 2/ Trigonometry final.

PRECALCULUS HONORS

1 Credit

This is an intensive, honors level course. It is full year college preparatory course in precalculus, designed to provide students with an in-depth study in advanced skills required to be successful in the three calculus courses that are taught at the school: Calculus DE, AP AB Calculus and AP Calculus BC. Major emphasis is placed on the study of: continuous and discontinuous functions and their graphs, polar coordinates and their graphs, parametric equations, and limits and derivatives. Additional honors topics may include, but are not limited to, matrices and sequences and series. Both a graphing calculator and scientific calculator are required, and are used to solve problems graphically as well as reinforce, explore, and investigate applications throughout the year. Students will take a cumulative final.

Recommendation: Successful completion of Algebra, Geometry Honors, and Algebra 2 & Trigonometry Honors. In addition, a minimum course grade of 85% in Algebra 2 & Trigonometry Honors, a minimum grade of 90% on the NYS Algebra Regents Exam, and passing grades on the Geometry Honors and Algebra 2 & Trigonometry Honors finals are also recommended.

CALCULUS DE

NCAA College Credit

1 Credit

This college level course introduces students to elementary calculus topics. The course covers the major concepts of limits, derivatives and integrals throughout the year with an exploration of applications for each. The use of a graphing calculator is included for further connections to each topic. Optional college credit is available with registration through Westchester Community College (WCC) and awarded after successful completion of the requirements for the course. Students will take a local final which may include questions designed by WCC.

Prerequisites for DE credit eligibility: Overall Average of 80+ in Algebra, Geometry and Algebra 2, and a minimum mid-year average of 80 in PreCalculus.

AP STATISTICS

1 Credit

This is a non-calculus based college level survey course in Statistics. Students are introduced to the major concepts and tools for collecting, analyzing, and drawing conclusions form data. Students are exposed to four broad conceptual themes: exploring data, planning a study, anticipating patterns and statistical inference. Students must take the Advanced Placement Statistics examination in May (students are responsible for the cost of the exam), and may earn college credit by earning a passing score on the examination. After the Advanced Placement Statistics examination in May students will continue their study in statistics by working on a project that employs the concepts that were studied throughout the year. A TI-84+ graphing calculator is required. This course may be taken as a fourth math course during junior or senior year either as an elective while enrolled in another math course or on its own. Students who completed Geometry in grade 8, are advised to take this course in their senior year to avoid exhausting math options prior to senior year.

Recommendation: Successful completion of Algebra and Geometry.

MATHEMATICS DEPARTMENT

AP CALCULUS AB

NCAA

1 Credit

This is is an introductory college calculus course that includes the study of differential and integral calculus as well as applications in these areas of study. The graphing calculator will be used for reinforcement, exploration, and the investigation of applications. Students must take the Advanced Placement Calculus AB exam in May (students are responsible for the cost of the exam), and may be eligible for college credit if they earn a passing score on the exam. After the Advanced Placement examination in May students will continue their study in calculus by working on a project that employs the concepts that were studied throughout the year.

Recommendation: Successful completion of PreCalculus Honors and a course average of 85% or higher, as well as a teacher recommendation. Completion of Summer assignment required.

AP CALCULUS BC



1 Credit

This is a thorough examination of college calculus course through the study of advanced topics in differentiation and integration. Included as well, is an in-depth treatment of series and sequences, vectors, and slope fields. Students must take the Advanced Placement Calculus BC exam in May (students are responsible for the cost of the exam), and may be eligible for college credit if they earn a passing score on the exam. After the Advanced Placement examination in May students will continue their study in calculus by working on a project that employs the concepts that were studied throughout the year.

Recommendation: Successful completion of PreCalculus Honors with a minimum course average of 95% or higher or successful cmpletion of AP Calculus AB with a minimum course average of 85% or better.

IB MATHEMATICS: APPLICATIONS AND INTERPRETATION (SL)



Grades 11-12 • YR 1 • 1 Credit YR 2 • 1 Credit

This is a 2 year course and is designed for students who enjoy describing the real world and solving practical problems using mathematics, those who are interested in harnessing the power of technology alongside exploring mathematical models and enjoy the more practical side of mathematics. This course is perfect for those students who want to explore the Social Sciences, Liberal Arts or Steam fields by applying the Math they learn to practical, real-life scenarios. As with other IB courses there is an Internal Assessment (IA) which counts as 20% of the student's overall course score. The IA have a major writing component to it. The IA may be worked on in both year 1 and 2, timing to be determined by the teacher. In addition, there is a two-day IB final exam given at he end of year 2.

Recommendation: Students MUST be at least a Junior to take this or any other IB course. Successful completion of Geometry H, Algebra 2 or either level of Algebra 2/Trig.

IB MATHEMATICS: ANALYSIS AND APPROACHES (SL)

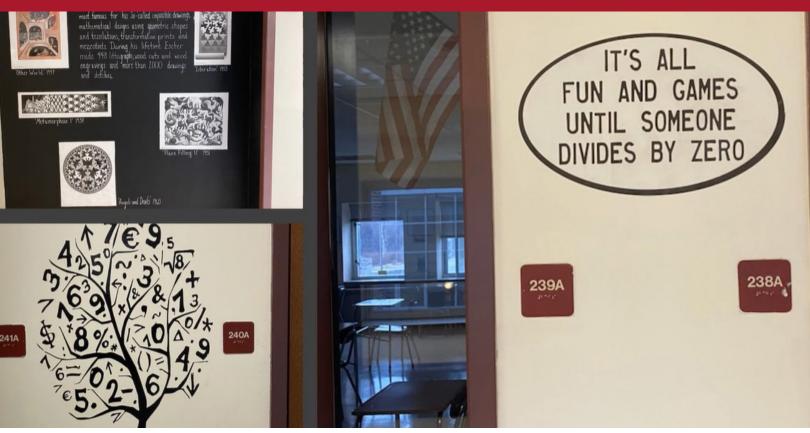


Grades 11-12 • YR 1 • 1 Credit YR 2 • 1 Credit

This is a 2-year traditional mathematics course, whereby students develop a deep understanding of mathematical concepts and solve both real and theoretical problems, with and without technology. It includes rigorous concepts combining both pure and applied mathematics, although with more emphasis on pure mathematics than the Applications and Interpretation course. The Analysis and Approaches SL course requires strong conceptual understanding, algebraic manipulation, and confidence with analytical approaches to problem solving. It is an excellent foundation for students looking to pursue further study of mathematics or science and keeps many options open for a variety of university courses. As with other IB courses there is an Internal Assessment (IA) which counts as 20% of the student's overall course score. The IA has a major writing component to it. The IA may be worked on in both year 1 and 2, timing to be determined by the teacher. In addition, there is a two-day IB final exam given at the end of year 2.

Recommendation: Students MUST be at least a Junior to take this or any other IB course. Successful completion of Geometry H or either level of Algebra 2/Trig.

MATHEMATICS DEPARTMENT



INTRODUCTION TO COMPUTER PROGRAMMING NCAA

1/2 Credit

This is a half-year elective course available for 9-12 graders. The course provides an introduction to computer programming for students with little or no prior programming experience. The goal of this course is to give students hands-on exposure to fundamental computer programming principles. The workshop approach of the course will give the students experience developing projects and applications. The course assumes the ability to use a computer keyboard and mouse, and a familiarity with using a Microsoft Windows operating system. Course Guidelines: Competency in Algebra is strongly recommended.

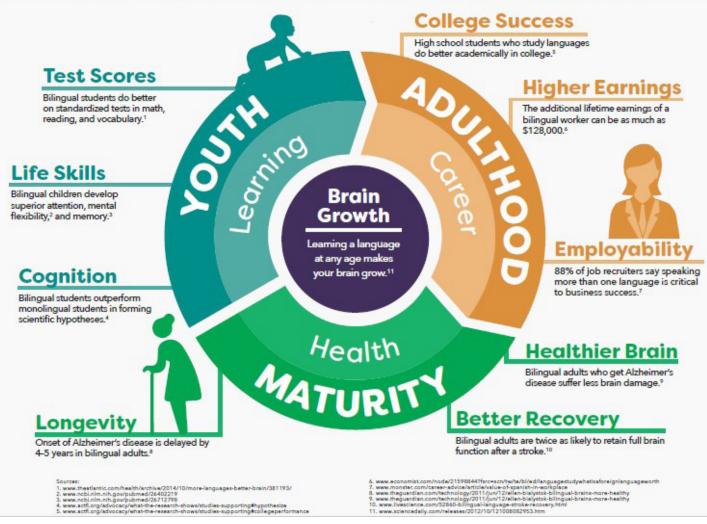
AP COMPUTER SCIENCE PRINCIPLES

1 Credit

This is a beginner friendly introductory AP course that assumes no prior programming experience. Its goal is to encourage broader participation in computer science, not just students considering careers in computer science or other STEM fields. Students will gain exposure to a variety of CS concepts: hardware, digital electronics, programming in various languages, web development, algorithms, databases, computer networks, architecture of the internet, impacts of computing innovations, and ethical computing. Students will create a personal project for the AP performance task assessment which will weigh as 30% of their AP score and take an AP exam which will weigh as the remaining 70% of their AP score.

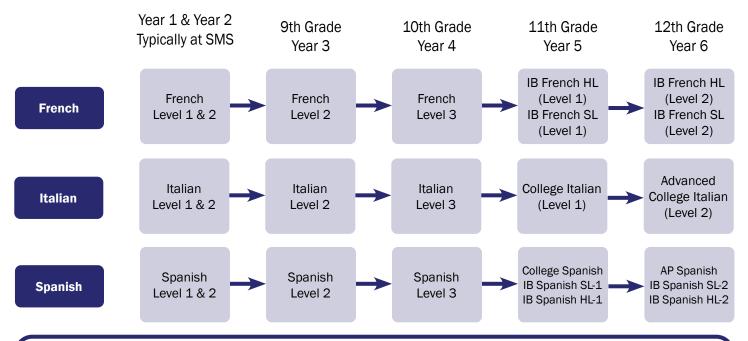
Recommendation: Competency in Algebra is strongly recommended.

BENEFITS OF LANGUAGE LEARNING



WORLD LANGUAGE DEPARTMENT: WORLD LANGUAGES AND LITERATURES

The study of World Languages provides students with skills and opportunities to become productive 21st century citizens. Students develop linguistic and cultural literacy, college and career readiness and an understanding of the culture and perspectives of a global society. Many students will complete their first year of World Language studies through the 7th and 8th grade curriculum, along with passing the Checkpoint A (FLACS Exam.)



WORLD LANGUAGES COURSE OFFERINGS

Graduation Requirement:

Students must earn at least one high school credit in World Languages in order to graduate; however, most colleges require a minimum of two years of study in the same World Language. More selective colleges as well as the NCAA will seek applicants with four years of second language study.



LEVEL 1 ITALIAN & SPANISH NCAA

Grades 9-12 • 1 Credit

The beginning course introduces students to basic pronunciation, words, and expressions via listening, speaking, reading, and writing within context. Vocabulary and grammar coverage are structured simply and clearly to offer a comfortable progression for students. New York State Standards provide Performance Indicators that measure the students' level of mastery in listening, speaking, reading and writing at Checkpoint A.

LEVEL 1 & 2 H - FRENCH NCAA

Grades 9-12 • 1 Credit

This course is designed for students desiring to begin the study of French as a second world language. Since the majority of students will already have studied another world language, the pace of the course is accelerated. It is designed to cover material from Level 1 and Level 2 French in one year. Students who successfully complete the course will be eligible to take French level 3 the following year.

Prerequisite: Completion of a Level 1 course in another World Language.

LEVEL 2 FRENCH, ITALIAN & SPANISH NCAA

Grades 9-12 • 1 Credit

The focus in Level 2 is on communication with accuracy in an authentic cultural context. Grammar is viewed as a support for active communication. Frequent opportunities are provided for self-expression, developing longer conversational exchanges, reading for pleasure, critical thinking, and the development of global awareness. New York State Standards provide performance indicators that measure students' level of mastery in listening, speaking, reading and writing toward Checkpoint B.

Prerequisite: Completion of the Level 1 course and a grade of 65% or better on the department exam.

LEVEL 3 FRENCH, ITALIAN & SPANISH NCAA

Grades 9-12 • 1 Credit

In Level 3, students will enter the final phase of preparation for a consortium examination. More extensive use of the target language is encouraged through more complex communicative activities. Speaking and writing activities bring students from simple language to more complex and creative language. Student performance is evaluated against New York State

standards. New York State Standards provide performance indicators that measure students' level of mastery in listening. speaking, reading, and writing in this third year of study. Students take a consortium examination in June.

Prerequisite: Successful completion of the Level 2 course.

COLLEGE LEVEL SPANISH

NCAA

Grades 11-12 • 1 Credit 4 College Credits (optional)

The College Level course will provide students with the academic challenges of college-level curriculum. Students enrolled in College Level Spanish have a unique opportunity to earn four college credits through the State University of New York at Albany. These credits may form the basis of a permanent post-secondary academic record that can be transferred to many colleges and universities throughout the country and applied to the credit requirements of an undergraduate degree. Students are not required to apply for credit, and must earn a minimum final average of 74 to earn credit.

Recommendation: Mastery in Level 3 (85% or better), a grade of 85% or better on the FLACS Exam. A summer assignment is required.

COLLEGE LEVEL ITALIAN



Grades 11-12 • 1 Credit Intermediate Level 1 • 3 College Credits (optional)

College Level Italian will provide students with the academic challenges of college-level curriculum of the Italian language and culture. Proficiency in the four language skills (speaking, writing, reading and comprehension) is developed through extensive grammar review, literary readings, and cultural exposure. Students enrolled in College Level Italian have a unique opportunity to earn three college credits through SUNY Westchester Community College. These credits may form the basis of a permanent postsecondary academic record that can be transferred to many colleges and universities throughout the country and applied to the credit requirement of an undergraduate degree. Students are not required to apply for credit, and must earn a minimum final average of 74 to earn credit.

Recommendation: Mastery in Level 3 (85% or better), a grade of 85% or better on the FLACS Exam. A summer assignment is required.

ADVANCED COLLEGE LEVEL ITALIAN



NCAA

Grades 11-12 • 1 Credit Intermediate Level 2 • 3 College Credits (optional)

Advanced Italian is the equivalent of a college course in advanced Italian composition and conversation. The course objectives are to help students comprehend formal and informal language subtleties at an advanced level and to provide emphasis on oral presentation and written composition. Students enrolled in Advanced College Italian have a unique opportunity to earn three additional college credits through SUNY Westchester Community College that can be transferred to many colleges and universities throughout the country and applied to the credit requirements of an undergraduate degree.

Recommendation: Mastery (85% or better) in College Level Italian. A summer assignment is required.

YEAR ONE: IB FRENCH SL, HL; SPANISH SL, HL

(Language B) • 1 Credit

IB French and Spanish are offered at both the HL and SL Levels. All IB Language courses are designed to provide students with an opportunity to develop their skills in one of these three languages, as well as to promote an understanding of other cultures through the study of language. Language B courses are designed for students who already have experience in the target language. According to the IB organization, all Language B courses will:

- develop students' intercultural understanding
- enable students to understand and use the language they have studied in a range of contexts and for a variety of purposes
- encourage, though the study of texts and through social interaction, an awareness and appreciation of the different perspectives of people from other cultures
- develop students' awareness of the role of language in relation to other areas of knowledge (within the IB)
- develop students' awareness of the relationship between the languages and cultures with which they are familiar
- provide students with a basis for further study, work, and leisure through the use of an additional language
- provide the opportunity of enjoyment, creativity, and intellectual stimulation through knowledge of an additional language.

HL Students will experience a minimum of 240 hours of instruction over two years, and SL students will experience a minimum of 150 hours over two years. In addition, HL students will read two works of literature in the target language. Each of these courses satisfies the first part of an IB Diploma Candidate's first year of Group Two course selection, or they may be taken as certificate courses. Students who sit for HL French will also be prepared to sit for the AP Exam (formal student registration required).

YEAR TWO: IB FRENCH SL, HL; SPANISH SL, HL



(Language B) • 1 Credit

These courses are the continuation of Language B courses at the HL or SL level. They satisfy the second part of an IB Diploma Candidate's second year of Group Two course selection, or they may be taken as certificate courses. IB Language B Year One is a prerequisite.

AP LANGUAGE SPANISH

NCAA

Grade 12 • 1 Credit

The AP Language courses are the equivalent of college courses in advanced composition and conversation. Emphasizing the use of the target language for active communication, it encompasses aural/oral skills, reading comprehension, grammar, and composition.

All students enrolled in an Advanced Placement Language must take the Advanced Placement Language Examination administered in May. The cost of the exam is the responsibility of the student. Post Advanced Placement course work is as follows: The course objectives are to help students. Post Advanced Placement Exam work is required.

- 1. Comprehend formal and informal spoken language;
- 2. Acquire vocabulary and a grasp of structure to allow the easy, accurate reading of newspaper and magazine articles, as well as of modern literature in the target language;
- 3. Compose expository passages;
- 4. Express ideas orally with accuracy and fluency.

Course content reflects the intellectual interests shared by the students and teacher. It covers such topics as the family, the role of men and women in society, the teenager in the modern world, politics, social change, language, education, and literature.

Recommendation: Mastery (85% or better) in College Level Course and teacher recommendation. A summer assignment is required.

ARTS DEPARTMENT

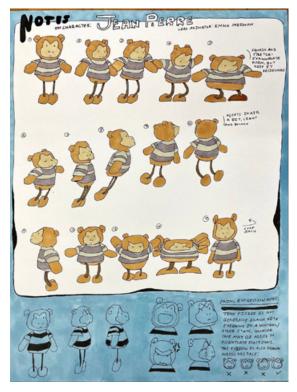
ARTS DEPARTMENT

Why Study Art? Department Philosophy

"Art provides unique opportunities to explore and develop ways of knowing, doing, and being. As such, art, as a core subject, is a critical component in the development of every child and in multiple ways permeates every aspect of human existence." – U.S. Department of Education

While every student will not be inherently talented within the visual arts, they will be challenged to use their imagination, creativity as well as their knowledge to practice and appreciate the arts and their methods. In our changing global community, students will need to adapt and think innovatively in order to be 21st century problem solvers. The development of personal aesthetics, assessment, self-reflection, and critical thinking skills is an asset that will be used throughout their lives.





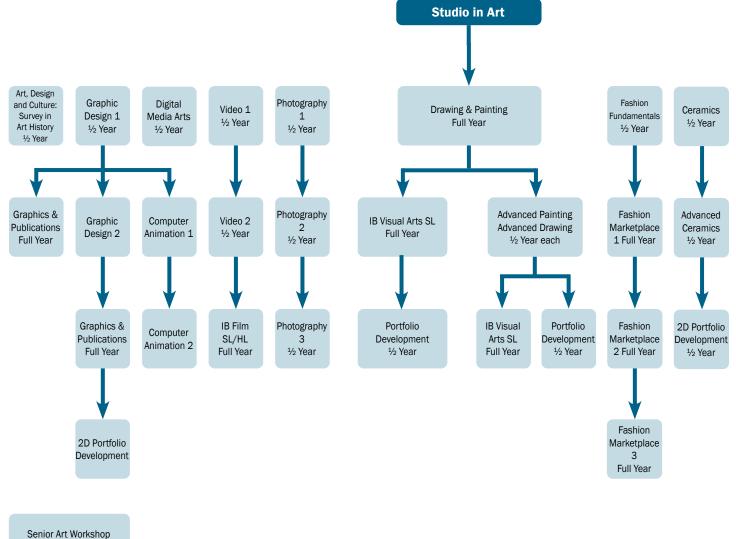
It has been said that a student's education in the arts is the polish that makes their academic experience not only more holistic, but results in them being a more cultured individual.

Things we know to be true -

- Every student will need to be flexible in our changing global community
- Every student will need to learn how to think creativity to become the innovative professionals of tomorrow
- Every student will need tools to develop their self-expression and enhance their communication skill

Note: Studio in Art is the prerequisite to the Fine Arts Elective courses. Elective art courses must have a sufficient enrollment at the time of course selection in order for a course to run. In addition, all art courses will have a final assessment.

ART DEPARTMENT PATHWAYS



Senior Art Workshop Senior Elective - No art prerequisite required

Studio in Art is the prerequisite to the Fine Art Elective Art Courses. All Art courses must have a sufficient enrollment at the time of the course selection in order for a course to run. In addition, all art courses will have a final assessment.



ARTS DEPARTMENT

STUDIO IN ART

Grades 9-12 • 1 Credit

This is an introductory course in Art which satisfies the NYS Standards for the Arts requirement as well as meeting the department's required prerequisite for most classes. This course is designed to give students an opportunity to experience 2-dimensional and 3-dimensional projects using a variety of media that may include clay, painting, drawing, printmaking and photography. This class is an introduction to the visual art world structured according to the elements and principles of design and drawing upon the work of a wide variety of differing artists, time periods and cultures. A sketchbook and basic materials are required, see instructor materials list. Studio in Art is the foundation course which will serve as a prerequisite for art electives as well as a foundational building block for further art experiences.

DRAWING & PAINTING Grades 10-12 • 1 Credit

This course is a full year of foundation and exploration in the visual art. Students will focus on the use of line, form, color, texture and space, using the media of pencil, pen, pastel, colored pencil and charcoal in the first semester. Wet media of watercolor, acrylic paints, and oil paints will be presented in the second half of the year. Themes of traditional nature such as still life, landscape and portrait subject matter will be addressed. Students will refine basic skills and challenge their talents in pursuit of a personal style. Art history will be incorporated into coursework and an in-depth sketchbook of material exploration and concept development will be created. This course results in artwork that is the core of traditional portfolio requirement for college admission to Art, Architecture, and Design programs.

Prerequisite: Successful completion of Studio in Art.

ADVANCED DRAWING & PAINTING

Grades 11-12 • 1 Credit

This advanced elective course will focus on a refinement of observational drawing skills and investigative painting techniques. Students will utilize diverse media while exploring different approaches to drawing and painting throughout history. An introduction to processes and techniques to the art of drawing and painting will be covered at the onset of the course. A sketchbook, Itoya art portfolio and advanced materials are required for the class. Art history will serve as an opening for all units and will pertain to topics and time period being introduced. This is a rigorous course, requiring student generated research, preparation and outside work is required for all units. Development of work for a portfolio will be completed and assessed. Please note this course requires student materials list and cost incurred.

Prerequisite: Studio in Art plus Drawing and Painting.

CERAMICS

Grades 9-12 • 1/2 Credit

A basic introductory course, which deals with the methods of working with clay, utilizing the techniques of hand built and functional-oriented methods, such as pinch, slab and coil. The student will be introduced to the numerous possibilities of using clay, as well as the techniques of glazing and firing. Students will be required to have a command of the ceramic vocabulary, and processes for greater success. Maintaining a ceramic lab as well as working together to keep the lab in order will be necessary. A sketchbook is a required component for the class as well as documentation of wares constructed and outside work is mandatory.

ADVANCED CERAMICS Grades 9-12 • ½ Credit

Advanced Ceramics is a more serious look into the art of ceramics. Hand building as well as thrown techniques will be emphasized. Experimental alternative glazing techniques will be explored. Contemporary movements in clay research will be expected from each student. Students will move away from functional pottery and do extensive exploration in ceramic sculpture both abstracted and realistic. Extended research on ceramic artists will be required, with supporting documentation. A sketchbook of three-dimensional work is required as part of the creation and documentation of wares constructed.

Prerequisite: Ceramics

PHOTOGRAPHY I Gra

Grades 10-12 • ½ Credit

This one semester course will cover both digital and analogue film assignments. Learning to compose images like a professional, create stories with your images, and amplify your photographic skills through learning the single lens reflex camera. We have banks of digital and film cameras for loan, but always welcome students using their personal cameras as well. Students will learn the basics of digital photographic production in Adobe Photoshop and darkroom printing with analogue negatives. Film and photographic paper may or may not be purchased in bulk during the course rather than by the individual for better pricing.

PHOTOGRAPHY II

Grades 10-12 • ½ Credit

This one semester course is designed to further explore photography. Alternative processing and printing (sun prints, painted emulsions, hand coloring, and color photography) are covered along with creating photography series. The class is split half film and half digital. Students are encouraged to have the use of their own camera. Some cameras are available for loan from the department. Film and paper purchase is required. Each student is required to have a sketchbook. Students are required to purchase or rent individual supplies. Please see supply list or contact instructor.

Prerequesite: Successful completion of Photography I.

PHOTOGRAPHY III

Grades 11-12 • ¹/₂ Credit

This one semester course is designed as a culmination to the photo electives. All projects are digital. Exploration of studio lighting, portraiture, photo constructions, and personal website buildings are the main aspects of the class. Students must have access to their own cameras. Some materials may be purchased for the course. Please see supply list from the instructor. This course is designed for students who have made a serious commitment to exploring the medium of photography. This class will provide the opportunity to develop a personal vision. Students must supply their own photographic film and paper. Each student is required to have a sketchbook.

Prerequisite: Successful completion of Photography I and II.

COMPUTER ANIMATION Grades 10-12 • ½ Credit

This is a beginner's introduction to the art and technology of computer-generated animations and graphics. Macromedia's Flash and Curious Lab's Poser are used to create interactive informational graphics. Combining art and technology, students will sketch and assemble an electronic portfolio of finished graphics. Each student is required to have a sketchbook. No prerequisite.

COMPUTER ANIMATION II Grades 10-12 • ½ Credit

This is an extension of the beginner's introduction to the art and technology of computer-generated animations and graphics. Various software programs are used to create both interactive informational graphics and more creative narrative cartoons. There will also be experimentation with newer 3D modeling programs to expand the students' tools for personal expression through animated imagery, including facial recognition software.. Students will continue to utilize the Internet as a problem solving resource and will assemble an electronic portfolio of finished graphics.

GRAPHIC DESIGN I

Grades 10-12 • ½ Credit

Utilizing industry standard design software, Adobe Photoshop and Illustrator, students will create effective designs that reflect real world studio projects. Assignments include logo development, brand identity and package design, which will develop problem solving skills through visual communication. Students will create effective designs that reflect real world studio projects. Assignments may include CD covers, magazine designs, and logos, which utilize problem solving skills and address elements of design as applied to graphics. No prerequisite. Sketchbook is required.

GRAPHIC DESIGN II

Grades 10-12 • ½ Credit

This course will be an in-depth exploration in communicating a message through effective design. Conceptual problem solving skills will be further developed for real world studio projects such as: music posters, advertising, magazines, and promotional packaging. Further investigation of computer software, such as: In Design, Adobe Photoshop, and Adobe Illustrator will be utilized.

Prerequisite: Successful completion of Graphic Design I.

ART, DESIGN, AND CULTURE: SURVEY IN ART HISTORY Grades 9-12 • ½ Credit

In this course students will examine the role Art and Design play in the development of Culture. Through visual analysis of artifacts throughout history the class will establish an understanding of terminology, use of subject matters, symbolisms, and the evolution of the creative world as a mirror of time.

Students will explore the development of culture, visual analysis, and creative problem solving through image-based lectures, discussions, virtual museum visits, films, creative projects, and presentation critiques. By investigating art objects and design concepts through multiple locations and timelines that touch upon the areas of mathematics, science, social studies, art and literature, students will see parallels between the past and present and across cultures. The historical and global knowledge, visual research, and collaboration skills acquired during this course serve as a foundation for future course work in any field.

A sketchbook, 9x12" Itoya art portfolio and supplemental print materials are required. No Prerequisite.

Prerequisite: Computer Animation

ARTS DEPARTMENT

PORTFOLIO DEVELOPMENT

Grade 12 • Only Offered in the Fall • ½ Credit

This class is centered on helping students create a professional art portfolio. A majority of colleges, universities, and art programs require a comprehensive portfolio review. Serious art students will create works of art for the completion of a portfolio. This course is geared toward the creation of a body of work in the hopes of gaining admission into a higher level art program, but this is not required. Students will learn how to matte, photograph and present existing work as well as create new works geared toward the final portfolio presentation. The final examination for the course will be the professional portfolio presentation, complete with images the students take on the copy stand (provided by the art department).

Prerequisite: Successful completion of Studio in Art and another full year art elective or two half year art electives.

VIDEO I

1/2 Credit

Video I is a semester long course designed to facilitate the learning of digital camera technology (video and still), basic video editing and post production techniques. Key concepts that are specifically considered are basic video editing, audio incorporation/balancing, video file formatting/preparation and basic editing skills in the Apple iMovie software. Students will also learn to incorporate media material; photographic images, Adobe Illustrator graphics, text and etc. Students will be guided through projects designed to build a general understanding of the digitally manipulated motion video in varying contexts. Inspiration for subject matter will take into consideration student, school and community interests. Students will be required to shoot video outside of the classroom environment and beyond the regularly scheduled class time.

VIDEO II

1/2 Credit

Video II is a semester long course designed to continue the knowledge learned in Video I expanding on the iMovie Sofware and leading into Final Cut Pro. Students will learn the power of creating storyboards and writing scripts within the video making process. Video projects created will span varying genres; short films, commercials, journalistic video reports, multi-camera productions and/or more. As college is on the horizon, AVP instruction allows students to engage in the project theme creation process (while also allowing finished projects to cater to college portfolio entrance requirements). AVP students will work with peers, utilizing each person's unique strength in a collaborative manner that parallels the professional process found in the real world. Theory, technical instruction and practical application to develop students' visual literacy as effective storytellers is paramount. Each student is required to have sketchbook.

Prerequisite: Successful completion of Video I.

IB VISUAL ARTS SL

1 Credit

The IB Visual Arts course encourages students to challenge their own creative and cultural expectations and boundaries. It is a thought-provoking course in which students develop analytical skills in problem-solving and divergent thinking, while working towards technical proficiency and confidence as art-makers. In addition to exploring and comparing visual arts from different perspectives and in different contexts, students are expected to engage in, experiment with and critically reflect upon a wide range of contemporary practices and media.

IB Visual Arts runs daily for a full year with an additional B,D,F studio lab period. The course is designed for students who want to go on to study visual arts in higher education as well as for those who are seeking lifelong enrichment through visual arts. IB visual Arts can be used as an SL towards achieving the IB Diploma.

IB FILM SL, HL

1 Credit

The IB SL film class is a one-year course designed to help serious film students interpret and create works of film. Students will study and analyze various genres of film for their cultural, historical, artistic, global, and technical aspects. They will research the history of film, learn to write and edit screenplays, and they will also gain skills in film production as they experiment with different technology and software to practice the skills and techniques required for this course. Members of the class will work together as a film production team in order to create their own films as screenwriters, actors, directors, and editors. This student work will be submitted to the IB Organization for scoring. This course will be co-taught by a member of the SHS Art and English departments, and will meet for one period every day, with an additional lab period every other day to accommodate the 150-hour SL requirement, and it is open to juniors or seniors. It may be taken to fulfill the IB Diploma elective requirement for Group 6, or as a certificate course. Summer work will be required.

Prerequisite: Video I or teacher permission

ARTS DEPARTMENT

AP ART AND DESIGN



Grade 12 • 1 Credit

AP Art and Design is a college-level advanced art course. Credit will be awarded at the college's discretion based on the results of the Advanced Placement Portfolio review score. AP Studio Art can be approached in three different ways with a concentration in either 2D Design, 3D Design or Drawing. Each student will choose an area of concentration and work the full year to complete 20-25 pieces for the portfolio requirements. This is an intensive advanced class designed for those students who want to pursue art as a major or who are serious about their work. A body of existing work in a portfolio is mandatory for successful completion of required work. Student will be expected participate in the AP Portfolio Review Examination from College Board.

FASHION FUNDAMENTALS Grades 9-12 • 1/2 Credit

PREREQUISITE FOR ALL FASHION COURSES- OFFERED FALL AND SPRING SEMESTER

This course is an introduction to the world of fashion, basic construction techniques, and design principles. Through several hands-on sewing projects, students will have the opportunity to analyze their own personal style, while developing an understanding of color and the elements and principles of design. Students will be introduced to fashion illustration as well as the history of fashion and its effects on our lives. Course requires student materials list and cost incurred.

Prerequisite: Concurrent enrollment in, or prior completion of Studio Art, or instructor approval.

FASHION MARKETPLACE 1 Grades 11-12 • 1 Credit

Students will be introduced to industry practices of trend research, presentation boards, and design development. Development of a unique style of fashion illustration as well as presentation of rendered designs will be stressed. Specific assignments will be given to broaden students' knowledge of fashion and art history, enhance design research skills, and further develop one's critical thinking. Several projects will result in constructed garments, which will be included in the fashion exhibition. The culmination of this class will be a portfolio of fashion designs. Course requires student materials list and cost incurred.

Prerequisite: Fashion Fundamentals

FASHION MARKETPLACE 2 Grade 12 • 1 Credit

Students will continue to employ the knowledge and skills introduced in FM I, bringing more designs to creation. During the first semester, students will focus on further developing and refining their portfolio for entrance into a college design program. The second semester will encourage students to take risks, use advanced problem solving and design beyond their comfort zone. Participants will help organize and implement a fashion exhibition of student work.

Prerequisite: Fashion Fundamentals and Fashion Marketplace I. Course requires student materials list and cost incurred.

GRAPHICS AND PUBLICATION: YEARBOOK Grades 9

Grades 9-12 • 1 Credit

This is a full year art course that instructs students in the basics in creating a high quality yearbook publication. Students have the opportunity to explore various avenues and interests while receiving credit. Among the many opportunities for learning are: graphic design, photography, creative writing, editing, sales, marketing, and business. The course is entirely student run and operated, giving students real-world, project based learning experience. Students have the ability to add their own spin, tastes, and preferences while capturing all of the moments around the school for posterity. All of the skills you learn in this course will certainly benefit you down the road, regardless of the career you choose to pursue.

DIGITAL MEDIA ARTS

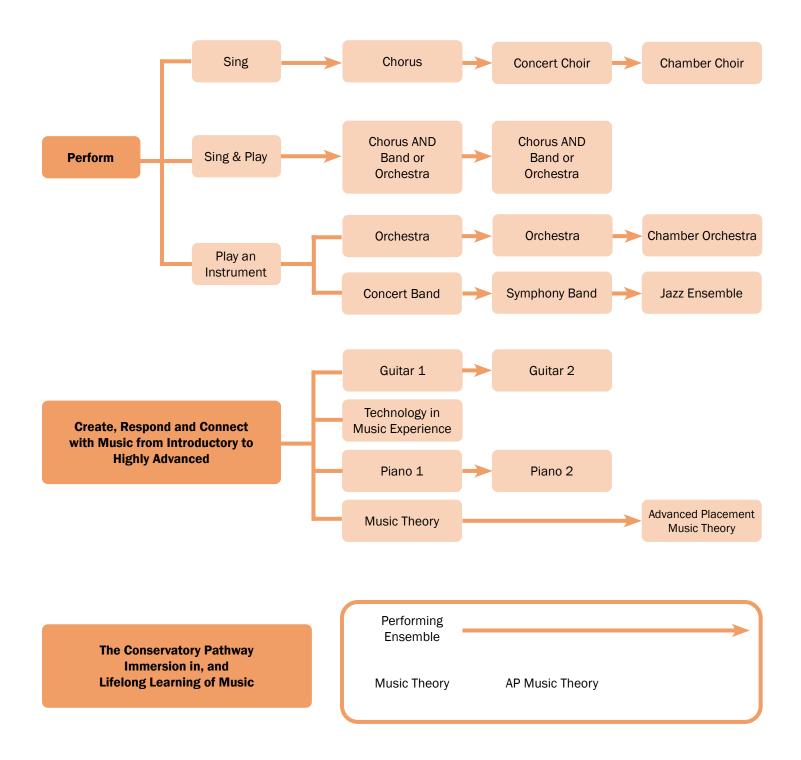
Grades 9-12 • ½ Credit

Digital Media Arts will be a survey of the burgeoning Digital Arts Fields. The fields in Digital Media Arts will be covered, such as: Graphic Arts, Photography, Multimedia Presentations, Communications, and Design. Basics of Photoshop for digital manipulation of images, Typography and Digital Communication principles will be explored. Students will use various techniques and new technologies through apps and software with their digital art. Units of study will employ students to think beyond their image and alter it, embellish it, animate it, or string it together in a multimedia presentation. Students will learn how to import original art into various digital platforms, to manipulate in a multimedia work of art. Adobe Creative Suite, Scanners, Laser Etcher, 3D Printing and ProCreate are all some of the software and hardware that will be employed to take Digital Media Arts to the next level. Each student will create a digital portfolio of their work. Students will be required to have a working smartphone or digital camera, hardcover sketchbook and Itoya and Adobe Creative Suite use. Optional: iPad and iPad pen.



MUSIC DEPARTMENT

Our district values the arts as vital to the core curriculum, and SHS offers courses for every level of student interest in music. There is a place for you to make music, whether you are interested in playing the piano or guitar for the first time, or you wish to continue performing in our award-winning bands, orchestras or choruses. Those students interested in pursuing music in high school and beyond will find our music theory and AP music theory offerings to be valuable. SHS is also proud to offer the International Baccalaureate music course at both standard and higher levels.



PATHWAYS IN MUSIC, VISION FOR 2024, SOMERS HIGH SCHOOL

Note: All performance based music courses may be combined to meet the NYS graduation requirement in Music or the Arts.

CHORUS

Grades 9-12 • 1 Credit

This course is offered to all first year choral students at Somers High School. Through repertoire ranging from the Renaissance to Broadway, students develop an understanding of the rudiments of music and the choral rehearsal process. Enrollees are required to perform in three evening concerts.

CONCERT CHOIR

Grades 10-12 • ½ or 1 Credit

This course is offered to those students who have successfully completed one or more years of chorus. Students rehearse and perform standard concert choir repertoire in addition to lighter selections, while advancing key skills of sight-reading, vocal technique, and choral musicianship. Enrollees are required to perform in three evening concerts. Students who also play an instrument may enroll for ½ credit in conjunction with band or orchestra. These students will attend class every other day. Enrollment in Chorus or Concert Choir is required for membership in all co-curricular vocal activities, including Chamber Choir, Men's Choir and Women's Choir.

Recommended: One year of Chorus.

CHAMBER CHOIR HONORS

Grades 9-12 • ½ Credit, by audition

This full-year course meets one afternoon per week directly after school. The Chamber Choir sings mostly a cappella madrigals and chamber pieces. Only students enrolled in the SHS Concert Choir or Chorus for the current year are eligible. Students are admitted to Chamber Choir by audition in September. The audition includes a prepared piece and a sight-reading sample. Space is limited, as a choral balance is necessary. Rehearsals begin in September and continue throughout the year. Enrollees are required to perform in three evening concerts and many additional performances in the community throughout the year. Students must be available for all rehearsals and performances.

CONCERT BAND

Grades 9-12 • 1 Credit

Concert Band offers students a band experience with music that is generally less demanding than the repertoire of our Symphony Band. It is an ideal ensemble for many ninth grade students, for students changing instruments (changing to percussion is not an option), and older students who wish to play but have less time to practice. Additionally, students who are unable to schedule period one for Symphony Band are invited to enroll in concert band. Concert Band enrollees are expected to practice independently, and attend rotating instrument classes in addition to the daily rehearsals. Factors in the grade point average include engagement in daily rehearsal, individual preparation of our repertoire, instrument class attendance, and commitment to our performance schedule. Ninth grade students are encouraged to speak with their current/former band director in considering the best band placement. Self-selecting is allowed, keeping in mind the demand for independent practice from both ensembles.

SYMPHONY BAND

Grades 9-12 • ½ or 1 Credit

Symphony Band members develop individual and ensemble musicianship through reading, rehearsing, practicing and performing music written and transcribed for band. Symphony Band is open to wind and brass students who have been members in good standing of the SMS band program. The SCSD music program requires proficiency on mallet percussion and timpani as well as drumming technique, and percussion students are required to be proficient in treble and bass clef reading. Therefore, students may only enroll on percussion if they have participated in all three years of the SMS band as a percussionist. Percussionists coming to Somers from other districts must first meet and audition with the instructor before enrolling. Symphony Band enrollees are expected to practice independently, and attend rotating instrument classes in addition to the daily rehearsals. Factors in the grade point average include engagement in daily rehearsal, individual preparation of our repertoire, instrument class attendance, and commitment to our performance schedule. Band members are encouraged to participate in the choral programs. Instrumentalists who sing tend to phrase more musically, play better in tune, and demonstrate the best of tone quality. Therefore, Symphony Band is offered in conjunction with Concert Choir on an ACE/BDF basis for .5 credit. Therefore, Symphony Band is offered in conjunction with Concert Choir on an ACE/BDF basis for .5 credit.

JAZZ BAND HONORS

Grades 9-12 • ½ Credit, by audition

Symphony Band members are encouraged to audition for the Jazz Ensemble, which meets on Tuesday afternoons from 2:15 – 3:30. Instrumentation comprises saxophones, trumpets, trombones, guitar, piano, bass and drum set. As the latter four instruments are not offered in Symphony Band, students from outside the band are invited to audition for those positions. In the case of instruments not regularly employed in the standard jazz ensemble, highly motivated students may perform with the band in selections where we can orchestrate solos/ parts. To play on more pieces, 'doubling' on saxophone or rhythm section instruments would be encouraged. Grade point

average is influenced by consistent attendance, engagement in the rehearsal, individual preparation of our repertoire, and commitment to all scheduled performances. Members of Somers sports teams have been successful members of the ensemble; they are responsible for keeping the director apprised of away game schedules, and must commit to prioritize this honors course over regular team practices. The ensemble, in turn, will excuse students for athletic contests.

ORCHESTRA

Grades 9-12 • ½ or 1 Credit

This course is designed for strings students who wish to develop their individual and ensemble musicianship at the high school level. Orchestra includes reading, studying, rehearsing, and performing strings music from a wide variety of historical eras and perspectives. The course emphasizes proper playing technique, knowledge of musical style and interpretation, and knowledge of current and historical performance practices. Orchestra meets daily in the morning, and all student musicians are expected to attend regular strings classes at school, and practice and study their music independently. All classes, rehearsals, and performances are mandatory.

CHAMBER ORCHESTRA HONORS

Grades 9-12 • ½ Credit, by audition

Chamber Orchestra is an honors class that meets every Thursday and Friday after school. Participation is by audition only and concurrent enrollment in String Orchestra is a prerequisite. Private lessons, while not required, are recommended as students are expected to be prepare our music independently prior to the rehearsal. Members of Chamber orchestra will be expected to participate fully in our partnership with the Caramoor Center for the Performing Arts. This involves twice yearly concerts, workshops and master classes.

THEORY

Grades 9-12 • 1 Credit

Theory takes motivated students quickly through the fundamentals of music reading including treble and bass clef, intervals, scales, keys, chord progressions, cadences, rhythms and meter. Some hands-on keyboard harmony will be included. Theory will help all student musicians with their applied instrumental or vocal study.

AP MUSIC THEORY



Grades 10-12 • 1 Credit

A highly intensive study of harmony, ear-training, sightsinging and form analysis for the advanced theory student interested in a career in music. With the successful completion of the AP theory examination in May as a goal, study of the aforementioned topics will proceed at a rigorous pace, with the expectation that students will assume the responsibility of independent listening and work outside of the classroom. All students enrolled in Advanced Placement Music Theory must take the Advanced Placement exam in May. The cost of the AP exam is the responsibility of the student. A satisfactory score on the AP exam may allow for some college credit. A summer assignment may be required.

Recommended: Music Theory or department recommendation.



PIANO

Grades 9-12 • ½ Credit

Students will learn how to play the piano using the Patrick Casabona Piano Lab. Students will learn the fundamentals of note reading, key and time signatures, rhythm and proper playing position. Once fundamentals are established, students will progress at a pace differentiated for each musician. Repertoire will be selected for and by each student individually. This course can be taken as a music elective, but does not satisfy the NYS Music requirement. Students may enroll in Piano multiple times, as instruction will meet students at their individual readiness level, and students will continue to be challenged with more advanced pieces as they enroll in subsequent semesters.

GUITAR

Grades 9-12 • ½ Credit

This course is designed for students of all experience levels to develop their individual and ensemble musicianship through playing guitar. Students will learn proper playing techniques and musical notation, study guitar music and musicians from a variety of historical traditions and perspectives, and prepare and rehearse music for public performance. Learning material will be differentiated by experience level, so that advanced students will be challenged and beginning students will be able to fully participate every day. All students are expected to study their music and other course materials outside of class. Guitars will be provided. Students may enroll in Guitar multiple times, as class members who enroll in subsequent semesters will partake in greater ensemble experiences, self-governing their progress through group interaction and cooperative learning. Various publications, method books and ensemble music will be incorporated into course content. Development of higher-level musicianship skills, tuning, and self-reliance will be expected all students enrolling in additional semesters. At the conclusion of a student's second enrollment, an end of semester performance will be planned.

*Suitable reading skills to include rhythmic recognition to the eighth note (& rest) value, dotted rhythms and triplets. Enrollees should know hot to recognize time and key signatures, and have experience reading notes in treble and/or bass clef.

TECHNOLOGY IN MUSIC EXPERIENCE

Grades 9-12 • ½ Credit

We will experiment with and investigate the intersect of technology with all facets of music-making, including production, recording and reinforcement of performance. We will make (compose, improvise, and produce) music through interaction with MIDI, software applications, and the Digital Audio Workstation. All students will realize and demonstrate that they are musicians who are able to create and perform through new and accessible avenues. Students will collaborate with peers working in other arts/disciplines, by creating and producing new music for stage, television, film, video-gaming, and other emerging media.







TECHNOLOGY AND ENGINEERING

TECHNOLOGY AND ENGINEERING

Technology courses at SHS benefit all students, as they teach essential skills to be successful in educational and work environments. These skills, which are embedded into all Technology courses, include problem solving, collaboration, creativity, and innovation. Through hands-on activities, students will learn to utilize a variety of physical and electronic tools to support these skills and to accomplish goals. In each course, we consider the benefits and consequences of various technologies, and relate them to key topics including sustainability, pollution, and alternative energies. Students will actively improve their abilities to think spatially, communicate and collaborate effectively with partners, and safely and effectively manipulate materials and other resources.

Throughout their studies, students will be introduced to a host of career options, including



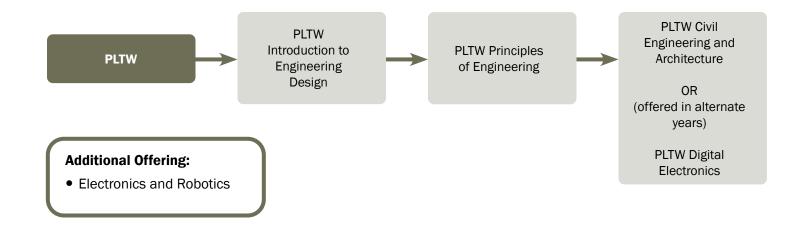
architecture, design, engineering, biotechnology, medicine/surgery, computer Technology, manufacturing, environmental studies, management, etc. By integrating theory with practical applications, the Technology Education classroom encourages active participation in learning and makes students aware not only of what they have learned, but also how they have learned. Here, students come to understand abstract theories by applying them through learning activities, and by putting them into practice in real-world situations. This provides a platform on which we integrate various subjects including math, the sciences, humanities and social sciences. Though most courses were developed with input from engineering colleges, they are not designed just for future engineers. The problem-solving skills and presentation skills are helpful to everyone and are applicable to any career choice.





Project Lead The Way (PLTW) courses of Intro to Engineering Design, Principles of Engineering, Civil Engineering and Architecture, and Digital Electronics, are college-accredited courses through Rochester Institute of Technology (RIT). Students who successfully complete PLTW courses are eligible to earn 3 college credits, scholarship opportunities, and preferred admissions with select college engineering and computer science programs. Please note that not all students will earn college credit. RIT's charge of \$225 applies ONLY to students earning college credit and is payable AFTER completing the course.

TECHNOLOGY & ENGINEERING COURSE OFFERINGS





TECHNOLOGY AND ENGINEERING

PLTW FOUNDATION COURSES:

NCAA

NCAA

PROJECT LEAD THE WAY (PLTW) INTRODUCTION TO ENGINEERING DESIGN (IED)

Grades 9-12 • 1 Credit

Designed for 9th or 10th grade students, the major focus of IED is the design process and its application. Through hands-on projects, students apply engineering standards and document their work. Students use industry standard 3D modeling software to help them design solutions to solve proposed problems, document their work using an engineer's notebook, and communicate solutions to peers and members of the professional community. Students considering Principles of Engineering should take IED as an introductory preengineering course. However, the course is also applicable to students interested in architecture, interior design, marketing/ packaging, or urban planning. This course satisfies the NYS Arts requirement for graduation.

PROJECT LEAD THE WAY (PLTW) PRINCIPLES OF ENGINEERING (POE)

Grades 10-12 • 1 Credit

This higher level academic course designed for 10th or 11th grade students, exposes students to major concepts they'll encounter in a post-secondary engineering course of study. Topics include mechanisms, energy, statics, materials, and kinematics. They develop problem-solving skills and apply their knowledge of research and design to create solutions to various challenges, document their work and communicate solutions.

Recommendation: Score of 85 or higher in Algebra and Geometry.





PLTW CHOICES FOR SPECIALIZATION: PROJECT LEAD THE WAY (PLTW) CIVIL ENGINEERING AND ARCHITECTURE (CEA)

Grades 11-12 • 1 Credit

Students learn about various aspects of civil engineering and architecture and apply their knowledge to the design and development of residential and commercial properties and structures. In addition, students use 3D design software to design and document solutions for major course projects. Students communicate and present solutions to their peers and members of a professional community of engineers and architects. This course is offered every other year in a rotation with PLTW Digital Electronics. It will be offered in the '24-'25 school year.

Recommendation: Grade of 85% or above in Principles of Engineering or Instructor Permission, and a cumulative average of 85 or above in college-preparatory mathematics courses.

PROJECT LEAD THE WAY (PLTW) DIGITAL ELECTRONICS (DE)



Grades 10-12 • 1 Credit

From smart phones to appliances, digital circuits are all around us. This course provides a foundation for students who are interested in electrical engineering, electronics, or circuit design. Students study topics such as combinational and sequential logic and are exposed to circuit design tools used in industry, including logic gates, integrated circuits, and programmable logic devices. This course is offered every other year in a rotation with PLTW Civil Engineering and Architecture. It will be offered in the '25-'26 school year.

Recommendation: Grade of 85% or above in Introduction to Engineering Design, and a cumulative average of 85 or above in college-preparatory mathematics courses.

TECHNOLOGY AND ENGINEERING

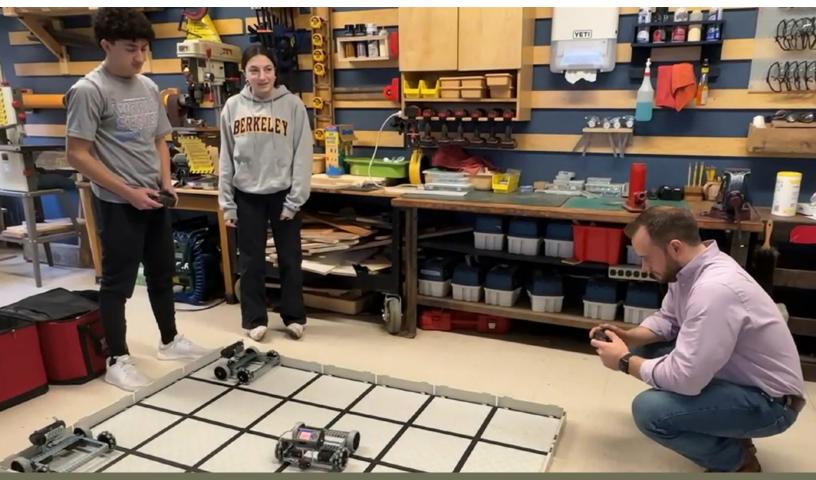
NON-PLTW TECHNOLOGY AND ENGINEERING EDUCATION COURSES:

ELECTRONICS & ROBOTICS

Grades 9-12 • 1 Credit

This course introduces students to the principles of electricity, electronics and robotics. Through a Project Based Learning approach, students will form a theoretical business and design a solution to a defined problem. Topics will include AC/DC theory, circuit design and analysis, solid-state devices, lasers and basic residential wiring. Circuit Wizard, a user-friendly and interactive software program, will help students visualize, design, test and print circuits. By performing many handson laboratory experiments, students will learn how to solder, assemble components, troubleshoot electronic devices and etch a real printed circuit Throughout the course, societal benefits and consequences of electrical technologies will be considered. Hands-on activities will address alternative methods of generating energy, including wind, solar (photovoltaic), hydropower and fuel cells. We will also explore the use of automation and robotics in engineering and manufacturing. Students will learn to program and control VEX robots for automation activities and for problemsolving competitions. Using current technologies and electronics, students may also build robots of their own design.



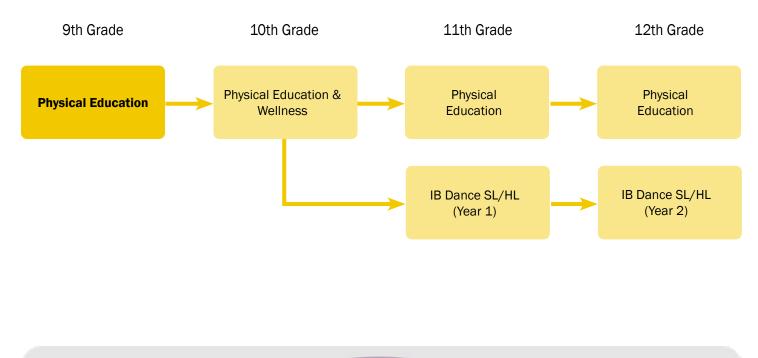


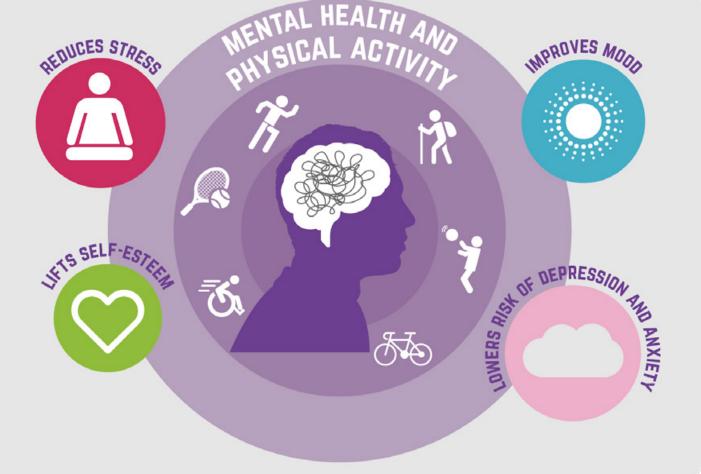


HEALTH AND PHYSICAL EDUCATION

All students in grades 9-12 are required to participate in Physical Education and earn a total of 2 credits. Students develop an increased level of fitness, acquire skills commensurate with individual abilities and potential, and experience new activities to apply during leisure time. Through their involvement, students will hopefully learn to accept and appreciate individual differences, meet and overcome personal challenges and improve levels of confidence and ability.

PE COURSE OFFERINGS





WELLNESS SEMINAR

Grade 10 • ½ Credit

The goal of Wellness Seminar is to introduce, reinforce, and build your knowledge, abilities, and strategies to make health enhancing choices. Wellness Seminar is designed to create and foster health literate individuals. Through this focus in Wellness, students will be equipped with 21st century skills such as goal-setting, decision making and accessing available resources to further prepare them for college, their careers and to live healthy lives throughout and past high school. This is achieved by instruction based upon both National and New York State Health Education Standards, a social-emotional and skillsbased approach to wellness instruction, and a student-centered classroom environment.

9TH GRADE PHYSICAL EDUCATION ½ Credit

The 9th grade program is largely centered around team sports participation, cooperative activities, self defense and physical fitness. Activities will develop and practice motor skills and strategies that are necessary for success in a variety of activities. Students develop individual skills, learn rules and games strategies, practice teamwork, and improve leadership and cooperative skills.

10TH GRADE PHYSICAL EDUCATION 1/2 Credit

The 10th grade program is called the Personal Challenge Program. It is during this year that students are focused on the measurement and improvement of personal fitness and on the development of personal skills that help them to be more effective members of a group. A health-related approach to fitness is emphasized as students learn to use state-of-theart equipment and set both short and long term fitness goals. Through an experiential education program, students learn appropriate training techniques and information related to the physiology of exercise.

The low and high ropes course activities allows students to learn and apply individual and group skills and to enjoy the many physical, social and emotional challenges that cooperative activities offer. Students are also introduced to map reading and orienteering as well as instruction in CPR.

Personal living skills and Habits of Mind (i.e. perseverance, communication, responsibility, risk-taking, and leadership) are practiced and evaluated in an experiential environment of trust and cooperation through adventure games and initiatives. All students are encouraged to maximize personal growth by "going beyond perceived limitations."

11TH AND 12TH GRADE PHYSICAL EDUCATION

¹/₄ Credit Each Semester

The 11th and 12th grade program exposes students to a variety of activities and learning experiences each quarter. Activities will assist students in the understanding and development and maintenance of a personal fitness program based on their fitness goals, personal skills and abilities. These options include activities such as team goal sports, target sports, yoga and personal fitness. Program emphasis is on how lifelong activity can have a positive influence on personal wellness and fitness. *Students must pass both semesters in order to receive the ½ credit needed for graduation each year.



IB DANCE SL/HL YEAR 1

1 Credit

IB Dance SL/HL is a two-year course for the serious dance student. It will meet every day for one class period, and students may enroll as either the SL participants (Standard Level with a minimum of 150 hours of study) or HL participants (Higher Level with a minimum of 240 hours of study). It may be taken to fulfill the IB Diploma elective requirement for Group 6, or as a certificate course. The IB dance curriculum has been designed to provide students with a holistic view of dance as recreation, ritual, culture, and art. The course syllabus is organized into three parts: performance, dance choreography, and world dance studies. A significant focus of the course will be the development and mastery of performance skills associated with selected dance styles and traditions from past and present. Students will study the work of master choreographers to nurture their performance and choreography skills as well as develop the analytical thinking skills necessary to understand dance as a form of cultural and artistic expression. International dance forms and traditions will be incorporated throughout the course to explore how the art of dance reveals insights about global society, culture, and history. Students who wish to undertake IB Dance are strongly recommended to have studied Dance in the past, in order to have the prerequisite skills necessary to succeed in this advanced dance course. This course satisfies a student's annual physical education requirement.

IB SPORTS, EXERCISE, AND HEALTH SCIENCE SL 1 Credit and PE ½ Credit

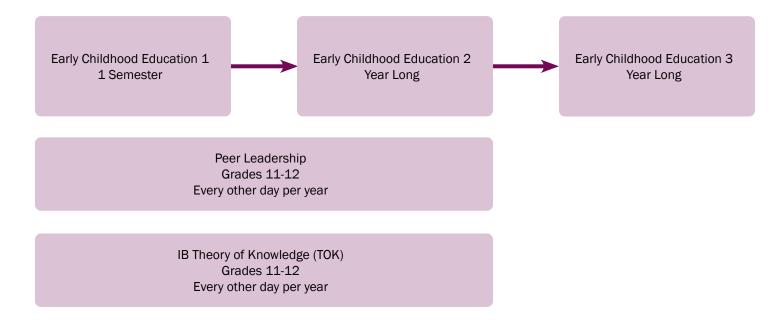
The IB SEHS class is a one-year course that will meet every day with an additional period as a lab that meets every other day. All students enrolled in SEHS will be scheduled for their PE class in the period opposite the lab, during which time they will participate in their regular PE activities. The PE class will, at times, be the platform for students to collect data about their own physical activity, which will then be analyzed in the SEHS class. The goal of this schedule is to combine a science and a physical education experience so that students can study the science of their own activity. According to IB, the SEHS course "incorporates the traditional disciplines of anatomy and physiology, bio-mechanics, psychology and nutrition. Students cover a range of topics and carry out practical (experimental) investigations in both laboratory and field settings." Topics of study include anatomy, exercise physiology, energy systems, movement analysis, skill in sport, and measurement and evaluation of human performance. It will be co-planned by a member of the science department and a member of the physical education department. This course satisfies the IB Group 4 requirement for Diploma Candidates, or it may be taken as a certificate course.



SPECIALIZED OPTIONS



SPECIALIZED COURSE OFFERINGS



SPECIALIZED OPTIONS

PEER LEADERSHIP

Grades 11-12 • 1 Credit

Junior and senior students in this course will attend classes every-other day and will serve as peer mentors for a group of freshman students. The goals of this program are to:

- 1. Offer leadership/facilitation training to upper class students.
- 2. Assist freshman and new students in their transition to Somers High School.
- 3. Provide team-building experiences that will challenge and develop each student's perception of themselves, improve interpersonal skills and encourage personal growth in an environment of mutual respect and appreciation.

All upper class students must apply for acceptance into the program in the spring of either their sophomore or junior year. A letter will be mailed home each year, in late winter or early spring, which will explain the selection criteria and application process. Students will be invited to apply for one of approximately 50 seats in this course. Those that are accepted will be enrolled In a one-credit elective course that will meet every-other day, for the full year.

EARLY CHILDHOOD EDUCATION I

Grades 9-12 • ½ Credit

This course is an introduction to Early Childhood Education. The course is designed as a hands-on experiential-based approach to learning through the use of the Tusker Tots program. Students will gain insight into the stages of development and use the necessary knowledge to interact with the tots and begin developing developmentally appropriate lesson plans to conduct with them. Assignments include creating and implementing lesson plans, researching subject-related articles, classroom observations, and a comprehensive project. Students in grades 9-11 will have priority in enrolling in this course to allow for completion of the sequence.

EARLY CHILDHOOD EDUCATION II

Grades 10-12 • 1 Credit

This course is an advanced look into Early Childhood Education. The course is designed as a hands-on experiential-based approach to learning through the use of the Tusker Tots program. Students will act as mentors for level I students as they take on a leadership role in the Tots program. Students will gain knowledge about major theorists and theories in child development and use the necessary skills to improve performance in the classroom. The major theorists and theories of psychological development that are introduced provide a focal point for a comprehensive culminating project.

Prerequisite: Early Childhood Education I & teacher approval

EARLY CHILDHOOD EDUCATION III

Grade 12 • 1 Credit

This a culminating course that provides a rigorous and intensive look at the field of Early Childhood Education as it pertains to various careers in Human Services. Students will gain knowledge about the college process and implement this knowledge in a practical way as they research various forms of education after high school. Students will also be provided with the skills and tools necessary for advancement into a career of their choice. Independent and facilitated research is conducted, which includes the necessary qualifications for advancement into the work-force, appropriate child settings and placements, and an in-depth look into the students' career choice utilizing networking or shadowing experiences as well as culminating research in various careers in Human Services.

Prerequisite: Early Childhood Education I and II, or Early Childhood Education I and have an expressed interest in a career in Human Services.

TUSKER 101

Grade 9

Tusker 101 is a course that supports all 9th grade students' successful academic and personal transition to high school. This course meets once every eight days out of the cycle, opposite science lab and PE. Through this course, students will learn practical skills of effective communication, utilizing resources within the school, digital citizenship, academic integrity and developing a personal career path. This course is designed to support student success in all subjects as students move through year 4 of the International Baccalaureate Middle Years Programme. This is required, non-credited P/F course.

TUSKER 102

Grade 10

Tusker 102 is a course for all 10th graders designed to extend the learning of Tusker 101. This course meets once every eight days out of the cycle, opposite science lab and PE. In Tusker 102, students are provided with a supportive environment to explore their knowledge, interests, and skills for all four years of high school and beyond. The International Baccalaureate Approaches to Learning skills (ATL) practiced in this course help students to develop the research and critical thinking skills necessary to support their Middle Years Program Personal Projects that culminate in 10th grade. These skills will extend to support student success in all subjects as they move through year five of the International Baccalaureate Middle Years Programme (grades 6-10).

INTERNATIONAL BACCALAUREATE (IB)*

The IB Learner Profile:

A singular capacity for invigorating campus life

Informed by the International Baccalaureate (IB) mission to develop active, compassionate and lifelong learners, the IB programmes

6

International Baccalaureate® Baccalauréat International Bachillerato Internacional

foster a distinctive set of attributes. These qualities—embodied in the IB learner profile—prepare IB students to make exceptional contributions on campus.

Inquirers. They develop their natural curiosity. They acquire the skills necessary to conduct inquiry and research and show independence in learning. They actively enjoy learning and this love of learning will be sustained throughout their lives.

University faculties regularly note IB students' passion for discovery.

Knowledgeable. They explore concepts, ideas and issues that have local and global significance. In so doing, they acquire in-depth knowledge and develop understanding across a broad and balanced range of disciplines.

IB students are extraordinarily well prepared for the academic requirements of university coursework.

Thinkers. They exercise initiative in applying thinking skills critically and creatively to recognize and approach complex problems, and make reasoned, ethical decisions.

IB students contribute to discussions in a meaningful way. They do not shy away from challenging questions and, once they know the answer, follow up by asking "why?"

Communicators. They understand and express ideas and information confidently and creatively in more than one language and in a variety of modes of communication. They work effectively and willingly in collaboration with others.

IB students regularly deliver stimulating presentations and drive excellence in group assignments.

Principled. They act with integrity and honesty, with a strong sense of fairness, justice and respect for the dignity of the individual, groups and communities. They take responsibility for their own actions and the consequences that accompany them.

IB students are infused with the academic integrity that is a fundamental value of universities and colleges.

Open-minded. They understand and appreciate their own cultures and personal histories, and are open to the perspectives, values and traditions of other individuals and communities. They are accustomed to seeking and evaluating a range of points of view, and are willing to grow from the experience.

IB students have a deep understanding of various cultures and views, bringing an appreciation of new views to both their academic study and their involvement in local and wider communities. Their international mindedness complements the missions of the best tertiary institutions.

Caring. They show empathy, compassion and respect towards the needs and feelings of others. They have a personal commitment to service, and act to make a positive difference to the lives of others and to the environment.

IB students tell us they bring this commitment to community and others to their activities and leadership roles at university and carry it throughout their lives.

INTERNATIONAL BACCALAUREATE (IB)*

Risk-takers. They approach unfamiliar situations and uncertainty with courage and forethought, and have the independence of spirit to explore new roles, ideas and strategies. They are brave and articulate in defending their beliefs.

IB students transition well to challenging university settings and show resilience and determination in their work. In academics, they have the confidence to approach new or unfamiliar subjects or material.

Balanced. They understand the importance of intellectual, physical and emotional balance to achieve personal well-being for themselves and others.

IB students are active participants in a wide range of aspects of campus life, as well as focusing on their academic development.

Reflective. They give thoughtful consideration to their own learning and experience. They are able to assess and understand their strengths and limitations in order to support their learning and personal development.

IB students have developed an ability to reflect on their learning and to articulate how they learnt. They have learned that critical reflection is an important academic and life skill.

PRINCIPLED

Inquirer: You develop your natural curiosity, acquire skills to research for answers and expand your love of learning

Knowledgeable: You explore concepts, ideas and issues that have local and global significance.

Balanced: You maintain equilibrium of your intellectual, physical, and emotional needs.

Communicator: You express your ideas and opinions clearly in more than one mode or language using technology, art, music and drama.

Principled: You act with integrity and honesty, respect the dignity of others and take responsibility for your actions.

Are you an **IB Learner?**

Open-minded: You appreciate your own culture and personal history, and are open to the perspectives and traditions of others.

> Caring: You show compassion and respect and act to make a positive difference in the lives of others and the environment.

Thinker: You apply your skills to critically and creatively approach complex problems and make reasoned, ethical decisions.

Reflective: You assess and understand your own strengths and limitations to improve your personal development.

Risk-taker: You approach unfamiliar situations with courage and confidence, explore new ideas and articulate your own beliefs.



INTERNATIONAL BACCALAUREATE (IB)*

IB course descriptions are listed by department. The following are also required to earn an IB diploma:

Creativity, Activity, Service (CAS) is a pass/fail class that supports the IB Diploma Candidates. It is one of the three essential elements that every student must complete as part of the Diploma Programme (DP). CAS involves students in a range of activities alongside their academic studies. It is not formally assessed. However, students reflect on their CAS experiences as part of the DP, and provide evidence of achieving the eight learning outcomes for CAS. The three strands of CAS, which are often interwoven with particular activities, are characterized as follows:

Creativity – arts, and other experiences that involve creative thinking.

Activity – physical exertion contributing to a healthy lifestyle, complementing academic work elsewhere in the DP.

Service – an unpaid and voluntary exchange that has a learning benefit for the student. The rights, dignity and autonomy of all those involved are respected.

In order to demonstrate these concepts, students are required to undertake a CAS Project. The project challenges students to: show initiative, demonstrate perseverance, and develop skills such as collaboration, problem solving and decision making.

This course is required for all IB Diploma Candidates during their junior and senior years. There are no credits associated with this course.

The Extended Essay (EE) is a pass/fail class that supports the IB Diploma Candidates. The goal of this course is to ensure that students are meeting the school's deadlines for EE work. The extended essay is an independent, self-directed piece of research, finishing with a 4,000-word paper. One component of the International Baccalaureate (IB) Diploma Programme (DP) core, the extended essay is mandatory for all students attempting to earn an IB Diploma. Students are guided through the process of research and writing by an assigned supervisor (a teacher in the school). Extended essay topics may be chosen from a list of approved DP subjects — normally one of the student's six chosen subjects for the IB diploma or the world studies option.

This course is required for all IB Diploma Candidates during their junior and senior years. There are no credits associated with this course.

Theory of Knowledge (ToK) is a class that asks students to reflect on the nature of knowledge, and on how we know what we claim to know. As a thoughtful and purposeful inquiry into different ways of knowing, and into different kinds of knowledge, TOK is composed almost entirely of questions. The most central of these is "How do we know?" Other questions include:

- What counts as evidence for X?
- How do we judge which is the best model of Y?
- What does theory Z mean in the real world?

Through discussions of these and other questions, students gain greater awareness of their personal and ideological assumptions, as well as developing an appreciation of the diversity and richness of cultural perspectives.

This course is required for all IB Diploma Candidates. Only DP candidates may enroll in the class. It meets three times out of the eight-day cycle for 2 years, $\frac{1}{2}$ credit per year.

*These descriptions are taken from IB's website, www.ibo.org.

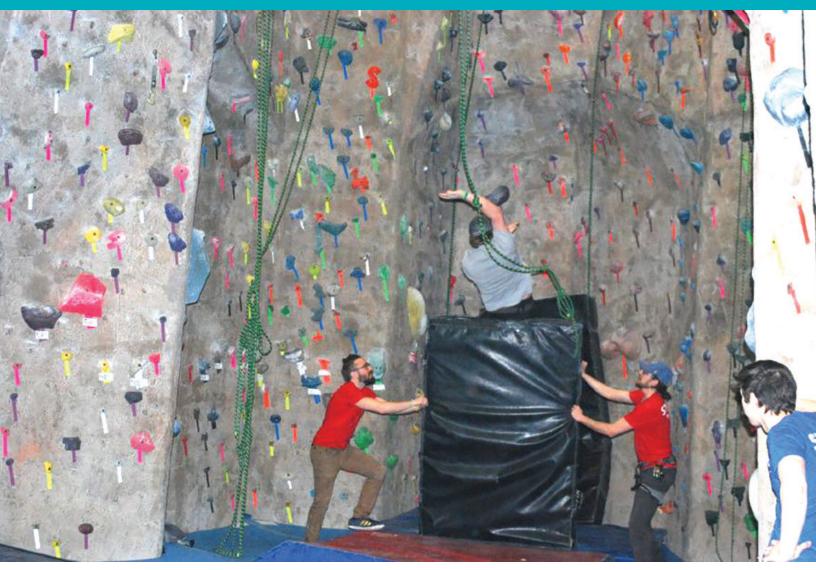
SHS IB options for the 2023/2024 school year for the classes of 2024 and 2025

Group One	 English Language and Literature HL, 2 years Literature and Performance SL
Group Two	 French SL, 2 years French HL, 2 years Spanish SL, 2 years Spanish HL, 2 years
Group Three	 History HL, 2 years Psychology SL, one year with lab Business SL, one year with lab *Environmental Systems and Societies SL, one year with lab
Group Four	 *Environmental Systems and Societies SL, one year with lab Physics SL Sports, Exercise, and Health Science SL, one year with lab, plus PE
Group Five	 IB Mathematics: Analysis and Approaches SL, two years Math Applications and Interpretation SL, two years Math HL, two years (Online for DP Candidates)
Group Six	 Visual Arts SL, one year with lab Film SL, 2 years; Film HL, 2 years Dance SL or HL, two years
Core	 TOK, 2 years, meets three days out of the eight-day cycle CAS Extended Essay
 Students who are pursuing the full IB Diploma must take: One class from each of the 6 groups Three HL classes and three SL Classes TOK for two years Extended essay and CAS completion 	
 Each course is worth a maximum of 7 points: 6*7 = 42 Up to 3 possible bonus points from TOK/EE: 42+3 = 45 Minimum passing score for the IB Diploma is 25 points. No student who fails EE, TOK, or CAS will earn an IB Diploma, no matter how many other points they have earned. 	

* ES&S is one of two interdisciplinary courses offered in the Diploma Programme; Literature and Performance is the other interdisciplinary course (which we do not yet offer). Because it is an interdisciplinary course, students can study this course and have it count as either a Group Three (individuals and societies) or a Group Four (science) course, or both. This gives students the opportunity to study (an) additional subject(s) from any group.

67

ALTERNATIVE HIGH SCHOOL



ALTERNATIVE HIGH SCHOOL

The Somers Alternative High School provides a non-traditional educational setting and opportunity for students. Students earn credit in the four core areas: English, Social Studies, Mathematics and Science. In addition, some students enroll in BOCES programs to acquire skills for a chosen profession as well as to earn local credits. All courses are taught in accordance with the New York State Regents standards curriculum, and students will be required to take and pass Regents exams to meet their graduation requirements.

Classroom instruction is interdisciplinary, team-taught by two faculty members in English and Social Studies while two additional teachers provide instruction in math and science. Physical Education credit is earned in a regular high school physical education class. Throughout the entire program, the small student/teacher ratio and individualized instruction are instrumental in providing an appropriate educational environment for students.

Core academic courses in the alternative school are offered on the junior and senior levels. Additional courses may be available based on students' needs. However, no ninth or tenth grade courses are available through the alternative school program. An internship experience for twelfth graders is a required part of the program.

JUNIORS AND SENIORS WILL TAKE THE FOLLOWING ENGLISH CLASSES:

ENGLISH 11

NCAA

1 Credit

The English 11 class emphasizes communication and critical thinking skills that are honed through class discussion, oral reports, literary analysis, and a great deal of writing. Beowulf, The Elephant Man, Lord of the Flies and Macbeth are supplemented by independent reading, short stories, essays, a wealth of poetry, in addition to the summer reading selections. Students produce a major research paper of literary analysis on a traditional or contemporary classic as well as a final portfolio of best work, and they all take the New York State Regents examination in English at year's end.

Prerequisite: English 10

SEARCH FOR SELF – ENGLISH 12 NCAA

1/2 Credit

The course provides seniors with a final opportunity to develop and strengthen their reading and writing skills, with an emphasis on the needs of freshmen entering college after high school. Literary units are based on a variety of themes, using fiction and non-fiction selections to explore ideas concerned with searching for self. Assignments consist of essays based on themed units and a group of individualized magazine topics.

BEYOND THE CLASSICS NCAA

¹/₂ Credit

This course allows students to discover or rediscover the joy and excitement of reading books for pleasure - the books they want to read. Each student will design his or her individualized reading program (subject to teacher approval). Students will be expected to read, read, read, and share their reading experiences with the rest of the class through specific activities. Keeping a journal, writing letters, contributing to class blogs, and periodic self-evaluations are some of the diverse activity requirements for Beyond the Classics.

JUNIORS AND SENIORS WILL TAKE THE FOLLOWING SOCIAL STUDIES CLASSES:

U.S. HISTORY & GOVERNMENT REGENTS OR HONORS NCAA

Grade 11 • 1 Credit

The history of the United States is the history of a great experiment in a republic and democracy. The basic principles outlined in the Declaration of Independence became the guiding ideas that shaped our nation's development. The Constitution codified these principles into a government of the people. This survey course includes intensive analysis of the Constitution and its influence on the political, social and economic history of the United States.

Prerequisite: Successful completion of Global History and Geography Regents or Honors with benchmarks on placement review for the honors level.

ECONOMICS

NCAA

Grade 12 • ½ Credit

This course provides students with an introduction to the fundamental concepts of economics through analysis and evaluation of topics including: economic systems; supply and demand; money; credit and banking; personal finance; business organization and finance; labor unions; taxation; fiscal and monetary policy; and international trade. An entrepreneurial project is a required component of the course. Economics is a one-semester program and is a New York State requirement for graduation.

PARTICIPATION IN AMERICAN DEMOCRACY NCAA

Grade 12 • ¹/₂ Credit

This course, designed to increase social studies skill development, focuses on rights and responsibilities of citizens in our American republic and democracy through a study of the interaction between citizens and government at the local, state and federal levels. Course content, methods, learning activities and research are directed toward the Regents level college bound student. Participation in American Democracy is a one-semester course required for graduation unless a student is enrolled in Public Affairs. A community service project and "Issues Based" research project are components of the course.

ALTERNATIVE HIGH SCHOOL

JUNIORS AND SENIORS WILL TAKE THE FOLLOWING MATH CLASSES:

CONSUMER MATH

Grade 11 • 1 Credit

This course is the first year math course in the Alternative High School program. It is designed to integrate real-world math concepts together with high school level Algebra skills and techniques. Topics will include Algebraic solutions and evaluations, measures of central tendency, percentage rate, graphing distance and time techniques.

TOPICS IN MATHEMATICS

Grade 12 • 1 Credit

This course is the second year math course in the Alternative High School program. It is a college readiness course designed to prepare students for post-secondary mathematics education. Topics will include algebraic manipulation, geometry concepts, and an introduction to trigonometry.

JUNIORS AND SENIORS WILL TAKE THE FOLLOWING SCIENCE CLASSES:

CONTEMPORARY ISSUES IN SCIENCE NCAA Grade 11

Grade 11 • 1 Credit

This course is intended as an exploration of various topics from all four areas of science: biology, chemistry, earth science and physics. The focus will be on topics that are current and have associated with them medical, legal, financial and ethical issues. Topics will be explored using hands-on laboratory activities and research materials. Each topic will culminate in a small team presentation or project. The course will meet every day for one period. Different issues will be explored during each of the semesters. Possible topics include fiber optics, biotechnology including DNA fingerprinting and stem cell research, forensic chemistry, cloning, alternate energy and genetically engineered food. Students are expected to enroll for the full year for one credit.

Prerequisite: Successful completion of Earth Science and Biology.

ENVIRONMENTAL SCIENCE

Grade 12 • 1 Credit

This course is a study of natural systems and the impacts of humans on the environment. Topics of study include ecology, population growth, food and agriculture, solid waste, energy, air pollution, and water. Students will also explore possible solutions to environmental problems such as biodiversity loss, world hunger, global warming, acid rain, ozone depletion, and water polution by examining scientific data.

This course is designed for students who enjoy science and have a general interest in the world around them. It will engage students in research, hands-on activities, and case studies of past and current environmental problems. Most students are expected to enroll for the full year for one credit. However, under certain circumstances, students may enroll for the spring semester only for ½ credit

Prerequisite: Successful completion of Earth Science and Biology.

SENIOR EXPERIENCE

The purpose of Learning Internship For Tomorrow (LIFT) is to offer seniors enrolled in the Alternative High School a practical work experience which will extend learning beyond the classroom and which, looking towards the future, may provide insight into a potential field of interest. The goals of this program stem from the conviction that "real world" experiences are of vital importance to high school learners. Combining the classroom environment with practical work experience is essential in order to provide students with a balanced and complete vision of life and learning skills. Such experiences provide students with meaningful and relevant learning experiences.

INDEPENDENT STUDY

The purpose of the Independent Study Program is to offer students the opportunity for program enrichment. Students can pursue academic interests or use talents to earn additional credits. **Independent Study credit cannot be a substitute for regular school offerings used to satisfy core requirements, or used as part of the minimum course load requirement of 6.5 credits for grades 9-11, or 5.5 credits for grade 12.**

Enrollment in Independent Study will be affected by student interest, availability of an advisor, and the student's demonstrated ability for independent work and ability to complete successfully his/her other subjects while pursuing the Independent Study. All grades will be PASS/FAIL. NO NUMERICAL GRADES WILL BE GIVEN.

Students can apply for Independent Study by getting an application in the Counseling Center. With an advisor from the specific curriculum area, the student should develop a proposal outlining the nature, rationale, timeline, and outcome of the Independent Study. The advisor, student's parent, Director of School Counseling, and the Principal must give approval for the Independent Study project. Throughout the term of the project, progress will be monitored by the teacher/advisor, and he/she will complete an evaluation to determine whether the project should receive credit. All projects will be subject to a final review by the building principal.

SPECIAL EDUCATION SUPPORTS

Our Special Education program is shaped by federal, state and local guidelines. All students, including those with learning disabilities, are expected to learn and achieve high standards. Graduation requirements mandate that all students pass Regents level classes and Regents exams.

The overall objective of the Special Education Program is to provide instructional support that will improve and increase students' basic educational skills in such a way that, whenever possible, they will be prepared to continue in the regular school program. It has been designed to reflect the mainstream high school curriculum in every way. Modifications are made in accord with each student's Individualized Education Plan. Inclusion classes in core subject areas as well as self-contained, departmentalized classes are offered.

The individual student's achievement is our paramount goal. Therefore there is a continual involvement of parents, school counselors, psychologists, and classroom teachers to insure that the individual's program meets his/her needs.

To this end, the Somers High School Special Education Department is structured to provide a continuum of services for students with disabilities that includes consult teacher, co-teach classes, learning center, skills class, special classes and related services.

The Resource class supports the instructional program and provides individualized help on a regular basis to students who have special learning needs. Organizational skills, study skills, and learning strategies are taught and applied to content area studies. Students are helped to recognize and utilize their strengths to overcome deficiencies. Inherent in resource education is the cooperative endeavor of teachers, counselors, pupil personnel services, students, parents, and community to lend support so that the student with a learning difficulty may become a confident, full-functioning and productive member of the school and society. Our objectives are: (1) to supply educational and emotional support to those students for whom these services have been mandated, so that they may perform more effectively in learning and social situations in the total school program, (2) to consult with classroom teachers, apprising them of the student's learning modalities and abilities, suggesting appropriate management techniques, (3) to communicate with parents regarding the goals we have set, and progress made, and (4) to interact with counselors and pupil personnel services to better serve the needs of each student.

Consult Teacher Direct involves cooperative teaching and support by subject area specialists and special education teachers. Course offerings will be based on the needs of the students at each grade level. Students in this program will have the benefit of an additional inclusion learning center support period to provide small group reinforcement to critical classroom concepts.

MATH 9 ALGEBRA

1 Credit

This course follows the Common Core curriculum adopted by NYS Education Department, and is designed to provide extended study of algebraic topics. This course employs an integrated approach to the study of algebraic relationships. Major emphasis will be placed on: numeracy, equations and functions, solving linear equations and inequalities, graphing linear equations and inequalities, solving systems of linear equations and inequalities, and graphing of systems of equations and inequalities. Each of these topics will include computational work as well as real-life applications. A graphing calculator is required. Students will take a local final in June. This course is followed by Math 10 which culminates in students taking the CC Algebra Regents.

MATH 10 ALGEBRA 10

1 Credit

This course follows the Common Core curriculum adopted by NYS Education Department, and builds upon the principles learned in Math 9. It is designed to provide extended study of algebraic topics. This course employs an integrated approach to the study of algebraic relationships. Major emphasis will be placed on graphing: quadratic functions, absolute value and exponential functions, systems of linear equations, and inequalities. Students will work on algebraic word problems, solving rational equations, operations with rational expressions, and statistics. Students will take the CC Algebra Regents in June. Prerequisite: Successful completion of Algebra 9.

Prerequisite: Successful completion of Algebra 9.

MATH 11 CONSUMER MATH

1 Credit

This course is designed to teach students practical consumer skills. Special emphasis is placed on: banking, including both checking and savings accounts, paying taxes,credit card usage, concepts of principle and interest, living expenses, car payments and personal expenses. In addition, topics in geometry, binary numbes and sketching polynomials will be covered.

Course Guidelines: Successful completion of Math 10.

SC ENGLISH 9 AND 10

The ninth and tenth grade special class curriculum involves intense vocabulary development to assist students on standardized testing necessary in high school. Literature is explored in various forms and comprehension techniques are developed. Short stories, novels, poetry, and non-fiction works are used to identify various literary elements and techniques. Authors include but are not limited to: Steinbeck, Shakespeare, Harper Lee, Orwell, Homer, and Arthur Miller. The language study stresses writing mechanics, parts of speech, and the writing process of drafting and editing.

SC ENGLISH 11 AND 12

The eleventh and twelfth grade special class curriculum relies heavily on continued bolstering of receptive and expressive language and vocabulary skills. Analytical skills are emphasized to identify themes, symbols, central ideas, and textual evidence. Literature explored includes: The Great Gatsby, Streetcar Named Desire, Macbeth, Hamlet, Night, Lord of the Flies, Our Town, and The Hunger Games series. Eleventh grade culminates in the NYS English Regents for which the students are prepared to write extended responses including the argument essay and cite textual evidence properly. Twelfth graders embark in an independent study in the fourth quarter based on a fictional novel of their choosing.

SHS ACADEMIC SUPPORT CENTER

WHAT IS THE ACADEMIC SUPPORT CENTER (ASC)?

The Academic Support Center is a place where students can receive academic and organizational support from SHS staff throughout the school day.

No matter a student's academic level – Regents, Honors, AP, IB, or DE, all students access the ASC when struggling to master a specific content topic or academic skill. Many students are formally scheduled into ASC for routine support, or drop in during lunch, a free period or study hall. We offer support in English, Social Studies, Math, World Language, Science and study/organizational skills at various times throughout the day. Please refer to the schedule posted online as well as outside of the ASC to identify when different subjects are supported.

WHY SHOULD A STUDENT UTILIZE THE ACADEMIC SUPPORT CENTER?

An important developmental piece of high school is learning self-advocacy and learning when to go for help. Struggling through a problem is incredibly important – up to a point. When that healthy struggle turns to frustration, students need to know that it's time to use the help readily available at SHS. Just the process of going for help is a healthy experience for a student, and a positive sign of maturity. Getting support in ASC combats academic frustration and builds confidence for the next struggle ahead!

SHS WRITING CENTER

OUR MISSION:

To provide a productive and comfortable environment where students can work toward becoming fully independent writers capable of creating authentic and original writing.

The Writing Center is open from 7:35 a.m. to 2:20 p.m. Sign-ups for tutoring sessions are available on a first-come, first-served basis.

Students can reserve a time by stopping by the Writing Center and signing up for an available slot on the calendar.

Drop-ins are welcome but will be taken after scheduled appointments.

WHY VISIT THE WRITING CENTER?

- Work on a writing assignment (any subject) if/when your classroom teacher isn't available.
- Plan out a long-term writing assignment. Scheduling several staggered sessions will ensure that students make weekly progress on long-term assignments.
- Improve general writing skills and areas of frustration/resistance regarding the writing process.
- Review exemplars before an in-class writing assessment to review the expectations for specific writing tasks, such as literary analysis, thematic essays, DBQ essays, etc.
- Brainstorm ideas, plan or revise a college essay.
- Challenge themselves to publish creative writing in Gambit, On My Mind, Tusker Times, TeenInk.com, PTA Reflections Contest, or the Scholastic Writing Contests.

SHS TRANSITIONAL SUPPORT PROGRAM

MISSION

The Transitional Support Program (TSP) at Somers High School is a resource for students who experience disruptive social/emotional challenges due to emotional dysregulation, recent life events, extended absence from school or other circumstances that may temporarily impact one's ability to thrive in a traditional classroom. Our team members are committed to providing a safe and supportive environment that promotes learning of emotional regulation and distress tolerance skills that will allow our students to maintain success in all school environments. We recognize the importance of individualized support based on the needs of each unique student and supporting the Whole Child through evidence-based strategies.

VISION

As part of the Transitional Support Program (TSP) Team, our priority is to provide a support system for families that assists students with the transition back to a typical school program. To promote the success of our students, we will: Develop supportive relationships with families and students that are safe, approachable, and grounded in confidentiality. Foster relationships that are caring, responsive, and personalized. Provide specific learning opportunities to develop new skills that empower students to manage the challenges they may face. Provide an inviting atmosphere, respectful of the individual needs that children and families may face. Ensure a team approach, collectively gathering the resources to best support a child and family. Encourage professional learning and support a collaborative environment.

VALUES

- In order to advance our shared vision of a successful TSP professional team, we will:
- Provide a coherent plan to support the wellness of each child.
- Develop Individualized Support Plans to better ensure a student's needs are met.
- Collaboratively monitor the social and emotional wellness of each child to determine the overall impact of the program on each child.
- Deliver customized schedules that provide experiences for students to grow academically while strengthening their ability to manage any difficulty with their social andor emotional development.
- Use research-proven approaches to support the development of our adolescent students.
- Focus on the development of skills to enhance the educational experiences of each child. (e.g. coping strategies, Mindfulness techniques, self-regulation, organization strategies etc.)



PUTNAM/NORTHERN WESTCHESTER BOCES TECH CENTER AT YORKTOWN OCCUPATIONAL EDUCATION PROGRAMS

Putnam Northern Westchester BOCES Tech Center offers specialized, career-oriented training programs, which for any one school district would not be economically feasible to offer. Students attend the Tech Center for either the morning or afternoon sessions, and then attend SHS for the second half of their day. Students typically join the Tech Center in grades 11-12, although programs are also available for students in grades 9 and 10. Students interested in this option will engage in a more focused four-year planning process. Busing is provided from SHS, leaving for the morning session at 7:40, and returning at 10:15, and leaving for the afternoon session at 11:40, returning at 2:10pm.

THE TECH CENTER

Grades 11-12 (9-10 with school review) • 3 Credits Each

Programs are available in the areas listed below. These programs prepare high school students for entry-level positions in a wide variety of occupations, or for a pursuing a college degree. For detailed program descriptions, please see the Services Guide on the PNW BOCES web page. All tenth-grade students will attend an info session on these offerings, presented by counselors from the Tech Center. Following the presentation, students will have the opportunity to visit programs they may be considering. Each program requires an application to be completed with your SHS school counselor. Most programs meet for two hours daily and are designed to be completed in two years. Cosmetology in year two, and New Visions programs in Health and Engineering are four-hour, full-day programs.

Courses offered include the following:

Most programs are offered through the main BOCES campus in Yorktown. Those programs offered through Tilly Foster Farm in Brewster are noted. Integrated academic credit may also be earned as part of the three credits awarded after year two.

Applications must be completed in a timely fashion so that enrollment ein a program will not be jeopardized.

Cosmetology Career Academy

- Cosmetology
- Barbering (seniors only)

Health and Human Services Career Academy

- New Visions Health (senior option)
- Medical Assistant
- Law Enforcement
- Child Development & Education
- New Visions Sports Medicine (seniors only)
- Ceritified Nurse Assistant
- Intro to Health Occupations
- Sports Medicine

Hospitality Career Academy

- Culinary Arts
- Food Preparation Assistant

Construction Career Academy

- Architecture/Engineering
- Welding
- Construction Electricity
- Heating/Ventilating/Air Conditioning
- Carpentry
- New Visions Engineering (senior only)

Communications Career Academy

- Digital Film & Sound
- Graphic Design & Digital Photography
- Fashion Design & Merchandising
- Animation & Motion Graphics

Environmental Business Academy

- Microcomputer Technology
- Veterinary Science
- Urban Forestry

Transportation Career Academy

- Auto Body
- Auto Mechanics
- Intro to Auto Mechanics

CTE at Tilly Foster Farm

- Culinary Arts
- Food Prep Assistant
- Food Service Transition to Work
- Animal Care

English New Learner Career Academy

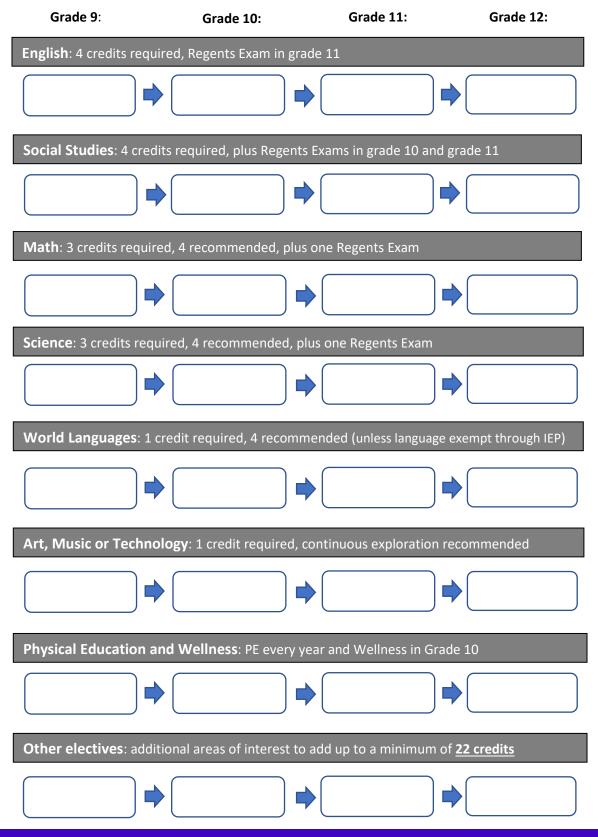
- ENL Immersion
- ENL GED
- ENL Spanish Cosmetology
- ENL Urban Forestry
- ENL Pre-Nurse Aide
- ENL HVAC
- ENL Pre-Medical Assistant
- ENL Retail Services/Office
- ENL Spanish Business & Computer Technology
- ENL Auto Body
- ENL Auto Mechanics
- ENL Carpentry

Alternative Options

- GED
- Diversified Work Program

4 Year Academic Planner

Using this Course Selection Guide, map out the courses you will need to take as well as the ones you want to take over your next few years of HS. Through your individual meeting with your counselor and conferences with your teachers, you can strike the right balance of courses that are an appropriate challenge for you, and consider your total schedule, including extra-curricular commitments. For more planning information about standardized testing as well as the college application process, see the <u>SHS Guidance and Counseling web page</u>.





www.somersschools.org/somershs

SOMERS HIGH SCHOOL

120 Primrose Street Lincolndale, NY 10540 (914) 248-8585