

20-21

North Attleborough High School
Program Of Studies



MESSAGE TO PARENTS AND STUDENTS

The purpose of this *Program of Studies* is to both inspire and inform you and your child about the learning experiences described within this document for all students at NAHS. We are excited to share this iteration of the program of studies as we continue to offer highly rigorous, relevant, and beneficial courses specifically designed to ensure that your child is ready to take on academic challenges at NAHS and in their post-secondary lives, whether it is in continued education via college or in their desired careers. Based on a learning model shared throughout the entire district, all NAHS courses prioritize learning based on curriculum which leverages content to help students develop specific core competencies that will help them succeed in coursework, college and career planning, and in their lives as active citizens.

As you read through this document you will find brief descriptions of each course offered at North Attleboro High School. Parents and students have the opportunity and responsibility of making course selection decisions to achieve their desired educational goals. Any questions relative to course selections should be brought to the Guidance Department for discussion. The selection of an appropriate course of studies is very important, as there is little flexibility in making individual changes once the high school's master schedule has been completed. Some of the important considerations needing to be addressed in course selection are:

- Planning a four-year sequence of courses before entering grade 9 and updating it annually.
- Consulting with staff to determine the level of study to be taken.
- Taking the required prerequisites for sequential courses that will be selected.
- Meeting admission requirements of colleges, universities, technical schools, post-graduate institutions, etc.
- Consulting with a guidance counselor as required.

We look forward to supporting you and your child in this important process. Our teachers and staff have worked tirelessly to create these learning opportunities and they are excited to share the experiences with your child in their classes. To ensure that your child creates the best schedule possible, please be sure to review the course offering and reach out to your guidance counselors with any questions about any courses or language in this document.

Peter Haviland, Principal

Respect · Collaboration · Hard Work · Accountability · Independence

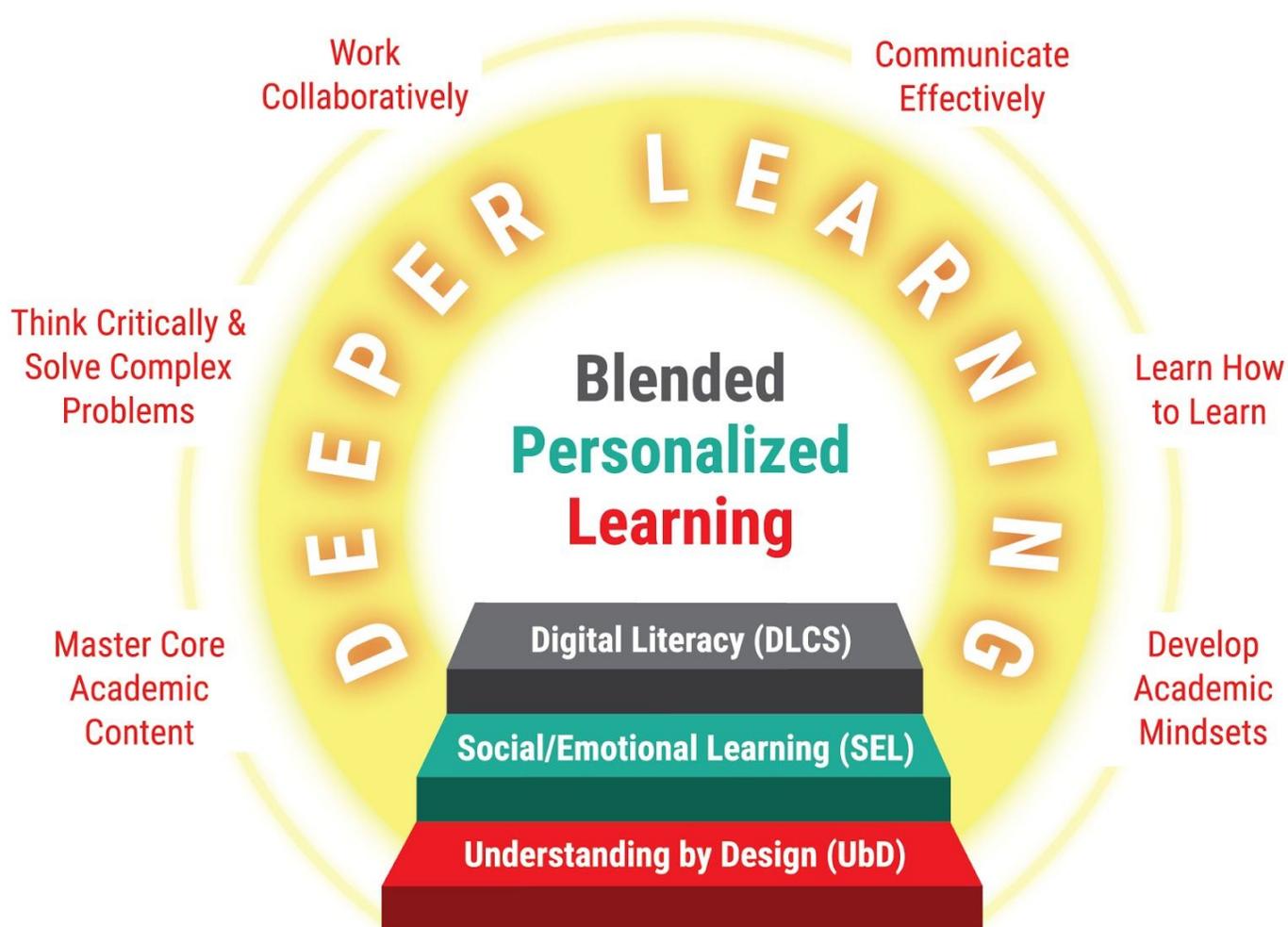
Please call the main office at the school if you would like this document translated into a language other than English.

Por favor, llame a la oficina principal de la escuela si usted quisiera este documento traducido en un idioma que no sea Inglés.

الإنجليزية غير أخرى لغة إلى المترجمة الوثيقة هذه ترغب كنت إذا المدرسة في الرئيسي المكتب الاتصال يرجى
請致電主辦公室在學校，如果你想這份文件翻譯成英語以外的語言。

Non-Discrimination Policy: *The North Attleboro Public School System does not discriminate on the basis of race, color, religion or religious creed, ancestry, national or ethnic origin, age, gender, gender-identity, sexual orientation, military or veteran status, disability, genetic information, or any other characteristic protected under applicable federal, state or local law in admission to, access to, employment in, or treatment in its programs and activities.*

NAPS Learning Model for all Students



Through instruction in all North Attleborough High School courses designed to embed curriculum written in the Understanding by Design (UbD) format, social/emotional learning (SEL), and digital literacy (DLCS), all students will engage in blended and personalized learning to generate deeper levels of learning. Through this process students will develop core competency in the following areas:

- Mastering Core Academic Content
- Solving Complex Problems
- Collaborative Work
- Effective Communication
- Learning how to Learn
- Developing Academic Mindsets

In alignment to the North Attleborough Public Schools vision of learning outcomes for all students. North Attleborough High School commits itself to providing instruction and learning experiences so that all graduates are ready for post-secondary education, careers, and active citizenship.

NAHS MISSION STATEMENT/CORE VALUES/BELIEFS

The mission of North Attleboro High School is to work collaboratively with our students, their families, and the community to provide an exceptional educational experience that prepares students to be contributing members of the global community. In preparing these students for participation in the 21st century, we commit to the following set of core values and beliefs about learning:

Our core values are what drive us to develop in all students the qualities they need to achieve excellence, emphasizing:

- respect
- collaboration
- hard work
- accountability
- independence

NAHS prides itself on the following beliefs:

- fostering a safe learning environment
- providing a differentiated educational experience
- ensuring that all students learn 21st Century skills

21 CENTURY LEARNING EXPECTATIONS

Academic

It is important for students to:

- communicate effectively using writing
- communicate effectively using speech
- read effectively
- use and apply analytical and creative skills to solve problems
- use technology to support their learning

Social

It is important for students to:

- develop life and career skills
- be respectful, responsible, knowledgeable, and ethical/moral members of the school and community

Civic

It is important for students to:

- demonstrate good citizenship within the school and in our 21st century world

TABLE OF CONTENTS - ALPHABETICAL	Pages
ADVANCED PLACEMENT COURSES	9
BUSINESS & TECHNOLOGY DEPARTMENT	51
CLASS RANK	9
COMMUNITY SERVICE	13
EARLY ENROLLMENT PROGRAM COURSES (EEP)	14
ELECTING A PROGRAM	6
ENGLISH	15
GRADUATION REQUIREMENTS	11
GROUP GUIDANCE	66
GUIDANCE SERVICES	6
HISTORY AND SOCIAL STUDIES	23
INDEPENDENT STUDY	12
LEVELS	7
MASSACHUSETTS PUBLIC COLLEGE INFORMATION	11
MATHEMATICS	36
MUSIC	33
NATIONAL HONOR SOCIETY	14
PHYSICAL EDUCATION	57
SCHOOL TO WORK PROGRAM	58
SCIENCE DEPARTMENT	41
SPECIAL EDUCATION PROGRAMS	60
SPECIAL EDUCATION SERVICES	7
STANDARDS FOR GRADE PROMOTION	10
SUMMER SCHOOL	12
VIRTUAL HIGH SCHOOL	14
VISUAL ARTS	31
WORLD LANGUAGE NATIONAL HONOR SOCIETIES	14
WORLD LANGUAGE	28
WELLNESS	56
YEARLY REQUIREMENTS	10

THE HIGH SCHOOL

North Attleboro High School enjoys accreditation by the New England Association of Schools and Colleges. As a comprehensive high school serving the students of North Attleboro, it is necessary to give adequate consideration to providing those subjects that may be of use to the student immediately upon completion of high school as well as aiding the student who elects to continue their education either in career training or college. Our program contains a number of required subjects with emphasis on selection of subjects by the student and parent under the supervision of the Guidance Department. Students are counseled to select those subjects best suited to their ability and their need.

ELECTING A PROGRAM

Students should select from the *Program of Studies* sufficient subjects to assure the required credits for graduation and a sequence of subjects that will equip them for their selected post-secondary goal in life. Every student is assigned a guidance counselor. It is the responsibility of every student to visit the Guidance Office and become acquainted with their counselor prior to electing their program. We encourage all students to share with their parents, their direction and interests prior to course selection.

Students are asked to select with care the program they wish for the ensuing year. Students should work closely with their parents, guidance counselor and teachers in building their program. Note that some subjects are related to a particular grade or grade range. If it is in your educational interest to do so, do not hesitate to request a subject even though it is not listed for your grade level. Your guidance counselor can assist you.

Insufficient student enrollment or fiscal constraints may preclude the offering of certain courses. Parents and students should take into consideration four factors when deliberating the final selection of a program of study while working closely with counselors and teachers.

TEACHER RECOMMENDATION

Teachers consult with students and recommend a course or level to be pursued in their curriculum area. Teacher recommendations are based on criteria such as current academic standing, subject matter knowledge, communication and computation skills, consistency of work, analytical skills, retention, effort and attitude.

COUNSELOR RECOMMENDATION

Counselors meet with students and make recommendations relative to the election of the entire program of study. Counselor recommendations are based on criteria such as academic achievement history, standardized testing, state and local tests (reading, writing, math), career plans, college admission requirements, special needs, psychological and emotional factors, maturity and course prerequisites.

COURSE DESCRIPTION

Course descriptions give a general statement of topic areas and student expectations. These factors and close communication between staff and parents should be involved in the determination of the student's program of studies.

GUIDANCE SERVICES

The primary functions of the Guidance Department are to assist students with their educational development, career and personal concerns, and to offer assistance in the decision-making concerning educational goals. With teacher recommendations as guidelines, the counselor helps students select appropriate courses of study. The counselor provides career, college and technical school information to allow students to relate their courses of study to future plans. Small group and individual conferences are scheduled by the guidance counselor. In addition, students may make an appointment with their counselor at any time by contacting the guidance secretary.

SPECIAL EDUCATION SERVICES

All school districts are required to provide “a free and appropriate public education” for all handicapped students. These services are guaranteed under federal law IDEIA 2004 (Individuals with Disabilities Education Improvement Act) and state law 603 section 28. Consistent with these regulations, North Attleboro High School offers a full range of special educational programs and required treatment services.

For those students who are receiving special educational services at the time of enrollment in the high school, a new Individualized Educational Program (IEP) will be developed by the Team that has been providing services to the student. This plan will be reviewed by the high school administration prior to the student’s enrollment to insure that the student’s schedule provides services appropriate with his/her IEP.

Students transferring into the high school from another school district with an IEP will be placed in local programs that most closely match the services previously provided.

For those students currently enrolled in the high school seen in need of, but not receiving, special educational services, a referral to the Secondary IEP Chairperson or the student’s guidance counselor is the first step of the evaluation process. Referrals may be made by:

- A school official, including a teacher
- A parent of such student
- A judicial officer
- A social worker
- A family physician for the family of such student
- A person having custody of the student
- A student who wishes to be referred for an evaluation

Program possibilities following evaluation include, but are not limited to, the following:

- Regular day program
- Regular day program with support service
- Special day programs
- Programs especially designed to meet the student’s needs, when approved by the Regional Office of the Department of Education.

Individualized Educational Programs of all students are reviewed annually and at such other times as required by the regulations.

LEVELS

North Attleboro High School levels its course offerings across the curriculum. Each year students and parents should consider the following guidelines when determining a student’s readiness for a particular level of

instruction. In addition to these guidelines, students and their parents should consider their current teacher's recommendation, feedback from their guidance counselor, and their own objective assessment of their readiness for this level.

North Attleboro High School believes that all students have the capacity for growth, so we encourage students to reflect on their personal growth at the end of each year and challenge themselves accordingly. Please note, these levels do not reflect an academic track. Therefore, students may select different levels in different disciplines and may change levels throughout their academic career.

Honors

- Students must thrive in an independent learning environment and thus, must be self-motivated, conscientious, organized and have a passion for the subject.
- The pace of the course is accelerated, so students are expected to complete extensive work outside of class and must consistently take responsibility for their own learning.
- Students will be expected to read, understand and analyze lengthy complex documents, and be able to complete multi-part projects and assignments with minimal guidance.
- Written work must reflect sophisticated thought, structure, depth and vocabulary.
- Students must be willing to engage in a variety of formal and informal, individual and collaborative speaking opportunities with minimal guidance.
- Students selecting Honors must possess good to excellent digital literacy skills.

Level 1

- Students must thrive in a guided learning environment and be motivated, conscientious, and organized.
- The pace of the course is rigorous, so students are expected to complete a substantial amount of work outside of class and will be expected to take increasing responsibility for their own learning.
- Students will be expected to read, understand and analyze complex documents, and be able to complete lengthy projects and assignments with moderate guidance from the teacher.
- Written work must reflect proficient thought, structure, depth and vocabulary.
- Students will receive moderate guidance to engage in a variety of formal and informal, individual and collaborative speaking opportunities.
- Students selecting Level 1 must possess average to above average digital literacy skills.

Level 2

- Students thrive in a structured learning environment that supports the development of their academic and organizational skills.
- The pace of the course is flexible and deliberate, providing targeted support as needed.
- Considerable instructional support is provided, helping students to build more independent skills and develop responsibility for their own learning. Some work will need to be completed outside of class.
- Students will be expected to read, understand and analyze documents that may be modified, and be able to complete larger projects and assignments with support.
- With targeted support and guidance, written work must be clear and thoughtful, demonstrating a basic understanding of concepts, themes and vocabulary.

- Students will receive support to develop formal and informal, individual and collaborative speaking skills.
- Students selecting Level 2 will receive support and instruction to cultivate digital literacy skills.

After enrolling in a course, it is recommended that students achieve an average of at least 85 before considering moving up a level. Conversely, students are discouraged from moving down a level unless their average falls below 65. If a student changes levels within the same discipline, s/he will carry their earned grades with them to their new class.

ADVANCED PLACEMENT COURSES

Guidelines and Expectations

The Advanced Placement (AP) program provides for a national standards-based curriculum. AP courses are offered in English, History/Social Studies, Foreign Language, Math, Science, Computer Science and Music. These AP courses are rigorous and are considered to be on par with college-level courses. College credit may be earned if students attend a college that participates in the AP Program.

The following guidelines and expectations exist for students who choose to elect AP level courses:

- Students electing AP courses should expect rigorous college level work that requires a substantial commitment of time spent on out-of-class assignments, readings and projects.
- Students with below an 85 average from the previous course in a given subject area (and their parents) should carefully consider the high levels of expectations before electing an AP course.
- Students considering electing an AP course must seek current subject teacher recommendation.
- Students enrolled in an AP course are required to take the AP Exam in May.
- Students will need to register for the AP Exam online at the beginning of the course.
- Students who drop the course after the exams are ordered (early November) are required to pay the \$40 unused exam fee per the College Board.
- The cost for the AP Exam must be paid in full to the AP Coordinator via cash or check (made out to North Attleborough High School) by February 1. Students with financial need should see their guidance counselor.

CLASS RANK

Class rank is computed in the following manner:

Level	Quality Points
AP	1.35
Honors	1.30
Level 1	1.20
Level 2	1.10
Level 3	1.00

To determine the weighted score, multiply the final grade for each leveled course by the quality point for that level, then multiply that by the credits earned for the course. Sum that total for each completed course and divide by the total number of credits attempted.

Formula = (grade) (quality point) (credits) = QP Product for course. Add all course QPs and divide by the total potential credits.

YEARLY REQUIREMENTS

All students are required to take 30 credits each year. Any student desiring to take less than 30 credits must apply through his/her guidance counselor to the principal.

All NAHS students must complete at least 10 hours of approved Community Service activities each year (grades 9-12) for a total of at least 40 hours by the end of their first semester of their senior year.

- A minimum of 110 credits earned is required for graduation from North Attleboro High School.
- A minimum of five credits of English and History must be earned during each year of attendance at North Attleboro High School.
- Summer school requires 50-59 average.

STANDARDS FOR GRADE PROMOTION

Seniors must earn a minimum of 20 credits in the senior year to participate in commencement exercises. Juniors must accumulate 80 credits to become seniors, sophomores must accumulate 50 credits to become juniors, freshmen must accumulate 20 credits to become sophomores.

COURSE AUDITS

Students who are auditing a course in order to remain connected to the content of that course, but whose class schedule prohibits them from fully participating in the course due to conflicts may do so with parental permission, and at the sole discretion of the teacher of the class to be audited. In the event that teacher permission is not granted for a course audit, the student must decide which of the conflicting courses will remain in the schedule. Students who audit a class will not receive quarterly or final grades, and will receive zero (0) credits for the course.

GRADUATION REQUIREMENTS

All students must take and pass the courses listed below to accrue the minimum 110 credits necessary for graduation from North Attleboro High School.

English	4 years	5 credits each year
Mathematics	4 years	5 credits each year* *Beginning with the class of 2021 and beyond
History	4 years	5 credits each year
Science	3 years	5 credits each year
World Language	2 years	5 credits each year* *Beginning with the class of 2022 and beyond
Physical Education	4 semesters	1 semester each year
Wellness	2 semesters	2.5 credits each semester
Personal Finance	1 semester	2.5 credits
Fine Arts/Practical Arts	2 semesters	5 credits total
Computer Science	1 semester	2.5 credits total or successful completion of a computer literacy exam
Community Service	40 hours	10 hours each school year; total requirements for each graduation year as follows: 2020 = 10 hours 2021 = 20 hours 2022 = 30 hours 2023 and beyond = 40 hours
MCAS		Passing state-mandated MCAS requirements

MASSACHUSETTS PUBLIC COLLEGE INFORMATION

Each student has the responsibility to select a pattern of subjects that will be of personal educational value. In all cases students should formulate a four year sequence of study that will accord the best preparation for their career goals. Remember your guidance counselor is here to help you; do not hesitate to visit the Guidance Office and discuss course selection.

Admission Requirements For Massachusetts Public Four-Year Colleges And Universities

The following are the minimum requirements for admission only. The meeting of these requirements does not guarantee admission. Each institution will develop its own admissions policy and examine applicants based on their entire academic record.

To be considered for acceptance to a Massachusetts State College or any of the four University campuses, you need to take the following 16 courses in high school. A course is equal to one full school year of study.

English	4 courses
Mathematics	4 courses
Sciences	3 courses (including two with laboratory work)
History/Social Science	2 courses (including one in U.S. History)
Foreign Languages	2 courses (in the same language)
Electives	2 courses (from the above subjects or from the Arts & Humanities or Computer Sciences)

These courses must be college preparatory level. If you are not sure whether a course is college preparatory, check with your guidance counselor to be sure it will count toward the 16 courses you need.

Required Grades

You also need to do well in the 16 required courses. The required average grade for the State Colleges and for the Universities will be a “B”. On a 4.0 grading scale (where “A” = 4.0, “B” = 3.0, “C” = 2.0 and “D” = 1.0), the State College requirement and the University requirement is a 3.0 GPA.

Test Scores

If your grades are lower than required, you may be able to make up for them by earning high scores on the SAT or ACT tests. If you think this might apply to you, see your guidance counselor for more information about required test scores.

If you earn the required grades, you still need to take the SAT or ACT tests and have your scores sent to the college or colleges to which you are applying.

Exceptions

Students who do not meet these requirements still may apply, since the State University may admit some students based on factors in addition to those outlined here.

SUMMER SCHOOL

North Attleboro High School offers a three-week Summer School program for those students who failed a course during the school year. Students must have maintained a minimum average of 50 in the failed course in order to be eligible to take the course in Summer School. Successful completion of the Summer School course will result in a passing grade and earning credits for the course. The Guidance Department will have a list of the courses that will run in Summer School in early June.

INDEPENDENT STUDY

Independent Study offers students the opportunity to study above and beyond the curriculum. It is designed to allow students to pursue studies not listed in the *Program of Studies*. To pursue Independent Study, students

must affiliate themselves with a particular teacher, outline their plans of study and complete the forms available in the Guidance Office. Their proposal must be approved by their supervising teacher, their guidance counselor and the Principal.

COMMUNITY SERVICE

To effectively prepare for post-secondary lives, NAHS will require all students to apply the knowledge and skills learned in their course content to their lives as active citizens via organized community service learning experiences. To that end, Community Service exists as a graduation requirement for all North Attleborough High School students.

The NAHS Community Service graduation requirement is designed to prepare students for their lives as active citizens. Community Service is an opportunity for students to demonstrate active citizenship by acting as responsible citizens who contribute to the improvement of their communities. This service also affords students the opportunity to enhance personal social-emotional growth, building self-esteem, and developing critical social skills.

All NAHS students must complete at least 10 hours of approved Community Service activities each year (grades 9-12) for a total of at least 40 hours by the end of their first semester of their senior year. Students can begin earning Community Service hours during the summer prior to entering each grade (after June 1st). All Community Service activities must be approved. Pre-approved Community Service activities will be made available on the NAHS website. While students are encouraged to engage in more than 10 hours of Community Service per year, any student who accumulates excess hours cannot apply those excess hours to subsequent years. Community Service hours for each year must be completed by June 1st of that school year. Seniors must have completed all hours by the end of the first semester of their senior year unless they have made prior arrangements with a school administrator. While students may only use 10 hours of Community Service per year towards their graduation requirement, students who choose to perform Community Service hours in excess of 10 hours per year can still apply the balance of those hours towards potential post high school scholarship opportunities. While 10 hours per year is the minimum, all students are encouraged to report all hours of service performed in order to represent the total volume of service that all NAHS students complete within our community.

Please find more information related to Community Service on our school website.

NATIONAL HONOR SOCIETY

Students are recognized for excellence in Scholarship, Leadership, Character and Service as outlined in the guidelines of the National Honor Society handbook. Juniors and seniors who meet minimum academic grade average requirements articulated in the NHS handbook and application are considered. Membership is determined by a careful system of evaluating academics, leadership, character, and service. Attainment of the minimum academic grade average only satisfies the minimal eligibility requirements.

WORLD LANGUAGE NATIONAL HONOR SOCIETIES

Membership in the French, Spanish and Chinese National Honor Societies is open to students enrolled in the fourth and/or fifth year of the language that have maintained a cumulative average of 90 or above throughout their high school language career. In addition to the academic requirements, students must also display a dedication to the study of the language, excellence of character as well as good citizenship. Once a student has attained membership, he or she must be enrolled in a language course and maintain an 88 or above cumulative average in order to retain member status. Failure to maintain these standards will result in removal from the society.

VIRTUAL HIGH SCHOOL

Virtual High School (VHS) offers innovative, high-quality online high school courses to students. Currently, there are over 200 full-semester and year long online courses in the VHS course catalog. All VHS courses are taught by certified secondary school teachers from each of the schools participating in the VHS cooperative. Through VHS, North Attleboro High School significantly enhances its curricular offers, and at the same time, integrates technology skills development into the academic curriculum. The website for VHS is www.goVHS.org.

COMMONWEALTH DUAL ENROLLMENT PROGRAM

NAHS participates in the Commonwealth Dual Enrollment (CDE) program with local area colleges. Students may elect to take approved courses through the CDE program on a part-time or full-time basis. Families are responsible for any costs associated with these courses, and students will earn credits for approved courses at both NAHS and the college at which the student is taking the course. These are actual college courses taught by staff of the college. Students must maintain minimum GPA requirements to participate and remain in the CDE Program. Interested students should speak with their Guidance Counselor for information regarding the CDE.

EARLY ENROLLMENT PROGRAM COURSES (EEP)

The Early Enrollment Program is a high school/college partnership with Rhode Island College (RIC), which offers high school seniors, and select juniors, an opportunity to earn college credits through RIC while they are completing their high school graduation requirements. The EEP, begun in 1980, has granted thousands of students college credits for courses they have completed while still in high school. In many instances, students have eliminated as much as one full semester of college work by enrolling in the EEP. Classes offering the EEP option are denoted with the letters EEP in their title. Students taking such classes are given the option to enroll in the EEP, or simply take the class without the option of earning college credits through Rhode Island College. These courses are taught during the school day at NAHS by NAHS teachers affiliated with RIC. Families are responsible for any costs associated with the EEP program.

ENGLISH

The English courses address themselves specifically to improving student literacy. The curriculum is divided into two parts. The Freshman and Sophomore full-year courses focus on improving students' reading, writing, speaking, and research skills while they study the four main literary genres (fiction, nonfiction, drama, and poetry). The Junior and Senior elective courses offer further opportunities to improve basic communication skills, to develop higher critical and analytical skills, and to stimulate the creative imagination. The English Department prepares students to read critically and communicate effectively in writing and in speaking. Additionally, Juniors and Seniors can elect to take full-year courses. Junior Honors English offers a rigorous continuation of the reading, writing, speaking and research skills that students developed during their Freshman and Sophomore years. Junior AP English and Senior AP English prepare students for the Advanced Placement exams in the spring through demanding college-level work.

FULL-YEAR COURSES

FRESHMAN ENGLISH Grade 9 5 Credits

This course offers a thematic study of literature from around the world. The classes focus on reading, writing, research, participation, formal presentations, vocabulary growth and preparation for the MCAS exam administered during the sophomore year.

Texts may include: *Prentice Hall Literature (Gold), Sadlier-Oxford Vocabulary (D and E), All Quiet on the Western Front, Animal Farm, Brian's Song, Fahrenheit 451, Farewell to Manzanar, The Five People You Meet in Heaven, Flowers for Algernon, The Good Earth, Great Expectations, I am Malala, Maximum Ride, Night, Romeo and Juliet, Shane, A Tale of Two Cities, Things Fall Apart, Tunes for Bears to Dance To, Two Old Women, The Curious Incident of the Dog in the Night-Time.*

Honors – 110

Level 1 – 111

Level 2 – 112

SOPHOMORE ENGLISH Grade 10 5 Credits

This course offers a study of American Literature in all its forms. The classes continue to focus on reading, writing, research, participation, formal presentations, vocabulary growth, and continued preparation for MCAS.

Texts may include: *Sadlier-Oxford Vocabulary (F), American Short Stories, The Adventures of Huckleberry Finn, The Short Story and You, The Bean Trees, Black Boy, The Catcher in the Rye, Death of a Salesman, Ellen Foster, The Glass Menagerie, The Great Gatsby, The Help, Hiroshima, House on Mango Street, I Am the Cheese, Julius Caesar, Of Mice and Men, The Old Man and the Sea, A Raisin in the Sun, A Separate Peace, Something Wicked This Way Comes, Their Eyes Were Watching God, To Kill a Mockingbird and various collections of American poetry.*

Honors – 120

Level 1 – 121

Level 2 – 122

JUNIOR ENGLISH (HONORS) Grade 11 5 Credits

This course presents a selective survey of American Literature that emphasizes fiction, poetry and drama. It continues to develop those critical and analytical skills expected in college and concentrates heavily on improving student writing.

Texts may include: *Literature: Antigone, A Contemporary Introduction, Sadlier-Oxford Vocabulary (G and H), Cat on a Hot Tin Roof, Dandelion Wine, Desire Under the Elms, Long Day's Journey Into Night, Mourning Becomes Electra, A Streetcar Named Desire, The Things They Carried, Who's Afraid of Virginia Wolf?, The Women of Brewster Place, Zoo Story, Angela's Ashes, Dandelion Wine, The Heart is a Lonely Hunter, and Their Eyes Were Watching God.*

Guidelines for electing honors section: 85 or better in Sophomore Honors English or recommendation of instructor.

Honors - 131

JUNIOR ENGLISH (ADVANCED PLACEMENT) Grade 11 5 Credits

Junior AP English prepares students for the AP English Language and Composition exam. The course engages students in becoming skilled readers of literature written in a variety of rhetorical contexts, and in becoming skilled writers who compose for a variety of purposes. Through the writing and reading of a variety of genres, students will become aware of the interactions among a writer's purposes, audience expectations, and subjects, as well as the way genre conventions and the resources of language contribute to effectiveness in writing.

Texts may include: the primary textbook, *The Language of Composition, 2nd Edition*, variety of Non-Fiction, Fiction, Poetry and Drama, as well as *Sadlier-Oxford Vocabulary Level G*.

Guidelines for election: 85 or better in Sophomore Honors English or recommendation of instructor.

AP – 130

SENIOR ENGLISH (ADVANCED PLACEMENT) Grade 12 5 Credits

This course prepares students for the AP Literature and Composition exam. The content of this course focuses on major British, European and American writers and literary movements. It continues to develop those critical and analytical skills developed throughout the Honors program. Many of its writing assignments focus on close textual reading and analysis.

Works studied may include: Early and Romantic British poetry, *The Canterbury Tales*, *A Doll's House*, *The Road*, *Ethan Frome*, *The Great Gatsby*, *Hamlet*, *The Joy Luck Club*, *Waiting for Godot*, *Wuthering Heights*, *Jane Eyre*, *Othello*, *Tess of the D'Urbervilles*, *Gulliver's Travels*, and *The Importance of Being Ernest*.

Guidelines for election: 85 or better in Junior AP English or recommendation of instructor.

AP – 140

SEMESTER COURSES

The English Department has designed the Elective Program to offer students courses in particular areas of interest. Students should elect one semester course in literature and one in writing/speaking each year.

However, ALL COURSES INCLUDE BOTH READING AND WRITING.

LITERATURE COURSES

AMERICAN SPORTS LITERATURE (Level 2)
FANTASY AND SCIENCE FICTION (Level 2)
GOTHIC LITERATURE (Level 1)
HUMOR AND SATIRE (Level 1)
THE MYSTERY STORY (Level 2)
PROTEST LITERATURE (Level 1)
SHAKESPEARE (Level 1) THE SHORT STORY (Level 2)
UTOPIAS (Honors)

WRITING AND SPEAKING COURSES

ADVANCED CREATIVE WRITING (Honors)
ANALYSIS OF VISUAL TEXTS (Level 1)
COLLEGE AND CAREER WRITING (Level 2)
CREATIVE WRITING (Level 1)
CRITICAL THINKING AND WRITING (Honors)
JOURNALISM I (Level 1)
JOURNALISM II (Level 1)

THE MEDIA AND SOCIETY (Level 2)
PUBLIC COMMUNICATION (Level 2)

INTERDISCIPLINARY COURSE

INTEGRATED AMERICAN STUDIES (Level 1)

ENRICHMENT COURSES

(These courses do not fulfill the English requirements for graduation.)

BASIC VIDEO (Level 2)
ADVANCED VIDEO (Level 1)
THEATER I (Level 2)
THEATER II (Level 2)
JOURNALISM LAB LEADER (Level 1)
VIDEO LAB LEADER (Level 1)
WRITING LAB LEADER (Level 1)

LITERATURE COURSES

AMERICAN SPORTS LITERATURE Grades 10–12 2.5 Credits

This course will employ a chronological approach to study how the values of American society are reflected in the sports of the time. Our study will incorporate the bare-knuckle boxing and baseball of the late nineteenth century up to the highly commercialized sports of the late twentieth century. Students will be expected to complete a number of individual projects in addition to regular reading and writing assignments.

Texts may include: *The Best American Sports Writing (1992-2007)*, *The Blind Side*, *Fall River Dreams*, *Friday Night Lights*, *Idols of the Game: A Sporting History of the American Century*, *Sport in Literature*, *The Natural* and *Shoeless Joe*, *Fists of Freedom*, *Soul of the Game* and *Ali-Frazier: One Nation Divisible*.

This course cannot replace Sophomore English.

Level 2 – 160

FANTASY AND SCIENCE FICTION LITERATURE Grades 11-12 2.5 Credits

This course examines the enduring power of fantasy and science fiction literature from traditional fairy tales to modern novels and short stories. The chosen character and the hero quest will be examined in depth. It will also include various critical approaches to theme.

Texts may include: Various Grimms brothers fairy tales, J.R.R. Tolkien's *The Fellowship of the Ring*, Orson Scott Card's *Ender's Game*, and J.K. Rowling's *Harry Potter and the Order of the Phoenix*.

Level 2 – 161

GOTHIC LITERATURE Grades 11–12 2.5 Credits

This course studies short stories, novels and films of the Gothic genre. It illustrates society's continuing interest in the nature of good and evil and in the supernatural as these motifs appear in historical as well as in contemporary literary works. Students will write several analytical essays.

Texts may include: *Dracula*, *Dr. Jekyll and Mr. Hyde*, *The Crucible*, *Frankenstein*, *Turn of the Screw*, and short stories from Hawthorne and Poe to Lovecraft, O'Connor and Oates.

Level 1 – 162

HUMOR AND SATIRE**Grades 11–12****2.5 Credits**

This course surveys humor and satire in American literature from Twain and Thurber to the present. It also studies the roots of American comedy from Vaudeville to current films and television shows. Students will write several analytical essays.

Texts may include: *American Humor, Catch-22, Slaughterhouse-Five, The Zoo Story, A Modest Proposal*, short stories by Twain, Thurber and Harris, columns and essays by Woody Allen, Dave Barry and Jerry Seinfeld, as well as classic films, such as *Dr. Strangelove*.

Level 1 – 163**THE MYSTERY STORY****Grades 11–12****2.5 Credits**

This course examines the evolution of the mystery story from Sherlock Holmes to the present. It explores the forms and techniques of the British “Whodunit,” the American Private Eye story, *film noir*, the Police Procedural, and the suspense story/thriller.

Texts may include: *The Adventures of Sherlock Holmes*, various short stories by Agatha Christie, *Ten Little Indians, The Maltese Falcon, Red Wind*, and various contemporary Private Eye and crime fiction. **Films may include:** *Clue, C.S.I., The Big Sleep, The Talented Mr. Ripley, and L.A. Confidential* (edited).

Level 2 – 164**PROTEST LITERATURE****Grades 11 – 12****2.5 Credits**

This course examines the ways that authors have described various problems of the post-World War II period through various media—including books, poetry, music, television and films. It focuses on the personal concerns and themes of the individual in the modern world.

Texts and films may include: *A Day in the Life of Ivan Denisovich, After the First Death, The Chocolate War, The House on Mango Street, In Country, Lord of the Flies, One Flew Over the Cuckoo’s Nest, Ordinary People, - Whose Life Is It Anyway?, 12 Angry Men, God Bless the Children, Murder in Mississippi, The Broken Cord, John Q., Awakenings, Pursuit of Happyness* and teacher based materials

Level 1 – 165**SHAKESPEARE****Grades 11–12****2.5 Credits**

This course studies Shakespeare’s comedies, histories and tragedies, drawing on background information about the cultural, political, and religious climates of Elizabethan England. Students will analyze Shakespeare’s work in a variety of media including text, film and live productions. In addition, the class will also discuss different critical approaches to theme and structure. Good analytical and compositional skills are necessary.

Texts may include: *Hamlet, Henry V, Macbeth, A Midsummer Night’s Dream, Twelfth Night, King Lear, The Taming of the Shrew, and The Tempest*.

Level 1 – 166**THE SHORT STORY****Grades 11–12****2.5 Credits**

This course involves reading and analyzing a wide variety of short stories from major writers. Stories are about families, coming-of-age, human nature, society, fantasy, and futuristic topics. The student examines the stories for setting, characters, plot, theme, structure, and style.

Texts may include: *A Book of Short Stories 2, Contemporary Short Stories*, and additional short stories.

Level 2 – 167

UTOPIAS**Grade 12****2.5 Credits**

This course considers imaginary as well as actual plans for the creation of ideal or dystopian societies. The course also examines the philosophical, psychological, and socio-political backgrounds of historical as well as contemporary societies. Students will write several critical analysis essays.

Texts may include: *Future Shock*, *Brave New World*, *Ishmael*, *The Night Thoreau Spent in Jail*, *1984*, *The Road*, and a variety of essays, short works, and documentary films.

Honors – 168**WRITING, SPEAKING COURSES****ANALYSIS OF VISUAL TEXTS****Gr. 11-12****2.5 credits**

After a brief study of the basics of film (including vocabulary, genres and reviews), this semester course studies contemporary issues in America through an examination of a variety of visual texts--including Ted Talks, documentaries and films. To improve students' 21st-century literacy skills, the course encourages active and critical viewing of multiple sources of information presented visually in order to enhance students' ability to analyze and synthesize what they see, make informed decisions and solve problems, evaluate the credibility and accuracy of each source and note discrepancies among the data. Students will also evaluate the speaker's point of view, reasoning, use of evidence and rhetoric, and tone used. The visual texts encourage class discussion and provide the forum for the in-depth study of important issues. In addition, students will read articles and select topics to research for a more thorough in-depth analysis, and create original visual texts.

Level 1-170**COLLEGE AND CAREER WRITING****Grades 10-12****2.5 credits**

This semester course prepares students for college and career writing by focusing on three types of writing: argumentative, informative/explanatory and narrative. After a brief review of grammar and the principles of thesis-proof writing, students will write for a variety of audiences and purposes, use technology to engage in individual and collaborative research, and develop 21st-century literacy skills as applied to essays, research reports, cover letters, resumes, emails and blogs. Students will establish an online portfolio and participate in classroom blogs.

Level 2 – 177**CREATIVE WRITING****Grades 11–12****2.5 Credits**

This course allows students to express their ideas, opinions, perceptions, and imaginations in original short stories, poems, children's literature, journals, and plays. Students are expected to perfect their techniques in each of these areas. They read, analyze, and critique their own work, the work of their peers, and published works of major writers.

Guidelines for election: 80 or above in previous English courses.

Level 1 – 171

INTERDISCIPLINARY COURSES

INTEGRATED AMERICAN STUDIES Grade 11-12

2.5 Credits English 2.5 Credits History

This course will focus on a particular time period (the sixties) and study the history, literature, and culture of that time. The course will examine the decade as a whole and how the events of the time impacted on and were reflected in the literature. Students will also consider elements of the time such as entertainment, toys, fashion, etc. The goal of the course is to offer students a new perspective on a time period they have previously studied. The integrated approach should reinforce the concept that History and English are not separate entities that exist in a vacuum (or solely in a classroom). Students will receive instruction from both an English and History teacher in back-to-back periods. This structure allows for frequent combined classes with dual instructors. Also, although students will receive one grade for the course, they will receive 2 ½ credits for each discipline.

Texts may include: *In Cold Blood, In Country, The Sixties*, “The Subject Was Roses,” and selected poetry and essays.

Level 1 - 250

ENRICHMENT COURSES

(These courses do not fulfill the English requirement for graduation.)

BASIC VIDEO

Grades 9–12

2.5 Credits

This course introduces the student to the basics of television production including digital cameras, lighting, audio, use of the remote controlled Tri-Caster system, and editing with Final Cut Pro X on Apple Mac Pro computers. Each student will participate behind the scenes as well as in front of the camera in a variety of situations. The course will emphasize various projects which develop skills as on-camera hosts and guests, floor managers, producers, directors, and editors. Throughout the course, students will create and present their own productions, culminating in a five minute film of a music video. Enrollment limited to 12 students.

Texts may include: *Television Production, A Classroom Approach, Book I, and various technical manuals.*

Level 2 – 180

ADVANCED VIDEO

Grades 9–12

2.5 Credits

This course continues the development of television production skills at a higher level of technical knowledge. Students will use the digital cameras, remote-controlled Tri-Caster system, Final Cut Pro X on the Apple Mac Pro computers, and will produce several individual and group projects. They will also serve as the crew to tape various school activities that may occur outside of class time.

Texts may include: *Television Production, Book II and various technical manuals.*

Guideline for election: Basic Video.

Level 1 – 181

THEATER I**Grades 9–12****2.5 Credits**

This course introduces the student to the theater, including both acting and technical skills. It includes a basic vocabulary of theatrical terminology, and acting techniques learned through exercises and improvisations, movement, character and scene analysis, and performance skills. Students will also learn stagecraft terminology as well as introductory set design, lighting, stage makeup, production, and direction. Students will participate actively in class, attend theatrical performances, and plan and perform their own scenes or monologues.

Texts may include: *Acting is Believing, The Art of Theatrical Make-up for Stage and Screen, Basic Drama Projects, Basic Stage Lighting, Light on the Subject, Stagecraft for Non-Professionals*, various scene and monologue books, and various play scripts.

Level 2-190**THEATER****Grades 9–12 9–12****2.5 Credits**

This course continues the study of skills for acting and technical theater. Students will expand their knowledge of theatrical and stagecraft terminology as well as their skills in acting, improvisation, set design, lighting, stage makeup, production and direction. Student will be expected to attend theatrical performances and actively participate in all projects.

Texts may include: *Acting is Believing, The Art of Theatrical Make-up for Stage and Screen, Basic Drama Projects, Basic Stage Lighting, Light On the Subject, and Stagecraft for Non- Professionals*, various scene and monologue books, and various play scripts.

Level 2 – 191**JOURNALISM LAB LEADER****Grades 11–12****Credits vary**

Students who have completed Journalism I and Journalism II and are interested in writing, research, editing and newspaper publishing may serve as assistants in journalism.

Students must apply to the Journalism teacher. They may work up to three periods per week to produce the school newspaper and assist in Journalism I classes.

VIDEO LAB LEADER**Grades 10–12****Credits vary**

Students who have completed Basic Video qualify. They may elect to work from one to five periods a week. They must apply to their Basic Video teacher. Students will assist in Basic Video classes.

WRITING LAB LEADER**Grades 11–12****Credits vary**

Students who have an interest in both writing and in computers may elect to serve as assistants in the Writing Lab. They must apply to the teacher in charge of the Lab and, if chosen, will assist students and teachers with writing projects, Internet access and research, and other computer-based projects.

HISTORY AND SOCIAL STUDIES

The History and Social Studies department aims to broaden the education experience of students. Guided by the *2018 Massachusetts History and Social Sciences Curriculum Framework*, students will be educated in the histories of the United States and the world. The curriculum will prepare students to have the knowledge and skills necessary to become active participants in a democratic society and a complex world.

All students at NAHS are required to pass four years of history and social studies. In an effort to better align with the new state curriculum framework, the sequential study of history was changed in 2019-20. In 2020-21, all freshmen will enroll in US History I and all sophomores will enroll in US History II. Juniors will also be enrolled in United States History II, while seniors must take one semester of American Government/Civics and another semester elective of their choice.

Juniors and Seniors who wish to pursue Advanced Placement courses in history and social sciences may do so in lieu of the required courses for their respective years. These students may choose to enroll in AP US History in either their junior or senior year, and/or they may take AP Psychology or AP European History in their senior year. All upperclassmen may take additional history/social studies electives if they so choose.

The following chart illustrates the course sequences in the coming years that will better align our curriculum with the new state framework and prepare our students for a future MCAS History test:

	<i>2020-21</i>	<i>2021-22</i>
Grade 9	US History I	US History I
Grade 10	US History II	US History II
Grade 11	US History II/AP	World History/AP
Grade 12	AP/Am. Gov't/Electives	AP/Am. Gov't/Electives

FULL-YEAR AND REQUIRED COURSES

- **Note that World History will not be available for selection until the fall of 2021**

WORLD HISTORY

Grade

5 credits

In this course students study the period of exploration and its impact on the world. Students also examine the important political, economic, and ideological developments around the globe, including the development of democratic, scientific, and secular thought in Europe. Students will also study the rise of the nation state in Europe and the economic and political roots of the modern world, including the impact of WWI, WWII, and the Cold War. This course will establish the proper world perspective for students to begin their study of American history.

Texts may include: *World History: Patterns of Interaction*

UNITED STATES HISTORY I Grade 9 5 credits

This course offers the first year of a two-year sequence in the study of United States history. Aligned with the state curriculum framework, this course presents an intensive study of early American history from 1763 – 1919. Emphasis will be placed on the study of primary documents and the development of the knowledge and skills necessary to

become effective 21st century citizens.

Texts may include: *American Anthem*

Honors – 224 Level 1 – 225 Level 2 – 226

UNITED STATES HISTORY II Grade 10, 11 5 Credits

This course is the second year of a two-year sequence in the study of United States history. Aligned with the state curriculum framework, this course presents an intensive study of American history from 1919 to the present. Emphasis will be placed on the study of primary documents and the development of the knowledge and skills necessary to become effective 21st century citizens.

Texts may include: *American Anthem*

Grade 10: Honors – 234 Level 1 – 235 Level 2 – 236
Grade 11: Honors - 204 Level 1 - 205 Level 2 - 206

AP UNITED STATES HISTORY (EEP) Grade 11/12 5 Credits

This course will serve as a detailed examination of the history of the United States from the pre-Colombian era to the early twenty-first century. It is designed to meet the Massachusetts state frameworks as well as preparing students for the Advanced Placement and/or SAT Subject Test in U.S. History. Strong writing, analytical and critical thinking skills are required to successfully complete this course’s objectives and to be properly prepared for the mandatory Advanced Placement Exam.

Texts may include: *American History: Connecting With the Past*

Guidelines for election: 85 or better in U.S. History I+II – Honors or recommendation of teacher.

AP – 231

AMERICAN GOVERNMENT/CIVICS (One Semester) Grade 12 2.5 Credits

This course provides a framework for understanding the purposes, principles, and practices of American government. Students will understand and apply their rights and responsibilities as citizens by participating in hands-on and practical applications. Major themes will include the basis of representative government, the division of power among local, state and federal organizations, the role of the United States in world affairs and individual participation in the electoral process.

Honors – 238 Level 1 – 239 Level 2 – 240

PSYCHOLOGY (ADVANCED PLACEMENT) Grade 12 5 Credits

This course is designed to introduce students to the systematic and scientific study of behavior and mental processes of human beings and other animals. It is the equivalent of a college introductory psychology course, using a college-level textbook. Students are exposed to the psychological facts, principles and phenomena associated with each of the major subfields within psychology. They also learn about ethics and methods psychologists use in their science and practice. Students will be required to take the AP Exam in May.

Texts may include: *Myers’ Psychology for AP*

Guidelines for election: 85 or better in upper level history/social studies or recommendation of teacher.

AP – 237

EUROPEAN HISTORY (ADVANCED PLACEMENT) Grade 12 5 Credits

This course will serve as a historical study of European history since 1450 and introduces students to cultural, economic, political, and social developments that played a fundamental role in shaping the world in which they live. This course is designed to prepare students to take the AP European test. Strong writing, analysis, and historical interpretation are required to successfully complete this course and be prepared to take the mandatory Advanced Placement Exam.

Texts may include: *A History of Western Society*

Guidelines for election: 85 or better in upper level history/social studies or recommendation of teacher.

AP - 230

ECONOMICS (ADVANCED PLACEMENT) Grade 12 5 Credits

This course is a college-level full-year course that is part of the College Board's Advanced Placement program. Students enrolled in the course will take one semester of Macroeconomics and be introduced to the principles that apply to an economic system as a whole. In addition, students will take a second semester of Microeconomics, which focuses on the principles of economics that apply to the functions of individual economic decision-makers. Students are required to take two AP exams associated with this course, for Macroeconomics and Microeconomics, respectively

Guidelines for election: 85 or better in upper level history/social studies or recommendation of teacher.

AP - 260

SEMESTER ELECTIVES

MILITARY HISTORY Grades 11-12 2.5 Credits

This course examines the development of military organization and the conduct of war from ancient Greece and Rome to present times. The evolution of weapons, strategy and tactics will be examined through exploration of important military battles, wars and leaders. Units studied include: Alexander the Great, Julius Caesar and the Roman Legions, Napoleon Bonaparte, George Washington, the American Civil War, Military organization, ranks and terminology, World Wars I & II, the Korean War, and the Vietnam War. Emphasis will be placed upon the correlation between the development of new military technology and tactics. Students will gain insight into military culture and organization and important military leaders, wars and battles over the centuries.

Texts may include: *Roman Army; 1776; World War I; World War II and Vietnam.*

Level 2 – 242

LAW AND JUSTICE Grades 11–12 2.5 Credits

This course surveys the role of law in our society. The court system from the local trial courts to the U.S. Supreme Court will be studied with emphasis on the appeal process and the rights of defendants in criminal cases. Students will study Criminal Law, Civil Law, their Rights, and their responsibilities.

Texts may include: *Street Law.*

Level 1 – 243

ECONOMICS Grades 11–12 2.5 Credits

This course introduces the student to the basic concepts and methods of economics and economic analysis. The course emphasizes macroeconomics, and includes topics such as Supply and Demand, Fiscal and Monetary Policy, Inflation and Unemployment, the Federal Reserve Bank and Money Supply and International Trade.

The course includes a thorough study of the investment world including the buying and selling of securities in the various stock markets.

Texts may include: *Understanding Economics*.

Level 1 - 245

WORLD RELIGIONS

Grades 11–12

2.5 Credits

This course provides an overview of many religious belief systems throughout the world. It will cover the religions of many cultures from a historical and philosophical perspective. It will use an objective, critical approach to promote a balanced survey of the differing and similar views of life, the afterlife, and a supreme being in various world cultures.

Level 1 - 246

GENERAL PSYCHOLOGY

Grades 11–12

2.5 Credits

This course introduces students to the study of Psychology. By examining some of the broad areas of research about human and animal behavior, students will develop an appreciation for the science of Psychology and a better understanding of themselves and others. Specific topics to be covered include: The field of Psychology, Sensation and Perception, Motivation and Emotion, the Principles of Learning, Memory, Intelligence, Personality, and Mental Disorders.

Texts may include: *Psychology and You*.

Level 1 – 252

INTEGRATED AMERICAN STUDIES Grade 11-12 2.5 Credit English 2.5 Credits History

This course will focus on a particular time period (the sixties) and study the history, literature, and culture of that time. The course will examine the decade as a whole and how the events of the time impacted on and were reflected in the literature. Students will also consider elements of the time such as entertainment, toys, fashion, etc. The goal of the course is to offer students a new perspective on a time period they have previously studied. The integrated approach will reinforce the concept that History and English are not separate entities that exist in a vacuum (or solely in a classroom). Students will receive instruction from both an English and History teacher in back-to-back periods. This structure allows for frequent combined classes with dual instructors. Also, although students will receive one grade for the course, they will receive 2 ½ credits for each discipline.

Texts may include: *The Sixties*

Level 1 – 250

CHOICES IN THE MODERN WORLD Grades 11-12 2.5 Credits

This course will allow students to explore current world issues by incorporating historical analysis, group interaction, and problem solving. Course topics include, but are not limited to, terrorism, nuclear weapons, genocide, immigration, and the world economy. Students will be responsible for examining the historical background of each conflict, researching opposing perspectives, assessing proposed solutions, and formulating personal responses to each problem. The elective is based on “The Choices Program” curriculum series developed by Brown University, which encourages higher-order skills such as interpreting a variety of sources, thinking critically, and weighing evidence.

Honors – 254

Level 1 - 255

CURRENT EVENTS

Grades 11-12

2.5 Credits

This course seeks to engage students in an examination of both the ongoing and the immediate questions,

issues, debates and developments that shape our nation and world. In order to give students insight into the present world, this course will emphasize industrialism, nationalism, modern imperialism, the increasing importance of science and technology, political revolutions and the interdependence of nations as they develop. Curriculum will be determined in part by issues that occur at the actual time of the class, as well as student and teacher input. Consequently, each section of the class will be unique.

Level 1 – 257

Level 2 – 258

WORLD LANGUAGE

To ensure that all NAHS students participate in a program of study designed to prepare them to be college ready, all NAHS students will enroll in and successfully complete at least two years of World Language courses as a graduation requirement. The World Language Department challenges students to achieve competency in speaking, reading, listening and writing. It offers the skill development necessary for college entrance and placement. All classes at all levels focus on instruction in the target language, and students are expected to participate extensively in class using the language. All courses emphasize vocabulary acquisition, spelling, grammar, composition, translation and daily homework assignments. In addition, appreciation and understanding of diversity is enhanced through the study of the history, customs and culture of various nations.

Note: Level Two courses proceed at an intermediate pace and are designed for students with average grammar and communication skills in both English and the designated foreign language (70 or better). Classes stress grammar and vocabulary and present students with practical applications of the language in everyday situations.

Level One courses are paced for the student who wishes to progress rapidly. These courses move quickly through the presentation of grammar; therefore, the student electing this level should possess good grammar and communication skills in both English and the designated foreign language (80 average or better).

Honors Level students can expect more difficult speaking, reading, writing and listening assignments to prepare them to move into the AP course. To select this level, students should maintain an 85 average or better in both English and the designated foreign language or be recommended by their teacher.

When selecting a level, students and parents should strongly consider the teacher's recommendation.

FRENCH I

Grades 9-12

5 Credits

This course introduces the student to the rudiments of the French language as it is spoken in France and in other francophone nations throughout the world. The acquisition of the basic grammar and vocabulary necessary to speak, to read, to write and to understand the spoken word form the core of the first year of this program. Students gain an awareness of francophone culture and history through a variety of multi-media sources. Please note that students who attained a passing grade in French I at the middle school level **cannot** take this course for credit.

Level 1 – 310

Level 2 – 311

FRENCH II

Grades 9-12

5 Credits

This course serves to reinforce the reading, writing, speaking and listening skills acquired in the first year of the program. In addition, this course introduces the more advanced grammatical concepts and the additional vocabulary necessary for the acquisition of communicative proficiency. Students are expected to participate daily in the target language as well as to produce and to present oral and written work. Cultural understanding and appreciation is enhanced through the study of the history, customs and culture of various francophone nations.

Level 1 – 312

Level 2 – 313

FRENCH III

Grades 10-12

5 Credits

The third year continues to focus on the four basic skills of communication: reading, writing, speaking and listening. Through the mastery of more complex grammatical patterns, vocabulary, and idiomatic expressions students will continue to gain proficiency in the target language. Students can expect frequent writing assignments. Students should also note that this class will be conducted primarily in French and that they are expected to engage in daily oral communicative activities in the target language. Cultural components and literary selections provide various perspectives of the francophone world.

Honors – 314

Level 1 – 315

FRENCH IV**Grades 11-12****5 Credits**

This course aims to increase fluency, improve writing skills, emphasize grammatical analysis, and develop awareness of literary works/styles and of cultural diversity within the francophone world. Students will be expected to complete regular writing assignments including poetry, short stories, journal entries, and research papers and to present various projects orally throughout the year. This class is conducted solely in French.

Honors – 316**Level 1 – 317****FRENCH V (ADVANCED PLACEMENT)****Grade 12****5 Credits**

French V continues to develop the skills of speaking, listening, reading and writing. This course prepares students to take the AP test in French Language; therefore, grammatical analysis, expansion of vocabulary, and conversation are emphasized. Students will read literature, write advanced compositions, and participate in extensive conversations. In addition, the understanding and appreciation of francophone culture is enhanced through the study of the history, customs and culture of various francophone nations. This class is conducted solely in French.

Guidelines for election: 85 or better in French IV Honors or recommendation of teacher.

AP – 318**SPANISH I****Grades****9-12****5 Credits**

This course introduces the student to the rudiments of the Spanish language as it is spoken in Hispanic nations throughout the world. The acquisition of the basic grammar and vocabulary necessary to speak, to read, to write and to understand the spoken word form the core of the first year of this program. Students gain an awareness of Hispanic culture and history through a variety of multi-media sources. Please note that students who attained a passing grade in Spanish I at the middle school level **cannot** take this course for credit.

Level 1 – 322**Level 2 – 323****SPANISH II****Grades****9-12****5 Credits**

This course serves to reinforce the reading, writing, speaking and listening skills acquired in the first year of the program. In addition, this course introduces the more advanced grammatical concepts and the additional vocabulary necessary for the acquisition of communicative proficiency. Students are expected to participate daily in the target language as well as to produce and to present oral and written work. Cultural understanding and appreciation is enhanced through the study of the history, customs and culture of various Hispanic nations.

Level 1 – 324**Level 2 – 325****SPANISH III****Grades 10-12****5 Credits**

The third year strives to develop a more advanced understanding of the four basic skills of communication: reading, writing, speaking and listening. Through the mastery of more complex grammatical patterns, vocabulary, and idiomatic expressions students will continue to become more proficient in the target language. Students can expect frequent writing assignments. Students should also note that this class will be conducted primarily in Spanish and that they are expected to engage in daily oral communicative activities in the target language. Cultural components and literary selections provide various perspectives of the Hispanic world.

Honors – 326**Level 1 – 327****Level 2 - 328**

SPANISH IV HONORS**Grades 11-12****5 Credits**

This course presents the Spanish-speaking world of today through the study of cultures, history and the literary works and styles of a variety of Spanish-speaking nations. It aims to increase fluency, improve writing skills, emphasize grammatical analysis, and develop an awareness of literary style and cultural diversity within the Spanish-speaking world. Students will be expected to complete regular writing and oral assignments throughout the year. Students in

this class are also expected to participate in the National Spanish Exam. This class is conducted solely in Spanish..

Be advised that students interested in taking Spanish V AP are strongly encouraged to enroll in the Honors level of this course. Additionally, only those students enrolled in the Honors-level course are eligible to participate in the Rhode Island College Early Enrollment Program

Honors/EEP – 329**SPANISH IV****Grades 11-12****5 Credits**

This course is intended for the student who wishes to focus on improving his or her communicative proficiency. Interpersonal, interpretive and presentational communication will all be emphasized through daily group discussions and oral presentations. Grammatical analysis will also be presented to develop accuracy in and an understanding of the written language. Students are expected to participate in the target language on a daily basis. This class is conducted solely in Spanish.

Be advised that this course is not considered a feeder course for Spanish V AP.

Level 1 – 330**Level 2 – 331****SPANISH V (ADVANCED PLACEMENT)****Grade 12****5 Credits**

Spanish V continues to develop the skills of speaking, listening, reading and writing. This course prepares students to take the AP test in Spanish Language; therefore, grammatical analysis, expansion of vocabulary, and conversation are emphasized. Students will read literature, write advanced compositions, and participate in extensive conversations. In addition, the understanding and appreciation of Hispanic culture is enhanced through the study of the history, customs and culture of various Hispanic nations. This class is conducted solely in Spanish.

Guidelines for election: 85 or better in Spanish IV Honors or recommendation of teacher.

AP – 332**SPANISH V HISPANIC CULTURE****Grade****12****5 Credits**

This course is intended for the student who wishes to learn more about Hispanic culture while continuing to improve language skills. The history, traditions and current events of Hispanic nations will be covered. Topics include common historical connections, present-day political situations, influential writers, artists, popular culture including film, music and television personalities, cuisine and typical holiday traditions. Like Spanish IV, oral communication will be emphasized through daily group discussions and presentations. Grammatical analysis will be presented as needed to develop accuracy in the written and spoken language. This class is conducted solely in Spanish.

Level 1- 333

Visual Arts and Music

Students who enroll in the Visual and Performing Arts courses will independently use their learning to:

- Engage in creative artistic expression and understand the significance of the arts in society
- Generate and/or execute artistic ideas for a variety of purposes and contexts
- Analyze and interpret artistic ideas for a variety of purposes and contexts
- Apply knowledge of the arts to deepen understanding of the human experience

VISUAL ARTS

The North Attleboro High School Visual Art Department will inspire creativity through the exploration of art's immense historical and cultural significance. It is the mission of the North Attleboro High School Visual Art Department to provide an opportunity for students to actively engage in the visual arts by creating a space to explore the following ideas:

- Creativity
- Personal and artistic growth
- Appreciation and understanding of art and its role in society
- Problem solving
- Making a positive contribution to the school culture

Through respectful, expressive, and collaborative learning, students will understand the impact of art in a number of disciplines. We will encourage imaginative methods of communication and problem solving, and together with students, identify connections between art and the world.

Tier 1:

FOUNDATION ART

Grades 9-12

2.5 Credits

Foundation Art is the introductory course in the Visual Art Department and is the required starting point for students as they move through visual art courses. Through this course, students will explore a variety of media including drawing, painting, printmaking, collage, sculpture, fiber arts, and clay. Students will build skills and engage with the artmaking process. Idea development is an important component to this course as students will learn to visually communicate original ideas and meaning.

Upon completion of this course, students may elect to take Drawing, Painting, Sculpture, Printmaking.

Required Material: Sketchbook

860

Tier 2:

PRINTMAKING

Grades 10-12

2.5 Credits

In this course, students will learn the varied methods and techniques of printmaking by exploring the production of multiple images from a single design. Emphasis is on design, technique and the creative use of materials related to printing processes. Students will develop a portfolio of prints and art works based on their original ideas. Silkscreening, analog/alternative photography, bookmaking, and digital/traditional printmaking methods will all be explored.

Upon completion of this course, students may elect to take Drawing, Painting, Sculpture, Art Studio.

Required Material: Sketchbook

Guideline for Election: Foundation Art, Art & Design 1, or Studio Art 1

861

SCULPTURE Grades 9-12 2.5 Credit

This course introduces students to the fundamental skills, techniques, and production of three-dimensional art forms. Using problem solving, students will create both functional and sculptural works in a variety of media. Students will develop knowledge and understanding of three-dimensional art forms through study of sculptural art history and apply this understanding to their own work. Students will be assessed through classwork, projects, sketchbooks, and studio practice.

Required Material: Sketchbook

Guideline for Election: Foundation Art, Art & Design 1, or Studio Art 1

866

PAINTING (20 max) Grades 10-12 2.5 Credits

In this course, students will dive deep into the medium of painting and explore the characteristics and techniques of watercolor, gouache, and acrylic paint. Students will deepen their understanding of color theory and explore the connections between painting and other media such as drawing, collage, and fiber arts. Students will utilize their painting knowledge to make informed artistic decisions and communicate meaning in their paintings.

Upon completion of this course, students may elect to take Drawing, Sculpture, Printmaking, Art Studio.

Required Material: Sketchbook

Guideline for Election: Foundation Art, Art & Design 1, or Studio Art 1

868

DRAWING Grades 10-12 2.5 Credits

In this course, students will engage with the medium of drawing as they render the world around them. Students will explore a variety of drawing materials and learn about the unique characteristics of these materials. Developing observation skills is a key focus of this course as students will learn to create the illusion of form and space in still life, portraiture, and environments. Students will utilize their drawing knowledge to make informed artistic decisions and communicate meaning in their drawings.

Following completion of this course, students may elect to take Painting, Sculpture, Printmaking, Art Studio.

Required Material: Sketchbook

Guideline for Election: Foundation Art, Art & Design 1, or Studio Art 1

869

Tier 3:

ART STUDIO Grades 10-12 2.5 or 5 Credits

Students will have the whole Art World in their hands. Students will build a portfolio of meaningful artwork using any medium of art they feel best suits their concept. Technique and concepts are of paramount importance in this class, so bring your skills and your creativity. A variety of mediums will be explored including; collage, graphic design, photography, sculpture, drawing and painting. Students will also research artists and art movements to help them deepen their understanding of art. Projects are designed to explore the many ways artists develop and refine ideas and concepts. Students will also study the importance of art in contemporary and

historical times. Students will be assessed through projects, presentations, creativity, and exhibition.

Required Material: *Sketchbook and 3-ring binder*

Guideline for selection: Recommendation of teacher

Art Studio Section 1: Semester – Level 1-874 (2.5 credits)

Art Studio Section 2: Full Year – Level 1-875 (5 credits)

MUSIC

The Music Department offers courses designed for both beginner and advanced musicians. A student should read each course description to determine the appropriate level for his/her current musical background. If a student has any further questions about which classes to take, he/she should see a teacher from the department.

FULL-YEAR COURSES

CONCERT CHOIR

Grades 9 – 12

5 Credits

Concert Choir is a co-curricular full-year performing ensemble that sings at concerts, competitions, and community events throughout the school year. No prior singing experience is necessary. Students will study music of a variety of styles and time periods in preparation for their concert performances. The course includes the development of singing skills, music literacy, and singing with others. There are extracurricular concerts and rehearsals that students are expected to attend. This course may be repeated for credit.

Level 1 – 896

CONCERT BAND

Grades 9 – 12

5 Credits

The high school Concert Band is a *co-curricular* full-year course open to students who have previously, or are currently, studying a band instrument (e.g., Woodwind, Brass, or Percussion). With permission of the instructor, select string instrumentalists (guitar, violin, cello, bass, etc.) are welcome. Students will study music of a variety of styles and time periods in preparation for concert performance. The course includes the development of listening skills, tone production, elements of meter and rhythm and performing as part of a large instrumental ensemble. The Concert Band will perform in school concerts, extra-curricular music festivals and competitions, and community events throughout the year. Additional Concert Band rehearsals may be added on select weeknights depending on the program. Students are expected to attend all concerts and performances as part of the grading requirements. Students are required to attend a limited number of rehearsals and specific performances after school. A calendar for the year is provided to each student at the beginning of the course. It is encouraged that students enroll in private instrumental lessons, audition for the Southeast District Festival, and perform at the scheduled chamber ensemble concerts as noted in the syllabus. This course may be repeated for credit.

Guideline for election: Prior instrumental background or permission of instructor.

Level 1 – 891

CONCERT BAND/CONCERT CHOIR

Grades 9 – 12

5 Credits

Concert Choir allows students to take part in both ensembles throughout the school year. The two ensembles meet during the same period of the day, and students go to each class on an alternating schedule as determined by the instructor(s). Students are expected to keep up with all expectations of both ensembles including

individual practice, extra rehearsals, and concerts. There are extracurricular concerts and rehearsals that students are expected to attend.

Guideline for election: Prior instrumental background or permission of both instructors.

Level 1 – 893

MUSIC THEORY (ADVANCED PLACEMENT) Grades 11–12 5 Periods 5 Credits

This course covers the foundations of musical theory and is designed for the serious music student. Students will learn about the elements that make up melody, harmony, rhythm, and form. A variety of styles and periods will be discussed. Students are required to take the AP Music exam in May.

Guideline for election: 85 or better in Music Theory I or recommendation of teacher.

AP – 892

SEMESTER COURSES

MUSIC TECHNOLOGY Grades 9–12 2.5 Credits

The purpose of this course is to explore technology resources used to create, evaluate, arrange, and perform music. Students will learn about sound production, recording, broadcasting, composing and arranging, live audio reinforcement, editing, mixing and mastering, as well as foundational music theory and piano skills.

Topics will also include the legalities of digital music and copyright as well as the effects of sound on the anatomy of the ear. Instruction will be a combination of hands-on exploration and creating as well as guided individual and group projects.

885

WORLD MUSIC DRUMMING I Grades 9-12 2.5 Credits

Students will perform on various hand drum instruments of varying style and ethnic backgrounds. Rhythmic content will progress from the easy to medium level. Topics will include music reading skills, technique, and general musicality. Students will perform as a group and individually during class time. No musical background is required for this course.

886

WORLD MUSIC DRUMMING II Grades 10-12 2.5 Credits

This class is open to students who have previously taken World Music Drumming I. Students will perform on various hand drum instruments of varying style and ethnic backgrounds as well as keyboard percussion instruments. Rhythmic content will progress from the intermediate to advanced level. Topics will include music reading skills, technique, and general musicality. Students will perform as a group and individually during class time.

Guideline for election: Successful completion of World Music Drumming I

887

MUSIC THEORY I Grades 9-12 2.5 Credits

Music Theory I will explore methods of composing music through the use of basic music notation and vocabulary. The course will begin with identifying notes, intervals, key signatures, scales, chords, keys and rhythms, then move on to basic chord progressions and songwriting. Previous experience in a music class is recommended, but not required.

Level 1 – 888

MUSIC COMPOSITION**Grades 9–12****2.5 Credits**

This elective course is an extension of Music Theory and Music Technology and expands upon the techniques of writing and harmonizing melodies in a variety of musical forms. Students will compose using professional digital software allowing full exploration of sound and texture. Students will produce their compositions using a variety of recording techniques.

Guideline for election: Successful completion of Music Technology or Music Theory or Permission of Instructor

889**PIANO I****Grades 9 – 12****2.5 Credits**

Piano class is designed for the beginner to intermediate student. Students work individually at their own pace with teacher supervision and instruction. Keyboards with headphones are provided. Topics covered include music reading skills, correct fingering and technique, and general musicality.

Enrollment in this course is open to any student.

898**PIANO II****Grades 9–12****2.5 Credits 2nd Semester**

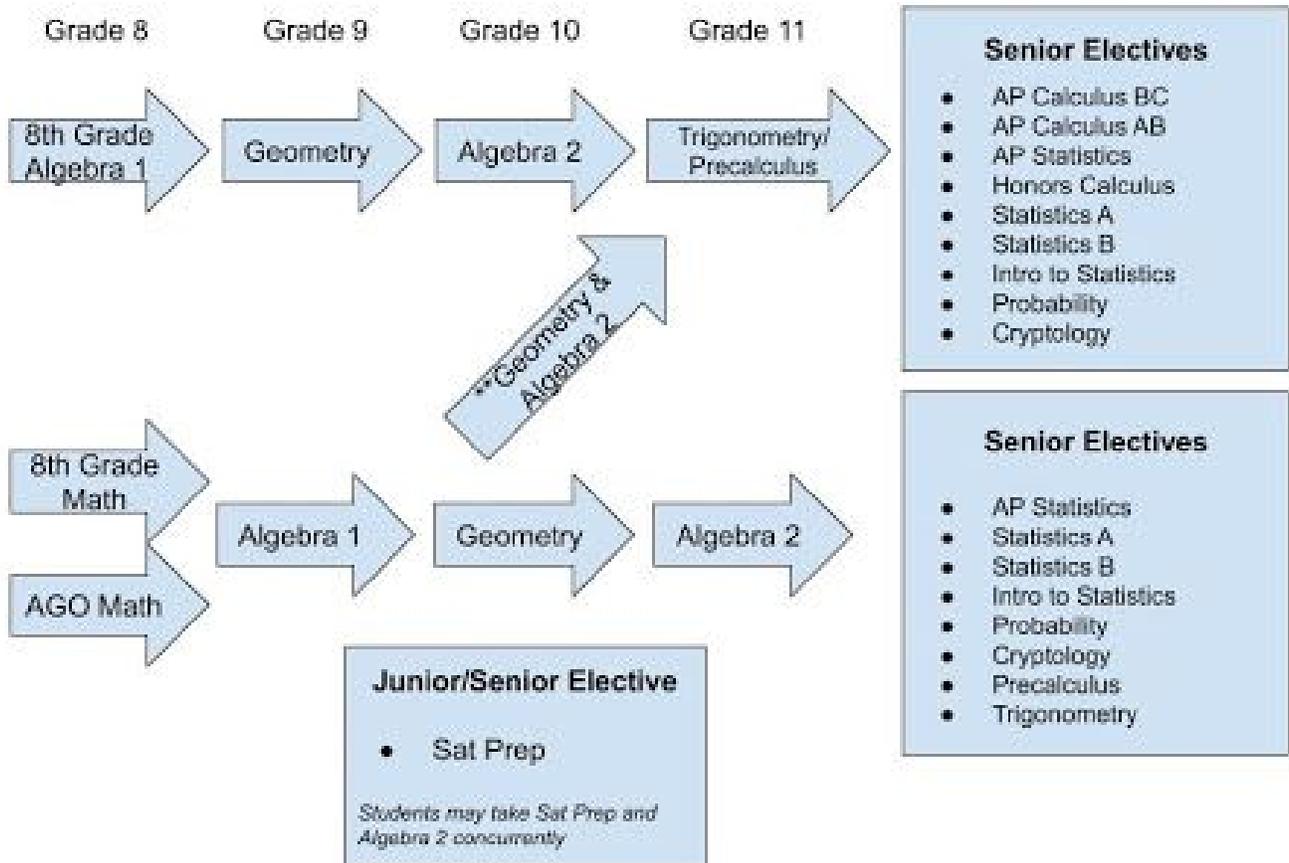
Piano II is open to any student successfully completing Piano I. The class allows students to work on music that challenges the student in technique and musicality.

Guideline for election: Piano I or permission of instructor.

899

MATHEMATICS

MATHEMATICS CURRICULUM SEQUENCE



**Students may take Geometry and Algebra 2 concurrently in their sophomore year if they would like to pursue a course in Calculus.

ALGEBRA I**Grade 9****5 Periods****5 Credits**

This course will formalize and extend the mathematics that students learned in the middle grades. Instructional time will focus on four critical areas: (1) deepen and extend understanding of linear and exponential relationships; (2) contrast linear and exponential relationships with each other and engage in methods for analyzing, solving, and using quadratic functions; (3) extend the laws of exponents to square and cube roots; and (4) apply linear models to data that exhibit a linear trend. A TI 83+ or TI84+ graphing calculator is required.

Level 1 - 411 Level 2 - 412**GEOMETRY****Grade 9-10****5 Periods****5 Credits**

This course will formalize and extend students' geometric experiences from the middle grades. Students explore more complex geometric situations and deepen their explanations of geometric relationships by presenting and hearing formal mathematical arguments. Instructional time should focus on six critical areas: (1) establish criteria for congruence of triangles based on rigid motions; (2) establish criteria for similarity of triangles based on dilations and proportional reasoning; (3) informally develop explanations of circumference, area, and volume formulas; (4) apply the Pythagorean Theorem to the coordinate plane; (5) prove basic geometric theorems; and (6) extend work with probability. A scientific calculator is required.

Guideline for election: Successful completion of Algebra 1.

Honors - 421 Level 1 - 422 Level 2 - 423**ALGEBRA II****Grades 10-11****5 Periods****5 Credits**

Building on their work with linear, quadratic, and exponential functions, students will extend their repertoire of functions to include logarithmic, polynomial, rational, and radical functions. Students will work closely with the expressions that define the functions, will become facile with algebraic manipulations of expressions, and will continue to expand and hone their abilities to model situations and to solve equations, including solving quadratic equations over the set of complex numbers and solving exponential equations using the properties of logarithms. Instructional time will focus on four critical areas: (1) relate arithmetic of rational expressions to arithmetic of rational numbers; (2) expand understandings of functions and graphing to include trigonometric functions; (3) synthesize and generalize functions and extend understanding of exponential functions to logarithmic functions; and (4) relate data display and summary statistics to probability and explore a variety of data collection methods. A TI 83+ or TI 84+ graphing calculator is required.

Guideline for election: Successful completion of Geometry or taking Geometry concurrently.

Honors - 431 Level 1 - 432 Level 2 - 433

TRIGONOMETRY / PRE-CALCULUS Grades 11 – 12 5 Credits

Precalculus combines the trigonometric, geometric, and algebraic techniques needed to prepare students for the study of calculus, and strengthens students' conceptual understanding of problems and mathematical reasoning in solving problems. Facility with these topics is especially important for students intending to study calculus, physics, and other sciences, and/or engineering in college. Focus will be in four critical areas: (1) extend work with complex numbers; (2) expand understanding of logarithmic, trigonometric and exponential functions; (3) use characteristics of polynomial and rational functions to sketch graphs of those functions; and (4) perform operations with vectors. A TI 83+ or TI 84+ graphing calculator is required.

Guideline for election: 85 or better in Algebra 2 or permission of instructor.

Honors - 441**ADVANCED PLACEMENT CALCULUS BC Grade 12 5 Periods 5 Credits**

This course is intended for students who have demonstrated superior proficiency in mathematics. This course is the equivalent of two semesters of college Calculus. The course will follow the College Board syllabus for AP Calculus BC and includes differential and integral calculus. Details about the course content can be found by accessing The College Board website. A TI 83+ or TI 84+ graphing calculator is required. Students are prepared for and required to take the Advanced Placement Examination in May.

Guideline for election: 85 or better in Honors Trig/Pre-Calculus or permission of instructor.

AP – 450**ADVANCED PLACEMENT CALCULUS AB Grade 12 5 Periods 5 Credits**

This course is the equivalent of one semester of college Calculus. The course is fast-paced with a curriculum dictated by The College Board. The course will follow the College Board syllabus for AP Calculus AB and includes differential and integral calculus. Details about the course content can be found by accessing The College Board website. A TI 83+ or TI 84+ graphing calculator is required. Students are prepared for and required to take the Advanced Placement Examination in May.

Guideline for election: 85 or better in Trigonometry/Pre-Calculus or permission of instructor

AP - 451**CALCULUS HONORS Grade 12 5 Credits**

This course covers most of the same topics that are present in Calculus AP but at a slower pace and without trigonometry. Topics studied include continuity, limits and their properties, differentiation and its applications and integration and its applications. These topics are studied using algebraic, exponential and logarithmic functions. Students selecting this course should understand that a lot of time and effort are required for success. This course is excellent preparation for students who intend to study Calculus (without trigonometry) in college. A TI 83+ or TI 84+ graphing calculator is required.

Guideline for election: 85 or better in Trigonometry/Pre-Calculus Level 1 or 75 or better in Trigonometry/Pre-Calculus Honors.

Honors - 452

AP STATISTICS**Grades 11-12****5 Credits**

This course is equivalent to a one semester, introductory, non-calculus-based, college course in statistics and will introduce students to the major concepts and tools for collecting, analyzing and drawing conclusions from data. Students are exposed to four broad conceptual themes: exploring data, sampling and experimentation, anticipating patterns, and statistical inference and will be required to work independently and make statistical presentations. Technology will be used extensively in this course for data analysis collection and the simulation approach to probability. Students are prepared for and required to take the Advanced Placement Examination in May.

Guideline for election: 85 or better in Trigonometry/Pre-Calculus or Algebra 2 or permission of instructor.

AP- 474**PRE-CALCULUS****Grades 11 – 12****2.5 Credits**

Precalculus combines the trigonometric, geometric, and algebraic techniques needed to prepare students for the study of calculus, and strengthens students' conceptual understanding of problems and mathematical reasoning in solving problems. Facility with these topics is especially important for students intending to study calculus, physics, and other sciences, and/or engineering in college

Guideline for election: Successful completion of Algebra 2.

Level 1 - 442**TRIGONOMETRY****Grade 11-12****2.5 Credits**

This semester course is intended for those students who will not pursue the study of Calculus, but intend to continue on to college. The course will be an introduction to the elementary trigonometric functions, their graphs, and their practical applications and will help prepare students for the SAT. The topics covered will include trigonometric and circular functions; their inverses and graphs; relations among the parts of a triangle; trigonometric identities and equations; solutions of right and oblique triangles; and oblique numbers. A TI 83+ or TI 84+ graphing calculator is required.

Guideline for election: Successful completion of Algebra 2

Level 1 - 444 Level 2-443**MATHEMATICS of CRYPTOLOGY Grades 11-12****2.5 Credits**

This math elective will study the history, composition, design, use, and analysis of methods and systems used to encrypt and decrypt messages. This course covers classical cryptosystems from shift ciphers to the enigma machine. Digital signatures, secret sharing, and other techniques and methods of cryptology may be explored. Mathematical topics of probability, permutations, combinations, matrices, long division of polynomials, logarithms, and modular math will be used. Projects of coding and decoding will be a major aspect of the course. Guideline for election: Successful completion of Algebra 2.

Level 1 - 460

STATISTICS A**Grades 11-12****2.5 Credits**

In this course, students will learn all of the main concepts and the varied tools used in collecting, analyzing, and drawing conclusions from data. In addition, they will explore the patterns and rules encountered in using descriptive statistics, in applying inferential statistics, and in determining probabilities. Topics will include exploring and gathering data, models of distribution, describing relationships, designing studies, and touching upon probability. Students will explore how to effectively use the power of the graphing calculator to create, refine, and utilize statistical models. This course will end with a culminating project.

Guideline for election: Successful completion of Algebra 2.

Level 1-475**INTRO TO STATISTICS****Grades 11-12****2.5 Credits**

In this course, students will learn all of the main concepts and the varied tools used in collecting, analyzing, and drawing conclusions from data. In addition, they will explore the patterns and rules encountered in using descriptive statistics. Topics will include exploring and gathering data, models of distribution, describing relationships, and designing studies. Students will explore how to effectively use the power of the graphing calculator to create, refine, and utilize statistical models. This course will end with a culminating project.

Guideline for election: Successful completion of Algebra 2.

Level 2-476**STATISTICS B****Grades 11-12****2.5 Credits**

This course is a continuation of Statistics A. Topics will include random variables, sampling distributions, confidence intervals, population proportions and means, hypothesis testing, and inference for distributions. Students will explore how to effectively use the power of the graphing calculator to create, refine, and utilize statistical models.

Guideline for election: Successful completion of Statistics A.

Level 1-477**PROBABILITY****Grades 11-12****2.5 Credits**

This course covers the basic principles of the theory of probability and its applications. Topics include combinatorial analysis used in computing probabilities, combinations and permutations, conditional probability and independence of events; discrete probability; joint, marginal, and conditional probabilities; laws of large numbers.

Level 2 - 478**SAT PREP****Grade 11****5 Periods****2.5 Credits**

This course is designed to prepare students for the Mathematics section of the SAT. A variety of mathematical concepts will be reviewed. Test taking skills and practice tests will be an integral part of the course. A scientific calculator is required. First semester students should be taking the SAT in the spring, whereas second semester students should be taking the test in the fall.

480

SCIENCE DEPARTMENT

MISSION

The Science Department has revised the curricula of every Science course offered at North Attleboro High School. Our mission is to engage students in authentic learning experiences that will foster a passion for learning and a confidence to solve complex problems. Embedded within the curricula are several transfer goals:

Students will be able to independently use their learning to...

- Develop questions and define problems to conduct open-ended investigations to provide explanations and generate possible solutions.
- Generate and defend arguments to confront real-life science claims by collecting, interpreting, and analyzing data to make credible and informed decisions.
- Develop critical thinking patterns that promote problem-solving skills and promote best-practices in science and engineering: develop and use models; use mathematics and computational thinking; obtain, evaluate and communicate information effectively.

THE SCIENCE AND ENGINEERING PRACTICES

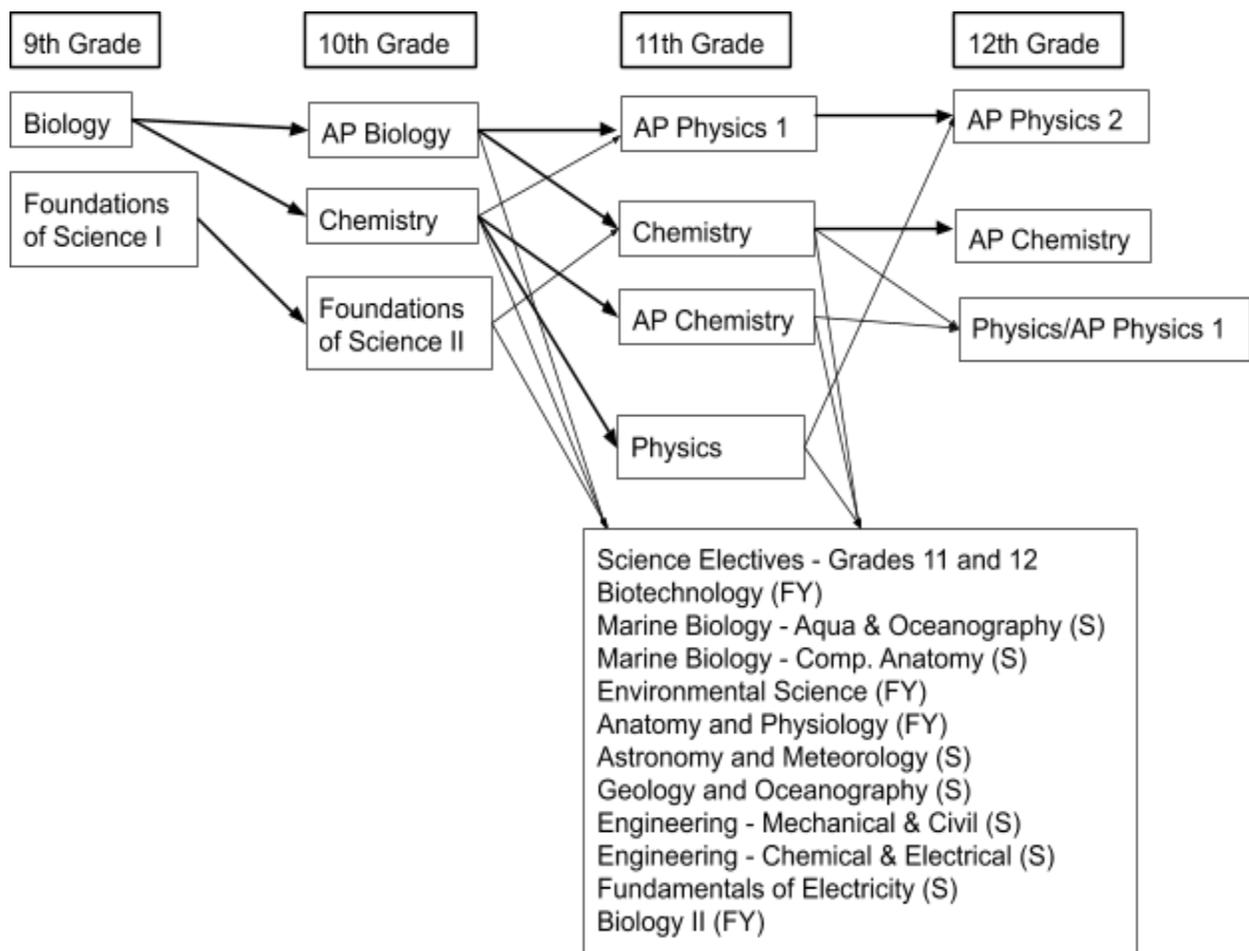
Science and engineering practices include the skills necessary to engage in scientific inquiry and engineering design. It is necessary to teach these so students develop an understanding and facility with the practices in appropriate contexts. The Framework for K-12 Science Education (NRC, 2012) identifies eight essential science and engineering practices:

1. Asking questions (for science) and defining problems (for engineering).
2. Developing and using models.
3. Planning and carrying out investigations.
4. Analyzing and interpreting data.
5. Using mathematics and computational thinking.
6. Constructing explanations (for science) and designing solutions (for engineering).
7. Engaging in argument from evidence.
8. Obtaining, evaluating, and communicating information.

LAB SCIENCES

All of the courses offered by the Science Department have a laboratory component and are thus considered to be lab sciences. The focus of the laboratory component of the courses will be on the practices of science, inquiry and the ability to record and analyze data. Students are expected to learn and comply with all safety standards for labs.

PATHWAYS OF STUDY



The Pathways depicted above are suggested paths and students may alter according to their interest and schedule flexibility. Students may double up their Science courses if their schedule allows. Students requesting courses not offered by the Science Department have the option to engage in Virtual High School.

COURSE OFFERINGS

FOUNDATIONS OF SCIENCE I Grade 9 5 Credits

This course is designed to cover the essentials of Chemistry and offer an introduction to some major concepts of Biology. It is the recommended freshman course for students who require a strengthening of their science background, reading comprehension and test taking skills. Students are supported with assistance with study skills, habits of mind and organizational skills. This course focuses on the practices of science, technology and engineering. Students selecting this course would typically take Foundations of Science II as a sophomore and would then take the Biology MCAS test during the spring of their sophomore year.

Level 2 - 503

GEOLOGY AND OCEANOGRAPHY Grade 10-12 2.5 Credits

Geology and Oceanography is a semester long, rigorous, college preparation course designed for college bound students. It is a comprehensive study of the processes and materials that make up planet earth. The Geology portion will study the dynamic relationship between composition and density of earth's crust by examining rocks, minerals, volcanoes, earthquakes, and plate tectonics in detail. Oceanography will be studied during the

second portion of semester 1. Students will learn about the formation, physical characteristics, and dynamic interactions of deep sea trenches, the mid ocean ridge, hydrothermal vents, seamounts, and other underwater features. Students will also learn about the importance of salinity and temperature as it relates to ocean currents. This course also focuses on the practices of science, technology and engineering.

Level 1 students will be expected to graph and analyze data as well as read and summarize high level reading scientific articles.

Level 1 - 511

Level 2 - 512

METEOROLOGY AND ASTRONOMY Grade 10-12 2.5 Credits

Meteorology and Astronomy is a semester long, rigorous, college preparation course designed for college bound students. Its focus is on atmospheric components that are influenced by earth's position in space. This includes the seasons, climate, and weather patterns. The astronomy portion indulges in the study of stars, galaxies, solar systems, dark energy, the big bang theory, and other conceptual topics from general relativity such as space-time. Lab activities, films, web research, graphing, and mapping enhance the topics covered in this course. This course also focuses on the practices of science, technology and engineering.

Level 1 students will be expected to graph and analyze data as well as analyze grade level articles and texts

Level 1 - 513

Level 2 - 514

BIOLOGY I Grade 9-10 5 Credits

Biology is the study of life. The course includes the following units of study: The Chemical Basis of Life, The Structural Basis of Life, Movement of Materials Into and Out of Cells, How Cells Harvest Energy, Photosynthesis, How Cells Divide, The Transmission of Genetic Information, The Chemical Basis of Genetics, Evolution, Taxonomy and Biodiversity, and Ecology. A survey of human anatomy and physiology will be applied to the units of study where appropriate and will include discussion of the human digestive, circulatory, nervous, endocrine, respiratory, excretory, reproductive and skeletomuscular systems. Numerous laboratory experiences will offer hands-on reinforcement of the topics covered in classroom discussions. This course also focuses on the practices of science, technology and engineering. The honors biology class will also cover topics in more depth in order to help prepare interested students for the AP Biology course.

Honors – 521 Level 1 - 522

Level 2 – 523

FOUNDATIONS OF SCIENCE II Grade 10-11 5 Credits

This course is the continuation of the Foundations of Science I course. It begins with a brief review of inorganic chemistry and a subsequent study of the important organic molecules found in living things. Topics that follow include cell structure and function, the cell membrane, cell respiration, photosynthesis, and cell division. The genetics component of the course incorporates a review of the genetic material and the mechanisms of inheritance. The year will end with a study of human biology, basic anatomy, evolution and ecology. Students are supported with assistance with study skills, habits of mind and organizational skills. This course also focuses on the practices of science, technology and engineering.

Level 2 - 524

BIOLOGY II Grades 11-12 5 Credits

This second course in biology is a continuation of the first year biology course and affords the student the opportunity to apply the skills and concepts learned in biology and chemistry to biological problems. The course is designed to challenge students and encourage critical thinking. Topics studied include biochemistry, nutrition, plants, microbiology, biotechnology, human systems, evolution, and ecology. Animal studies will include biodiversity, welfare, and policy. Current techniques in microscopy, genetics, biotechnology and computer-aided bioinformatics will also be explored.

Guidelines for Selection: Level 1 - 85 or better in Biology & Chemistry Level 2 – 75 or better in Biology & Chemistry

Level 1 – 551 Level 2 – 552

BIOLOGY (ADVANCED PLACEMENT/EEP) Grades 10-12 5 Credits

The AP Biology course is designed to be the equivalent of a two-semester college introductory biology course usually taken by biology majors during their first year. AP Biology includes those topics regularly covered in a college biology course for majors. The college course in biology differs significantly from the usual first high school course in biology with respect to the kind of textbook used, the range and depth of topics covered, the type of laboratory work done by students, and the time and effort required of students. The two main goals of AP Biology are to help students develop a conceptual framework for modern biology and an appreciation of science as a process. The ongoing knowledge explosion in biology makes these goals even more challenging. The course is structured into 14 Units that are framed around four major concepts, or Big Ideas: 1. The process of evolution drives the diversity and unity of life, 2. Biological systems utilize free energy and molecular building blocks to grow, to reproduce and to maintain dynamic homeostasis, 3. Living systems store, retrieve, transmit and respond to information essential to life processes, and 4. Biological systems interact, and these systems and their interactions possess complex properties. With the discussion of each of the individual units, students identify the connection of the specific topics with these four Big Ideas.

Prerequisite: Passing grade in Biology Honors, Level 1 or 2 (521, 522 or 523)

Guidelines for Selection: 80 or better in Honors Biology, 85 or better in Level 1 Biology, and 95 or better in Level 2 Biology

AP - 582

BIOTECHNOLOGY Grades 11-12 5 Credits

Biotechnology is a year-long course which provides entry-level as well as advanced training in biotechnology skills, methods and applications. Students will explore the fundamental principles of biotechnology and forensic science. Topics include recombinant DNA, production of biological molecules, bioprocessing, cloning, stem cells, genetic diagnostics, healthcare and pharmaceuticals, food processing (GMO's), energy and environmental management, and current events. Students also review employment and careers in the biotechnology and

biopharmaceutical industries. Laboratories include pipetting and measurement, solution preparation, DNA extraction and restriction digestion, gel electrophoresis, bacterial transformation and PCR. The laboratory-based class integrates the core competencies of the life sciences career pathway and physical sciences with the technical skills needed for postsecondary education and/or employment in the biotechnology industry. Participants in this course will also be required to regularly engage in and design their own inquiry based lab activities and report their results in detailed lab reports.

Honors Biotechnology students will be expected to complete an Honors Science Journal. This includes the completion of reading and writing assignments to be completed outside of class time.

Guidelines for Selection: 90 or better in Biology recommended for Honors, 80 or better in Biology recommended for level 1

Honors - 553 Level 1- 554

MARINE BIOLOGY - Aquaculture and Oceanography Grades 11-12 2.5 Credits

This semester long elective course is a general overview of Oceanography and Marine Science. It will begin with a project-based assessment in which students set up and maintain a healthy aquarium while learning about the reproduction and behavior of the South American cichlid. Physical properties of the ocean will be studied through the composition of seawater, geography of the ocean floor, waves, currents, and tides. Some biological properties of the ocean will be studied through food webs and marine environments. This course also focuses on the practices of science, technology and engineering.

Level 1 - 555

MARINE BIOLOGY - Comparative Anatomy Grades 11-12 2.5 Credits

This semester long elective includes a march through the phyla of marine organisms will be the basis of this course. Several dissections will take place to study anatomy as well as the evolutionary relationship with other marine organisms. Students will focus on comparing the circulatory, skeletal, and digestive systems. All students taking this class will be expected to take part in all dissections. This course also focuses on the practices of science, technology and engineering.

Level 1 - 556

ANATOMY AND PHYSIOLOGY Grades 11-12 Credits 5

Anatomy and Physiology is a comprehensive study of the external and internal structures and systems of the human body along with an understanding of how these structures and systems function. Microscopic examination of cells, tissues and organs will be utilized to provide the student with an understanding of the structure of body parts. This foundation will be used to study the function of various body systems including skeletal, muscular, nervous, digestive, circulatory, respiratory, urinary and reproductive. Selected organs and organisms will be used for dissection and study. This course is designed to prepare students for health related disciplines in a postsecondary education. This course also focuses on the practices of science, technology and engineering.

Guidelines for Selection: Students selecting Honors should have an 80 or better in Biology Honors, 90 or better

in Biology Level 1, or 95 or better in Biology Level 2. Students selecting level 1 should have a 70 or better in Biology Honors. 80 or better in Biology Level 1, or 90 or better in Biology Level 2.

Honors - 570

Level 1- 571

CHEMISTRY

Grades 10-12

5 Credits

Chemistry is the study of matter and the changes it undergoes. Topics covered in this Level 1 course include measurement, dimensional analysis, bonding, mole concept, kinetics, analyzing chemical reactions, equilibrium, thermodynamics, acid/base chemistry and oxidation/reduction reactions. Laboratory work is an important part of this course. Laboratory work is used to reinforce the concepts and ideas presented in lecture. This course also focuses on the practices of science, technology and engineering.

Guidelines for Selection: Students selecting honors should have an 85 or better in Algebra II. 85 or better in Biology Level 1, or 95 or better in Biology Level 2. Students should be aware that previous math skills are essential as the course is calculation based. The honors class will also cover topics in more depth. Students selecting Honors level will also be required to write extensive formal lab reports. Students selecting level 1 should have an 85 or better in Algebra I. 85 or better in Biology Level 1 or 2. Students should be aware that previous math skills are essential as the course is calculation based. Students in level 2 should expect a more student dictated pace and should have a passing grade in Biology.

Honors - 531

Level 1 - 532

Level 2 - 533

CHEMISTRY II (ADVANCED PLACEMENT/EEP)

Grade 11-12

5 Credits

This second course in chemistry concerns putting into laboratory practice those theories and ideas learned from chemistry and prepares the student for the Advanced Placement test. Students must take Chemistry before taking advanced placement chemistry. The Advanced Placement chemistry course is considered to be the equivalent of the general chemistry course usually taken during the first college year. This course also emphasizes the correct method of acquiring, recording and presenting data. Students in AP Chemistry should attain a depth of understanding of fundamentals and a reasonable competence in dealing with chemical problems. The course will contribute to the development of the students' abilities to think clearly and to express their ideas, orally and in writing, with clarity and logic. The AP course in chemistry differs qualitatively from the usual first secondary school course in chemistry with respect to the kind of textbook used, the topics covered, the emphasis on chemical calculations and the mathematical formulation of principles, and the kind of laboratory work done by students. Quantitative differences appear in the number of topics treated, the time spent on the course by students, and the nature and the variety of experiments done in the laboratory. In addition, as is the case with all college science courses, attendance must be a top priority, especially during laboratory sessions.

Prerequisite: Passing grade in Chemistry Level 1 or 2 (531 or 532)

Guidelines for Selection: 85 or better in Level 1 Chemistry and Algebra II.

AP – 561

AP PHYSICS 1 (ADVANCED PLACEMENT) Grades 11-12 5 Credits

AP Physics 1 is an algebra-based, introductory college-level physics course that explores topics such as Newtonian mechanics (including rotational motion); work, energy, and power; mechanical waves and sound; and introductory, simple circuits. Through inquiry-based learning and investigations, students will develop scientific critical thinking, problem solving and reasoning skills. No prior course work in physics is necessary. This course requires that 25% of the instructional time will be spent in hands-on laboratory work, with an emphasis on inquiry-based investigations that provide students with opportunities to apply the science practices.

Guidelines for Selection: Students should have completed geometry and be concurrently taking Algebra II or an equivalent course.

AP – 540

AP PHYSICS 2 (ADVANCED PLACEMENT) Grades 11-12 5 Credits

AP Physics 2 is an algebra-based, introductory college-level physics course that explores topics such as fluid statics and dynamics; thermodynamics with kinetic theory; electrostatics; electrical circuits with capacitors; magnetic fields; electromagnetism; physical and geometric optics; and modern nuclear physics with some basic quantum mechanics. Through inquiry-based learning and investigations, students will develop scientific critical thinking, problem solving and reasoning skills. This course requires that 25% of the instructional time will be spent in hands-on laboratory work, with an emphasis on inquiry-based investigations that provide students with opportunities to apply the science practices.

Prerequisite: Passing grade in AP Physics 1 or Physics Honors, Level 1

Guidelines for Selection: Student should have taken or be concurrently taking Pre-Calculus or an equivalent course.

AP - 541

PHYSICS Grades 11-12 5 Credits

This course is an introductory Newtonian mechanics course. It covers: kinematics in one and two dimensions, dynamic systems applying Newton's laws, conservation of energy, conservation of momentum, collisions, circular motion, and periodic motion. Students will gain a conceptual and mathematical understanding of the mechanics of our physical world. There will be several hands-on projects in this course in which students will apply physics concepts to create original works to solve problems.

Guidelines for Selection: Honors physics students will be required to maintain a detailed Lab Notebook chronicling a rigorous and frequent inquiry lab component to the class. It is recommended that you have at least an 80 in Algebra II Honors/Level 1 before taking this course. It is highly recommended to be enrolled in trigonometry while taking this course (or have completed trigonometry). For Level 1, It is recommended that you have at least a 75 in Algebra II Lv1/Lv2. For Level 2, this course will largely be conceptual with limited mathematics involved.

Honors - 542

Level 1 - 543

Level 2 - 543

FUNDAMENTALS OF ELECTRICITY Grades: 11-12 2.5 Credits

This is a semester long course is designed to introduce the basics of electricity. It will aim to present the material at a level that will examine the mathematical relationships involved without getting bogged down in overly complicated systems. The main objective is to promote basic competencies for students moving forward into our highly electrified world. Ideas are to be reinforced with inquiry based lab activities. Topics to be covered ; Charge, Voltage, Current, Resistance, Power, Ohm’s Law, Series and Parallel, DC Circuits, Capacitors, AC Electricity, Inductors, Electromagnetism, Motors, Generators, Transformers, Methods of Creating Electricity, and Home Wiring.

Level 1- 585

ENVIRONMENTAL SCIENCE Grades 11-12 5 Credits

Environmental Science is a rigorous, college preparatory course designed for college bound students. Students will study climate change through a comprehensive and insightful unit comprised of research, graph/data analysis, film, and project based learning. With the conclusion of climate change, students will have the background knowledge to learn about other topics as the year progresses such as the loss of biodiversity, human population growth, human health as it pertains to toxicology, food/agricultural practices, and future sustainability.

Through each unit, students will learn how human activity and choices are changing our world. They will focus on the relationships between biological and physical sciences. Students will focus on the development of skills in analyzing environmental problems, communicating about research, working independently and co-dependently, and problem solving. This course also focuses on the practices of science, technology and engineering.

Honors environmental science students will be expected to participate in the science fair. This is an independent component to the course and all science fair work is to be completed outside of class time. The environmental science honors class will also cover topics in more depth. Students will be expected to have the research skills needed to research, organize, and present high quality scientific information in order to communicate information to an audience.

Honors - 591 Level 1 - 592

ENGINEERING - Civil and Mechanical Grades 11-12 2.5 Credits

Intro to Engineering (Civil and Mechanical) is a high school-level course of engineering aimed at grades 11 and 12. The course exposes students to some of the major concepts that they may encounter in a college engineering course. In this project-based class students have an opportunity to investigate engineering and high tech careers by exploring concepts such as: energy and power, materials and structures, statistics, and kinematics.

Engineering gives students the opportunity to develop skills and understanding of core concepts of engineering with an activity, project, and problem-based learning approach. Students will apply this approach while, challenging themselves to hone their collaborative skills and creative abilities.

This course is homogenous, so all students will complete the same in class projects. Honors students will be expected to develop an independent solo research project in addition to keeping an engineering journal. Level 1 students must keep an engineering journal and write an engineering final paper. Level 2 students must keep an engineering journal.

Honors - 579 Level 1 - 577 Level 2 - 578

ENGINEERING - Electrical Grades 11-12 2.5 Credits

Intro to Engineering (Chemical and Electrical) is a high school-level course of engineering aimed at grades 11 and 12. This course is designed to introduce students to a wide range of concepts in our electronic and digital world. Topics included are: electrical circuits and components, microcontrollers, computer programming, and robotics. Engineering gives students the opportunity to develop skills and understanding of core concepts of engineering with an activity, project, and problem-based learning approach. Students will apply this approach while, challenging themselves to hone their collaborative skills and creative abilities.

This course is homogenous, so all students will complete the same in class projects. Honors students will be expected to develop an independent solo research project in addition to keeping an engineering journal. Level 1 students must keep an engineering journal and write an engineering final paper. Level 2 students must keep an engineering journal.

Honors - 589 Level 1 - 587 Level 2 - 588

ENGINEERING PATHWAY CAPSTONE PROJECT DESIGN Grade 12 2.5 Credits

Capstone Project Design is the culmination of an Engineering Pathway student’s study which allows students to demonstrate they have met the learning goals of the pathway. The course teaches the engineering design cycle, beginning with the conceptual planning and review phases of an engineering project. The course introduces technical methods for analyzing, designing, prototyping, synthesizing, troubleshooting, and testing to solve “real world” problems while working in conjunction with a local business partner.

The overall objective of this course is to give students a design experience that is as close to real life as is practicable in a high school setting.

Course objectives include:

Students will learn how an engineering project works, including its systems, its standards, and its practices.

Students will work as an integral member of a design team.

Students will document the experience using self-reflections, journaling, progress reports and a final report/presentation.

Students will Complete a minimum of 100 hours of project work and/or workplace experience.

Students will work on individual projects of their choice. Students will consult with a local business partner.

Students will meet with a faculty member at the beginning of the semester to propose a project; work on the project during class time or during workplace experience opportunities; and present the project at the end of the semester. Student success criteria will be established by the course instructor and program director. This course is a semester-long course during the final year of the pathway.

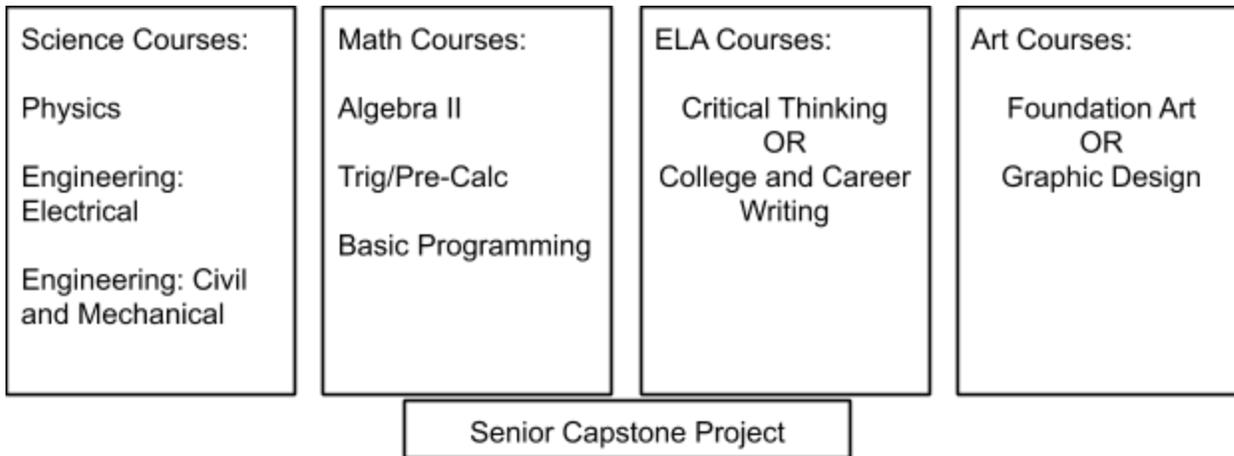
595

General Pathway Description

Engineering: Design and Fabrication Pathway

Students will be offered access to a curriculum that fosters the necessary skills and learning experiences for a future career in the field of Engineering. In addition to the general graduation requirements of NAHS, this pathway represents a series of required courses that a student will take in order to receive a pathway designation on their high school diploma. As part of the pathway, students must engage in at least one AP course in any discipline before they graduate. Students will also participate in a number of relevant certification programs as part of the pathway. The pathway concludes with a senior capstone project course that requires 100 hours of project work and workplace learning experiences with local employer partners.

Required Courses:



Certification Programs:

OSHA Safety
Makerbot 3D Printing

BUSINESS & TECHNOLOGY DEPARTMENT

The Business Department of North Attleboro High School is dedicated to preparing students for a rapidly changing world by expanding each student's knowledge and skills in business, computer and information technology. We believe the knowledge, 21st century skills and ethics taught are necessary for active, life-long participation in a global, informational society—fostering success in one's personal life, college study and career choice.

BUSINESS

The business courses provide the essential basics for the development of skills and abilities to help students realize their potential fully. Individuals come in contact with and are affected by business through their daily experiences and/or efforts to make a living. Therefore, all students will benefit by studying subjects offered by the Business Department. Students will find that the business courses they have taken will broaden their background and will give them a foundation on which to build their college career.

INTRODUCTION TO BUSINESS Grades (9-12) 2.5 Credits

This two and a half credit, semester course provides the foundational knowledge needed to succeed in upper level business courses. You will gain experience and develop transferable skills in a variety of business-related topics and tasks. Students are exposed to fundamental economic principles and will learn about the roles of both business and consumers in our Free Enterprise system. You will be introduced to entrepreneurship and business management, customer service, marketing, basic financial management and record keeping, and will also be introduced to multiple business applications through Google Suite. Students will learn through researching, problem-solving, application, demonstrating, recording and reporting.

Level 2 - 610

ENTREPRENEURSHIP Grades 11-12 2.5 Credits

Have you ever wanted to own your own business? Students will design and develop original business plan or blueprints. Emphasis will be placed on planning, organizing, developing, and managing the daily operations of a business. In addition, students will learn the various marketing functions and apply them to their business. Topics will include ethics, social responsibilities, skills, and characteristics that are essential in order to become a successful entrepreneur. By the end of the semester, students will demonstrate the knowledge and skill-set needed to start a business.

Level 1 - 620

ACCOUNTING I Grades 9-12 2.5 Credits

Accounting, often referred to as “the language of business,” is presented in a series of steps from simple to complex, introducing the student to the basic requirements of all accounting systems. The skills presented help to develop essential business documents; such as the balance sheet and income statement, which are useful to the business, investors, economists, and the general public. Each logical step in the accounting process is presented, drilled, and summarized and related to the previous step to introduce the student to a flow of information called the accounting cycle. Though students work daily with numbers, an ability to follow

step-by-step instructions is more essential than advanced knowledge in math. Simple addition, subtraction and division skills are the only math requirements. Completion of Accounting I not only provides the skills to complete basic tasks required of the accounting clerk, but introduces the serious student to a knowledge of the fundamentals required to operate any business financially. The careers available in accounting become apparent as every aspect of the course is related daily to actual business world experience.

Level 1 – 627

SPORT and ENTERTAINMENT MARKETING Grades 9-12 2.5 Credits

This interactive course will offer students a step-by-step journey through the world of Sports and Entertainment Marketing. The students will learn the basic functions of marketing and then apply them to sports and entertainment. Trips to local sporting venues will be used to enhance student learning as well as Sports Marketing simulation software. Through use of the software, students will work in teams and will market the franchise in that city as they develop promotional campaigns, and organize concerts among many other decisions.

Level 1 - 630

PERSONAL FINANCE Grade 11-12 2.5 Credits

This course is a comprehensive study of personal financial literacy designed for the college-bound and career-oriented student. Students learn how to make informed financial decisions related to budgeting, banking, credit, insurance, taxes, and career exploration. An integral component of the financial literacy curriculum is the application of decision-making skills that enables students to become more responsible consumers for lifetime success.

Level 2 – 641

COMPUTER SCIENCE

Computer Science courses help prepare the student for a world where technology will play an increasing role in their lives. Each course is designed to be “hands-on”, allowing the student to acquire the necessary skills to be proficient. Assignments are primarily done in-class, at a computer, but students must be prepared to spend time outside of class if needed.

BASIC PROGRAMMING I Grades 9-12 5 Periods 2.5 Credits

The CodeHS introduction to computer science curriculum teaches the foundations of computer science and basic programming using JavaScript, with an emphasis on helping students develop logical thinking and problem solving skills. Students will create a wide variety of interactive media projects such as animations, stories, games and more. Whether you wish to create programs for your own use or are considering a career in programming, this course will help you get started and help you to achieve your goal.

Level 2 – 648

BASIC PROGRAMMING II**Grades****9-12****5 Periods****2.5****Credits**

Building on the knowledge acquired in Basic I, the student will create complex programs that solve real-world problems. Using advanced tools such as decision-making code, the student can design solutions with different possible outcomes. Other advanced topics include menus, procedures, functions, and arrays.

Guideline for election: Basic Programming I.

Level 1 - 650**VIDEO GAME DESIGN****Grades 10-12****2.5 Credits**

Video Game Design is a rigorous course designed for those familiar with the basics of JavaScript. The course is highly visual, dynamic, and interactive making it engaging for new coders. Students will combine many concepts of computer science to build several of their own games from scratch using JavaScript.

Guidelines for election: successful completion of Basic Programming.

Level 1 – 656**INTRO TO COMPUTER SCIENCE IN PYTHON I****Grades 10-12****2.5 Credits**

The CodeHS Introduction to Computer Science in Python course teaches the fundamentals of computer programming as well as some advanced features of the Python language. Students will develop an appreciation for how computers store and manipulate information by building simple console-based games. The entirely web-based curriculum is made up of a series of learning modules that cover the fundamentals of programming. Each module is made up of short video tutorials, example programs, quizzes, programming exercises, challenge problems, and unit tests.

Guidelines for election: successful completion of Basic Programming.

Level 1- 658**WEB PAGE DESIGN PART I****Grades 9-12****2.5 Credits**

The World Wide Web is THE communication medium for the 21st Century, and HTML is the language of the World Wide Web. This course will give the students the skills to apply the most important topics of HTML (Hypertext Markup Language). Students will work individually and in teams, creating documents that combine good writing and layout techniques, along with critical thinking skills. The students will be assessed by their ability to use HTML to its full potential. Each student will build an individualized portfolio composed of business and academic applications. Troubleshooting activities will be used to improve the students' problem-solving skills. The student will learn the programming basics behind the creation of Web pages. The course will teach the students the fundamentals of why the Web works and how Web sites and Web graphics are designed. Students will experience hands-on activities to sharpen their skills. A good basic foundation of HTML now can help students to become more web-literate and more web-productive later. Students will practice their writing skills in a Web-based environment.

Level 2 – 660**WEB PAGE DESIGN PART II****Grades****9-12****2.5 Credits**

This course will complete the skills developed in Part I by an advanced exploration of the creation of more complicated Web pages. Students will learn to manipulate their HTML created web pages by using the language of JAVA. JAVA will enable the student to add sophisticated graphical enhancements to their creations. In this course the students will continue their study by learning about CGI scripts; creating online

YEARBOOK / DESIGN STUDIO

Grades 9-12

2.5 or 5 Credits (Computer)

Students will work in a true studio environment to design the NAHS yearbook as well as print and web products for community-based clients. Clients will submit jobs and students will work to complete the jobs in a timely and professional manner. Industry-standard software (Adobe Photoshop, Illustrator, and InDesign) will be utilized to design yearbook spreads as well as posters, brochures, business cards, web graphics, and more. Students will gain a working knowledge of graphic design, writing, and photography best practices. Ideal for creative-minded students who want to gain skills in digital design and publishing.

YEARBOOK / DESIGN STUDIO Section 1: Semester – Level 1 - 870 (2.5 credits)

YEARBOOK / DESIGN STUDIO Section 2: Full Year – Level 1 - 871 (5 credits)

VIRTUAL HIGH SCHOOL**VIRTUAL HIGH SCHOOL****Grades 9-12****2.5 Credits**

Virtual High School (VHS) offers a variety of academic options to students with either semester or full year courses. While the class is scheduled into the student's regular academic day, it offers the flexibility to access the class anywhere, any time, the student has access to a computer and the Internet. The class is intended for enhancement, meaning not to replace any graduation required class. The primary focus is to afford students the opportunity to experience a course or topic that is not offered at NAHS. Upon signing up for a VHS course, students must register with the school's VHS coordinator in the guidance office, and is on a first come, first served basis.

WELLNESS

The North Attleboro High School Wellness Department provides a comprehensive, sequential wellness program, which promotes lifelong learning and wellness for all students. This comprehensive program, which is central to active learning, will teach fundamental health concepts, promote the development of health habits and behaviors that enhance wellness, and guide efforts to build healthy lifestyles, families, school and communities. This comprehensive program incorporates the standards of the Massachusetts Health Education Frameworks and the National Health Standards.

WELLNESS 1

Grade 9

2.5 Credits

This course is designed to acquaint the student with the main aspects of a wellness lifestyle. Students are encouraged to identify, reinforce, and defend their attitudes about a wellness lifestyle, nutrition, and all forms of substance abuse. The information is intended to assist students in making productive decisions regarding personal health. Emphasis is placed on accepting personal responsibility for physical and mental well-being.

914

WELLNESS 2

Grade 10

2.5 Credits

This required course is a continuation of Wellness I. The topics covered include cardiovascular disease, cancer, stress management, mental health/disorders, and HIV/AIDS. Emphasis is placed upon the role of the individual as a person responsible for his/her own well-being.

916

CONCEPTS AND SKILLS IN HEALTH CAREERS Grade 11-12 2.5 Credits

This course is designed for students in grades 11-12 who are interested in exploring health-related occupations. Learning will focus on the development of basic knowledge and skills required in the health profession. Students will receive hands-on training in first-aid, CPR, AED, emergency care, the diagnosis, treatment and rehabilitation of injuries, and many other basic skills used by medical professionals including nurses, doctors, EMT's, therapists and athletic trainers. A variety of guest speakers will be utilized to introduce students first hand to the multitude of careers in the health care system in general and how these services are delivered and financed.

Level 1 – 932

LIFETIME SPORTS**Grades 11-12****1.25 Credit**

This class is designed to encourage and motivate North Attleboro students to maintain a healthy lifestyle now and for the future. The units offered are designed to instruct the student in activities that will provide a foundation for a healthy, physically active lifestyle in individual, dual and group activities including tennis, disc golf, badminton, spikeball, volleyball and more. At the end of this course students will have the knowledge and skill level to continue activities throughout life.

920**PLT4M CONDITIONING/PERSONAL FITNESS****Grades 11-12****1.25 Credit**

Course Description: Using Plt4m Digital Technology students will customize and develop a personal fitness program managed through a blended online platform application. Students will track and analyze functional gains in strength, flexibility and stamina. The essential skills and knowledge gained from this class will transfer and support the student's effort to maintain a healthy lifestyle long after their high school experience.

919**CONTEMPORARY FITNESS****Grades 11-12****1.25 Credit**

Course Description: The purpose of this course is for students to gain confidence, knowledge and a better understanding of one's own fitness. Student will take part in Yoga, Dynamic Yoga, Body Weight Fitness, Circuit Training and Fitness Walking as they progressively work to increase flexibility, endurance, muscular balance as it pertains to one's health and well being. At the end of this course students will be able to create a progressive workout program for lifelong fitness benefits.

918**UNIFIED PHYSICAL EDUCATION****Grades 11-12****Credits 1.25**

This course is open to juniors and seniors. Students must receive permission from the physical education staff as well as the Special Education Department to elect this course. Under the supervision of the physical education department, students of all abilities will participate in developmentally appropriate activities including lifetime activities, physical fitness and sports. Students will work together to increase competence and confidence in a variety of physical activities. Through ongoing leadership opportunities, members of this course will be empowered to help create a more inclusive and accepting school environment for all students.

923**SCHOOL TO WORK PROGRAM****SCHOOL TO WORK PROGRAM****Grades 10 – 12****2.5 to 5****Credits**

The School to Work Program is designed for students who require a more hands-on experience as part of their education. Typically, students have academic classes in the morning, and leave school to go to work for one or two periods at the end of the school day. Students who have obtained paid positions in the community or internship opportunities can meet with the Guidance Counselor or the School to Career Specialist to schedule this program and earn credits. In order to be eligible, students must maintain passing grades in all subjects. In addition, students' work readiness skills must be at a level appropriate for placement at a community worksite. This is a semester course.

974

MATH IV**Grade 12****5 Periods****5 Credits**

This course builds upon skills taught in previous math courses. Individual and small group instruction are employed. Among the topics presented are graphing in the coordinate plane, use of tables and graphs, probability and statistics, special triangles, and geometry and measurement.

Level 3 – 945**SCIENCE****SCIENCE I****Grade 9****5 Periods****5 Credits**

This course provides a modified science curriculum, and focuses on matter, energy and the changes in matter and energy in the first semester. During the second semester, topics focus on biological principles and concepts. This course is for students who require a resource setting for science. This is the first of a two-part preparation for the Biology MCAS. A variety of hands-on experiences will be provided.

Level 3 - 946**SCIENCE II****Grade 10****5 Periods****5 Credits**

This course provides a modified science curriculum and focuses on biology for students who require a resource setting for science. This is the second of a two-part preparation for the Biology MCAS. A variety of hands-on experiences will be provided.

Level 3 – 947**SCIENCE III****Grade 11****5 Periods****5 Credits**

This course provides a modified science curriculum and focuses on Human Biology concepts for students who require a resource setting for science. Emphasis is on students' learning science as they encounter it in their daily living. A variety of hands-on experiences will be provided.

Level 3 – 948**HISTORY AND SOCIAL STUDIES****WORLD HISTORY I****Grade 9-12****5 Periods****5 Credits**

This course closely follows the course description in the Social Studies section of this Program of Studies, covering events from 500 A.D. to 1800 A.D. Individualization is provided according to the student's I.E.P. Requirements of this course include note-taking and organizational skills, a research paper and unit tests. Students will be expected to complete homework assignments.

Level 3 - 949

U.S. HISTORY I**Grade 9-12 Periods****5 Credits**

This course provides a study of early American history from 1763-1877. Requirements include note-taking, a research paper, and unit tests. Homework is an integral part of the course.

Level 3 - 950**U.S. HISTORY II****Grade 9-12 Periods****5 Credits**

This course begins with a study of the U.S. from 1877 to the present. It reviews the forces and events that helped shape modern America. Requirements include note-taking, a research paper and unit tests. Homework is an integral part of the course.

Level 3 – 952**CIVICS****Grade 12 Periods****2.5 Credits**

This course is primarily for students who require a small class setting and who have completed World History and

U. S. History requirements. It provides an overview of modern democratic government in the United States and will include a study of the U. S. Constitution, the Bill of Rights and an examination of the executive, legislative and judicial branches of government. Requirements include note taking, a research paper and unit tests. Homework is an integral part of the course.

Level 3 – 968**CONTEMPORARY ISSUES****Grade 12 Periods****2.5 Credits**

This course is primarily for students who require a small class setting and who have completed World History and

U. S. History requirements. The course provides students with the opportunity to investigate and discuss issues in today's world. Various forms of the media will be used to generate topics for discussion. Requirements include note taking, a research paper and unit tests. Homework is an integral part of the course.

Level 3 - 970**BUSINESS****PERSONAL FINANCE****Grade 11-12****5 Periods****2.5 Credits**

This course is a comprehensive study of personal financial literacy designed for the college-bound and career-oriented student. Students learn how to make informed financial decisions related to budgeting, banking, credit, insurance, taxes, and career exploration. An integral component of the financial literacy curriculum is the application of decision- making skills that enables students to become more responsible consumers for lifetime success.

Level 3- 953

SUBSTANTIALLY SEPARATE PROGRAMS

PATHWAYS PROGRAM

Grades 9-12

The Pathways Program serves students with social-emotional barriers, providing a highly structured, safe and therapeutically supportive environment that focuses on academic achievement. These students share a common denominator of emotional vulnerability and social-emotional concerns that impact learning. Depending upon the needs of the student, program support may range from one period to full days with the option for flexible scheduling. For students who are mainstreamed, there exists an on-going, effective communication network between regular and special education staff. The program can foster up to 12 students at one particular time. Both students and staff are working towards building social-emotional confidence, academic mindsets and stability within their mental and physical health.

ACCESS PROGRAM I and II

Grades 9-12

The Access Programs, I, II are designed especially for students who require a substantially separate learning environment where the emphasis is on the development of appropriate social behaviors, managing anxiety and stress, transitional skills, and work related behaviors and training. English, Math, History and Science focus on the core curriculum for these subjects, teaching the most pertinent information in a multitude of learning styles with modification as needed and accommodations according to the students' individual needs. Preparing the student for MCAS is an important part of the grade 9 and 10 curriculum. Counseling is a strong component of this program.

As juniors and seniors, a strong emphasis is placed on post-secondary transition skills and opportunities. Students participate in activities both in the classroom and out in the community that help them prepare for their transition from high school into post-secondary environments. An emphasis is placed on the development of skills that can be generalized into other environments after graduation to help students realize success.

LEARNING CENTER PROGRAM

Grades 9 – 12

The Learning Center Program is designed for students who require extensive support throughout high school and in preparation for adulthood. The curriculum focuses on the development of skills essential to maximize each student's potential for independence: basic academic skills, functional daily living skills, social and self-advocacy skills, and vocational skills.

Each student's program will be designed based upon the decisions made during their TEAM meeting. Typical program would include: English Language Arts, Math, practical Science, Practical Social Studies, Transitional Life Skills, Wellness, and Vocational Skills.

Students will not be required to complete NAHS graduation requirements but all opportunities for supported inclusion will be encouraged. Most students will complete an MCAS Alternate Assessment and will earn a Certificate of Attainment at graduation rather than a traditional diploma.

TRANSITION PROGRAM

Grades 9-12

The Transition Program is designed especially for students who require a self-contained program in order to be successful in passing academic classes, maintaining appropriate behaviors and making progress toward meeting graduation requirements. Counseling is an integral component of the program. Eligible students may participate

in the School to Work Program.

PRE-VOCATIONAL TRAINING

Prevocational Skills Training

Grades

9-12

5 Periods

2.5 Credits

This one-semester course introduces employment and career topics to students receiving special education services. The course provides students with the opportunity to explore their interests, values and skills and how they relate to post-secondary education, occupations and successful employment. The course addresses basic skills for getting and keeping a job such as applications, interviewing, references, student labor laws, and work permits, employer expectations and job retention strategies. Upon successful completion of the course, students may be recommended for participation in the School-to-Work Program.

958 I

GROUP GUIDANCE

The Group Guidance Seminars are classroom lessons designed to developed students' competencies in the areas of social-emotional, academic and college and career readiness. Guidance Counselors meet with students by grade level one period per week for one quarter as described below. Students who successfully participate will be awarded .5 credits; however, students who do not achieve a credit status do not repeat the course, nor is successful completion a graduation requirement.

GROUP GUIDANCE

Grade 10

1 period/week Term 2

.5 Credit

The focus of the sophomore guidance seminar is to introduce the students to career exploration activities. An emphasis will be giving to activities that will explore strengths, values and aptitudes in the decision-making process of college and career planning. The students will learn how to strengthen their academic profile to be college and career ready.

GROUP GUIDANCE

Grade 11

1 Period/Week Term 3

.5 Credit

The focus of the junior guidance seminar is to increase the student's understanding of the process of applying to college, finding the right fit for college and career options, with an emphasis on the development of a strong activities profile, to be included with both the college or job applications Students will utilize online resources to support their college and career research.

GROUP GUIDANCE

Grade 12

1 Period/Week Term 1

.5 Credits

The focus of the senior guidance seminar is to assist the students complete a post-secondary plan whether is college, job or the military. The students will participate in activities that will include: the common application, standardized testing, college essay, letters of recommendation, resume, interviews, financial aid, scholarships and other online resources.