

**CHRISTINA**  
SCHOOL DISTRICT

— 2020-2021 —

# COURSE CATALOG

Christiana High School

Glasgow High School

Newark High School

Sarah Pyle Academy

[christinak12.org](http://christinak12.org)



TOGETHER, EDUCATING EVERY STUDENT FOR EXCELLENCE

## **ABOUT THIS GUIDE**

This guide includes information on the Christina School District's three traditional high schools, Christiana High School (CHS), Glasgow High School (GHS) and Newark High School (NHS), along with Sarah Pyle Academy. For information on Christina's other educational options, please visit [christinak12.org](http://christinak12.org).

## **NOTICE**

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# HIGH SCHOOLS REIMAGINED

At Christina School District, we recognize the importance of providing high school pathways that align with postsecondary education offerings and industry trends. Therefore, we've reimaged our high schools and added several new pathways and courses

## CHRISTIANA HIGH SCHOOL

- Expanded Animal Science Pathway, now called Animal Science & Management Pathway, with three courses in Foundations of Animal Science, Growth and Development of Domestic Animals and Domestic Animal Management
- Plant Science Pathway with three courses in Foundations of Plant Science, Plant and Soil Systems and Plant Systems Management and Sustainability
- Agricultural Power and Engineering Pathway with three courses in Fundamentals of Agricultural Power and Engineering, Agricultural Welding and Fabrication, and Power and Mechanical Systems
- Allied Health Pathway with three courses in Fundamentals of Health Sciences, Essentials of Health Careers, and Anatomy and Physiology
- Public & Community Health Pathway with three courses in Fundamentals of Health Sciences, Essentials of Public & Community Health, and Personal Wellness
- Advanced Academic Program: The Honors/ Dual Enrollment Academy at Christiana high School provides a framework for students to pursue advanced course offerings while also providing each individual with a comprehensive transcript when applying for competitive college admissions and scholarships. Students have the opportunity to earn up to 24 college credits during their high school years creating a seamless transition from high school to college and potentially saving up to one year of college tuition costs.

## GLASGOW HIGH SCHOOL

- NAF Academy of Business Information Management Pathway with three courses in Business Information Technology, Global Business Economics and Entrepreneurship
- K-12 Teacher Academy Pathway with three courses in Human Growth and Development, Teaching as a Profession, and Fundamentals of Curriculum and Instruction
- NAF Academy of Finance Pathway with three courses in Fundamentals of Finance, Principles of Accounting and Financial Services
- New Marketing Pathway
- New Fashion & Apparel Pathway
- Advanced Academic Program: The Early College Academy at Glasgow High School is designed for students who are looking to challenge themselves by participating in a rigorous academic program. Through a partnership with Wilmington University, Glasgow High School will offer dual enrollment courses. Students earn high school credit, as well as college credit for each successfully completed course.

## NEWARK HIGH SCHOOL

- Expanded Performing Arts Pathways, with options that include Choral Music Pathway, Instrumental Music Pathway and Theater Pathway
- Digital Communications Pathway with three courses in Foundations of Digital Design, Processes of Digital Design and Applications of Digital Design
- Engineering (PLTW) Pathway
- Advanced Academic Program: The Cambridge Academy at Newark High School is a rigorous and advanced academic line of coursework that is taken in place of the traditional honors courses needed for graduation and prepares students for AP courses.

# PLANNING & SCHEDULING

## COURSE AVAILABILITY

All courses and offerings listed in this guide are subject to changes in availability based on interest expressed by the student body during the spring course request period. It is likely that some courses mentioned in this guide will not be held if the number of students requesting a course is low.

Although every effort is made to accommodate students' course requests, they may be required to select between courses that present a conflict within their schedule. If this occurs, students are encouraged to speak to their parents and seek advice from their school counselor to review options for resolving these issues.

## COURSE SELECTION

School counselors will provide course selection materials to high schoolers typically in March and April. Students use the materials to plan courses for the next year. Each student will meet with their school counselor and the student will plan to schedule courses for the next year. The information gathered at these times will be used to make decisions related to the courses that will be scheduled, the number of sections and the resources allocated in each area.

### COURSE SELECTION PROCESS

- Counselors deliver course selection materials to students in class, for students to review.
- Students discuss course options with parents, teachers and counselors.
- Students choose a full schedule.
- Students meet with their counselor individually to finalize selections.

Please contact your school counselor if you have any questions about the course selection process.

## SCHEDULE CHANGES

Students are expected to request and verify appropriate course selections in the spring and request any schedule changes immediately after receiving their schedule in the fall.

Schedule changes may be made during the school's drop / add window without a penalty. Dropping a course after the drop / add window will result in a Withdrawal F for that marking period and an F for additional mark reporting cycles. This grade will impact student GPA calculations.

When considering schedule changes, students should make an appointment with their school counselor to review options and to complete the course change request process.

## CHANGING A COURSE LEVEL

Students may request a change in course level with parent and administrator approval. The grade determination for lowering a course level will be made at the time of the change in level. Please see page 6 for more information about course levels.

## CREDIT RECOVERY & DISTANCE LEARNING

The Christina School District offers a unique distance learning program to students to earn credits. The program gives students access to courses required for high school graduation. This web-based program utilizes instructional technology to promote self-paced mastery. This allows students to earn credits quickly while still meeting content standards. Learning is accelerated by personalized computer-assisted instruction. Once a student has completed a course, he / she can immediately begin the next one. In most courses, the students can earn exemption by taking a pre-test at the beginning of each unit.

Students can access the online program through any high-speed internet connection from home or other locations.

For more information about credit recovery and distance learning options, please contact your school counselor.

## ATTENDANCE

The Student Attendance Policy establishes specific regulations related to attendance. Students and their families can refer to Board Policy 02.11. Students are required to attend 90% of the school year (Elementary) and 90% of the scheduled classes (Secondary) to be eligible for promotion unless otherwise stated by the student's individualized education plan.

In high school, students who violate the attendance policy are unable to earn credits. Students who violated the attendance policy may request an attendance appeal hearing. At the attendance appeal hearing, the student and family can present evidence to justify the excessive absences. The appeal will either be granted, denied, or conditionally approved contingent upon satisfactory completion of additional academic assignments and/or time.

# COURSE LEVELS

## ADVANCED PLACEMENT COURSES (AP)

The Advanced Placement (AP) Program has enabled millions of students to take college-level courses and earn college credit, advanced placement or both, while still in high school. AP Exams are given each year in May. Students who earn a qualifying score on an AP Exam are typically eligible, in college, to receive credit, placement into advanced courses, or both. Every aspect of AP course and exam development is the result of collaboration between AP teachers and college faculty. They work together to develop AP courses and exams, set scoring standards, and score the exams. College faculty review every AP teacher's course syllabus.

AP courses are designed to challenge students who demonstrate a consistent record of outstanding academic achievement. Rich course material, vibrant classroom discussions and demanding assignments help students develop content mastery and critical thinking skills expected of college students.

In Christina, students who enroll in AP courses are expected to take the AP Exam.

## COLLEGE PREPARATORY COURSES (CP)

College preparatory (CP) courses are designed to provide a rigorous curriculum aligned with state standards and the student's interests. These classes prepare a student for a variety of post-secondary experiences including higher education and the workforce.

## CAMBRIDGE ACADEMY COURSES (CM)

Cambridge Academy courses are taken in place of the traditional Honors or College Preparatory courses needed for graduation. In order to enroll in the Cambridge Academy coursework, students must apply and be accepted into the Cambridge Academy in the spring before their 9th-grade year. These courses are offered at Newark High School only.

## CAREER TECHNICAL EDUCATION COURSES (CTE)

Career Technical Education (CTE) courses are part of a statewide initiative to ensure that all students have access to courses that reflect the demanding needs of the current workforce. CTE courses reflect both rigor and relevance in their content.

## DUAL ENROLLMENT COURSES

Dual enrollment allows high school students to take college-level courses at a reduced cost at their high school through partnerships between the Christina School District and Delaware Tech, the University of Delaware and Wilmington University. Students earn both high school and college credit by passing the class.

The district will pay for the cost of the tuition, however, students and families will be responsible for registration fees and the cost of the textbook.

## HONORS COURSES (HON)

Honors courses are designed to challenge students who are considering future dual enrollment or AP coursework. Students enrolled in these courses are expected to utilize independent learning and study skills, and complete additional projects presented by the instructor. Students should consult a school counselor before enrolling in honors courses.

### COURSE DESCRIPTION KEY

- AP Advanced Placement
- CM Cambridge Academy
- CP College Preparatory
- CTE Career Technical Education
- HON Honors

# GRADING & EVALUATION

## GRADING SCALE

The grading scale is as follows:

A+	98-100	C	70-76
A	90-97	D+	67-69
B+	87-89	D	60-66
B	80-86	F	<60
C+	77-79		

## GRADE POINT AVERAGE

The grade point average (GPA) is computed using all courses that are issued a letter grade.

A weighted GPA uses only the grades in the academic core courses of English, Mathematics, Science, Social Studies, World Language and any Advanced Placement (AP) or Dual Enrollment coursework.

Successful completion of a Cambridge Academy course, Dual Enrollment course, or AP course, receives 0.50 additional quality points in the computation of the GPA.

Successful completion of an honors-level course receives 0.25 additional quality points in the computation of the GPA.

## WEIGHTED COURSES & COLLEGE ADMISSIONS

Students taking advanced coursework through the Honors, AP, Cambridge Academy or Dual Enrollment programs will earn additional quality points for each credit earned in their grade point average (GPA) upon successful completion of the course.

These additional quality points provide a boost to the student's overall weighted GPA and may improve his or her overall rank in class. Many four-year colleges and universities will recalculate a student's GPA when considering them for admission. These programs may use their own criteria which may or may not give extra points for weighted classes. It's also important to remember that many universities and colleges grant advanced standing or college credit on the basis of how well a student performs on the AP test. Additional information on course weighting and advanced standing in college is available through your school counselor.

The course weighting for advanced-level courses is as follows:

- Honors: 0.25
- Cambridge Academy, AP and Dual Enrollment: 0.50

## CLASS RANK

Final class rank is based on weighted GPA and is determined at the end of the student's senior year.

Eligibility for honor roll status is based on marking period grades using an unweighted GPA. Students are eligible for honor roll with a 3.0 or higher, and a maximum of one C. Students earning a 4.0 are eligible for distinguished honor roll.

## ATHLETIC ELIGIBILITY

Athletic eligibility is determined by DIAA eligibility guidelines.

### PROMOTION

Promotion from grade 9 to 10 requires a minimum of 5 credits including:

- 1 credit in English
- 1 credit in Mathematics
- 1 credit in Science or Social Studies
- 2 additional credits (Electives and / or Pathway)

Promotion from grade 10 to 11 requires a minimum of 12 credits including:

- 2 credits in English
- 2 credits in Mathematics
- 3 credits in Science and / or Social Studies
- 1 credit in a Pathway
- 4 additional credits

Promotion from grade 11 to 12 requires a minimum of 18 credits including:

- 3 credits in English
- 3 credits in Mathematics
- 5 credits in Science and / or Social Studies
- 2 credits in a Pathway
- 5 additional credits

# GRADUATION

## GRADUATION REQUIREMENTS

The State of Delaware requires all students complete a minimum of 24 credits to graduate; however, the Christina School District requires 26 credits for graduation.

See page 9 for a chart of graduation requirements.

## PATHWAY REQUIREMENT

The State of Delaware requires each student to complete three credits in a pathway in order to earn a high school diploma. This pathway should be included in the student's education plan as part of their Student Success Plan (SSP).

Each high school program has sequenced pathways in various programs of study that lead to innovative careers and a strong foundation that will prepare students for a variety of post high school majors. Although students can change pathways at any time, it is important that students consider their pathway early in their high school career. Since most pathways must be taken in sequence, it can be very difficult for students to get their credits if they don't plan ahead. For more information on your student's pathway, please talk to your school counselor.

## SENIOR RESEARCH PAPER REQUIREMENT

Seniors are required to complete a comprehensive research project that will entail research, learning the process of drafting and writing an APA format research paper, the development of a product, and an oral presentation. This project will have a cross-disciplinary focus. The completion of the senior project is mandatory for graduation.

## STUDENT SUCCESS PLAN (SSP) REQUIREMENT

Every Delaware student in grades 8-12 shall have a SSP based on exposure to the following:

- Opportunities to learn about career and industry trends and earning potential, such as career speakers, work-based learning opportunities, career and technical student organization activities and career compass activities.
- Opportunities to identify their strengths and interests connected to careers, such as Armed Services Vocational Attitude Battery and career interest surveys, as well as meetings with counselors, teachers, parents, guardians, care-givers at regular intervals to discuss student interests regarding careers.
- Opportunities to identify educational and financial requirements related to potential career interests, such as college representative presentations, college visits, financial aid presentations and financial literacy classes.

By the student's final year of high school, the SSP shall identify the necessary steps to transition to the next phase of the student's career plan.

## MIDDLE SCHOOL CREDITS

High school credit will be granted for the following courses taken in middle school upon successful completion of the course:

- French I
- Integrated Mathematics I
- Integrated Mathematics II
- Spanish I

High school credits earned while in middle school will be applied toward elective credits needed for graduation, but will not be included in the student's grade point average (GPA). Please note that while these credits meet high school graduation requirements, they may not meet admissions requirements for students applying to four-year colleges after graduating high school. Some four-year colleges will not give consideration to middle school credits when looking at student transcripts for admissions. Students and parents should consult with a school counselor about admissions requirements prior to making decisions related to these course areas.



# GRADUATION

GRADUATION REQUIREMENTS	CREDITS
<b>English</b> English 9, English 10, English 11, English 12	4 Credits
<b>Mathematics<sup>1</sup></b>	4 Credits
<b>Science</b> Earth / Physical Science, Biology, Chemistry	3 Credits
<b>Social Studies</b> Human Geography, Civics / Economics, U.S. History	3 Credits
<b>Additional Science or Social Studies</b>	1 Credit
<b>Physical Education</b>	1 Credit
<b>Health</b>	0.5 Credit
<b>World Language</b> 2 Credits in the Same World Language <sup>2</sup>	2 Credits
<b>Pathway Requirement</b> 3 Planned and Sequential Career Pathway Courses	3 Credits
<b>Senior Project and Student Success Plan (SSP)</b>	See page 8 for requirements.
<b>Additional Electives</b>	4.5 Credits
<b>Total Credits Required</b>	26 Credits

<sup>1</sup>The State of Delaware requires all students to pass a mathematics course during 12th grade.

<sup>2</sup>While the State of Delaware requires only two World Language credits of the same language, the Christina School District recommends three or more credits as selective colleges and universities require three or more years of the same language. Colleges and universities do not consider credits earned in middle school.

# GRADUATION

## DELAWARE VOLUNTEER CREDIT

High school students may earn one elective credit toward graduation upon completing 90 hours of community service during two semesters, through the Delaware Volunteer Credit. The semesters do not have to be consecutive or in the same calendar year. Hours must be performed outside the student's regularly scheduled school day. Volunteer hours completed as part of a service group requirement may also be used toward the Delaware Volunteer Credit. Volunteer activity cannot be political or advocacy in nature. Hours must be performed at a non-profit agency in Delaware. Service must be approved by the State Office of Volunteerism.

*For more details about the Delaware Volunteer Credit, please visit [volunteerdelaware.org](http://volunteerdelaware.org).*

## TRANSFER STUDENTS

Students who have transferred from other schools outside the Christina School District should meet with their school counselor to discuss how their transfer courses are applied towards district graduation requirements.

Upon enrollment in the Christina School District during the third or fourth year of high school, where the transfer student was on-track to graduate, a transcript and credit evaluation will be done and the school counselor may request approval for proration of elective credits.

The formula for this proration will take into account the number of credits required by the student's former school, along with the number of credits required by the Christina School District.

All content-related credits must be earned and under no circumstances may the total credits required for graduation be less than the minimum required and permitted under the State of Delaware Graduation Requirements. Requests to prorate credits must be submitted to the Office of Teaching and Learning for approval.

Please see your school counselor for additional information.

## RECOMMENDED COURSES FOR COLLEGE-BOUND STUDENTS

Four-year college or university admissions can be different from school to school. As a general rule, however, most colleges recommend that students applying to a four-year college or university should complete the following courses while in high school:

- 4 years of English
- 4 years of Social Studies including a World History course
- 4 years of Mathematics
- 3-4 years of Science, including 2 lab sciences
- 2-4 years of the same World Language in high school
- 20 core area courses total (English, Mathematics, Science, Social Studies and World Language courses)

Please consult with your school counselor to be certain which courses may be required for your colleges of interest.

# COMMUNITY SERVICE, FINANCIAL AID & SCHOLARSHIPS

## COMMUNITY SERVICE

Community service is highly encouraged but not mandatory. Current students who have earned community service hours will be able to document those hours on their resume and Student Success Plans.

Additionally, students will be encouraged to pursue the Delaware Volunteer Credit (DVC) by completing 90 hours of community service during two semesters in high school. This one elective credit can be used towards graduation. Students who receive the credit will earn a certificate of appreciation signed by the Governor and the Secretary of the Delaware Department of Education.

For ideas on where to perform your community service hours, please visit [volunteerdelaware.org](http://volunteerdelaware.org), [volunteerway.org](http://volunteerway.org) and [delaware211.org](http://delaware211.org).

All documents for community service hours must be submitted to your school counselor by March 1 of your senior year.

## FINANCIAL AID & SCHOLARSHIPS

School counselors have a wealth of information on scholarships and financial aid for college. Each fall the State of Delaware mails seniors the State of Delaware Scholarship Compendium which provides a listing of all scholarships and grants available to Delaware students.

## SEED SCHOLARSHIP

College tuition doesn't always fit into every budget. That's why the SEED (Student Excellence Equals Degree) Scholarship program was started. If you attend a Delaware high school, keep your grades up and stay out of trouble, you can go to Delaware Tech or the University of Delaware Associate in Arts Program tuition-free. To learn more, please visit [dtcc.edu](http://dtcc.edu).

## INSPIRE SCHOLARSHIP

The Inspire Scholarship is available to Delaware high school graduates with excellent credentials to attend Delaware State University. To learn more about the Inspire Scholarship, please visit [desu.edu](http://desu.edu).

## FEDERAL STUDENT AID PROGRAMS

Federal student aid is financial assistance that's available through the U.S. Department of Education's Office of Federal Student Aid. Federal student aid covers school expenses such as tuition and fees, room and board, books and supplies, and transportation. This aid can also help you pay for a computer and dependent childcare expenses. There are three categories of federal student aid: grants, work-study and loans.

- Federal Pell Grant
- Academic Competitiveness Grant
- National Science and Mathematics Access to Retain Talent Grant
- Teacher Education Assistance for College and Higher Education Grant
- Federal Stafford Loan
- Federal PLUS Loan
- Campus-Based Programs
- Federal Supplemental Educational Opportunity Grant
- Federal Work-Study
- Federal Perkins Loan

*With a few exceptions, Federal Pell Grants are available only to undergraduate students for a maximum lifetime limit of 18 semesters or its equivalent. Grants do not have to be repaid. For more information about federal grants, please visit [federalstudentaid.ed.gov/aidinfo](http://federalstudentaid.ed.gov/aidinfo). Not all schools participate in all federal student aid programs. Check with your school's financial aid office for more information.*



# OUR HIGH SCHOOLS

*Unique Offerings & Pathways at a Glance*

# CHRISTIANA HIGH SCHOOL (CHS)



190 SALEM CHURCH ROAD, NEWARK, DE 19713  
CHRISTIANAHIGH.ORG | 302.631.2400

Christiana High School offers a comprehensive high school experience with a focus on agricultural sciences and health sciences, and a rigorous Honors Academy.

## PATHWAYS

- Agricultural Power & Engineering
- Allied Health
- Animal Science & Management
- Banking
- Engineering (PLTW)
- Environmental Science & Natural Resources
- Food Sciences
- Jobs for Delaware Graduates
- Marketing
- Navy Junior ROTC
- Performing Arts (Band & Chorus)
- Plant Science
- Public & Community Health
- Visual Arts

## LANGUAGES

- French I, II, III, IV
- Spanish I, II, III, IV
- Dual Enrollment Spanish

## AP COURSES

- AP Biology
- AP Calculus
- AP English Language & Composition
- AP English Literature & Composition
- AP Statistics
- AP U.S. History
- AP World History

## DUAL ENROLLMENT

The following courses are offered through partnerships with the University of Delaware and Wilmington University:

- DUA 0130 Finite Mathematics
- DUA 0230 Discrete Mathematics
- DUA 3030 English Composition I
- DUA 3130 English Composition II
- DUA 4030 History of Art and Design
- DUA 4130 Drawing and Painting
- DUA 5030 Accounting I
- DUA 5130 Introduction to Business
- DUA 5230 Marketing
- DUA 5530 Computer Applications
- DUA 6030 Survey of Criminal Justice
- DUA 6130 World History
- DUA 6230 Introduction to Psychology
- DUA 6630 Astronomy
- DUA 6730 Environmental Science

- DUA 7030 Music Appreciation
- DUA 7130 Basic Photographic Techniques
- DUA 8030 Leadership in Agriculture  
DUA 8130 Introduction to Equine Science
- DUA 8530 Spanish
- DUA 6330 Introduction to Sociology
- DUA 9030 Introduction To Critical Thinking

## ATHLETICS

- Baseball
- Cheerleading
- Club Ice Hockey
- Field Hockey
- Football
- Golf
- Basketball (Boys & Girls)
- Cross Country (Boys & Girls)
- Indoor Track (Boys & Girls)
- Lacrosse (Boys & Girls)
- Soccer (Boys & Girls)
- Swimming (Boys & Girls)
- Tennis (Boys & Girls)
- Track (Boys & Girls)
- Softball
- Volleyball (Girls)
- Wrestling

# GLASGOW HIGH SCHOOL (GHS)



1901 SOUTH COLLEGE AVENUE, NEWARK, DE 19702  
GLASGOWHIGH.ORG | 302.631.5600

Glasgow High School offers a traditional high school experience with a focus on hospitality, culinary arts, business and humanities, and a rigorous Early College Academy.

## PATHWAYS

- Air Force Junior ROTC
- Biomedical Sciences
- Culinary Arts
- Fashion and Apparel
- Jobs for Delaware Graduates
- K-12 Teacher Academy
- Marketing
- NAF Academy of Business Information Management
- NAF Academy of Finance
- Performing Arts (Band & Chorus)
- Visual Arts

## LANGUAGES

- French I, II
- Spanish I, II, III, IV, AP

## AP COURSES

- AP Biology
- AP Calculus
- AP Chemistry
- AP English Language & Composition
- AP English Literature & Composition
- AP Psychology
- AP Spanish
- AP Statistics
- AP U.S. History
- AP World History

## DUAL ENROLLMENT

The following courses are offered through a partnership with Wilmington University:

- DUA 0030 Inferential Statistics
- DUA 0230 Calculus
- DUA 0430 Introductory Survey of Mathematics
- DUA 3030 English Composition I
- DUA 5530 Computer Applications
- DUA 5630 Integrating Excel into Business Problem Solving
- DUA 9030 Introduction to Critical Thinking

## ATHLETICS

- Baseball
- Cheerleading
- Field Hockey
- Football
- Basketball (Boys & Girls)
- Cross Country (Boys & Girls)
- Indoor Track (Boys & Girls)
- Lacrosse (Boys & Girls)
- Soccer (Boys & Girls)
- Swimming (Boys & Girls)
- Tennis (Boys & Girls)
- Track (Boys & Girls)
- Softball
- Volleyball (Girls)
- Wrestling

# NEWARK HIGH SCHOOL (NHS)



750 EAST DELAWARE AVENUE, NEWARK, DE 19711  
NEWARKHIGH.ORG | 302.631.4700

Newark High School offers a traditional high school experience with a focus on the arts and innovation, and a rigorous Cambridge Academy.

## PATHWAYS

- CAD
- Choral Music
- Communications Technology
- Computer Science
- Culinary Arts
- Digital Communications
- Engineering (PLTW)
- Instrumental Music
- Jobs for Delaware Graduates
- Theater
- Visual Arts

## LANGUAGES

- French I, II, III, IV, AP
- Spanish I, II, III, IV, AP

## AP COURSES

- AP 2D Art and Design
- AP 3D Art and Design
- AP Biology
- AP Calculus AB
- AP Calculus BC
- AP Chemistry
- AP Computer Science A
- AP Computer Science Principles
- AP Drawing
- AP English Language & Composition
- AP English Literature & Composition
- AP Environmental Science
- AP French
- AP Physics C: Electricity & Magnetism
- AP Physics C: Mechanics
- AP Psychology
- AP Spanish
- AP Statistics
- AP U.S. Government & Politics
- AP U.S. History
- AP World History: Modern

## DUAL ENROLLMENT

The following courses are offered through a partnership with University of Delaware:

- DUA 1030 Introduction to Health Sciences
- DUA 2030 The Language of Medicine

## ATHLETICS

- Baseball
- Cheerleading
- Club Ice Hockey
- Field Hockey
- Football
- Club Golf
- Basketball (Boys & Girls)
- Cross Country (Boys & Girls)
- Indoor Track (Boys & Girls)
- Lacrosse (Boys & Girls)
- Soccer (Boys & Girls)
- Swimming (Boys & Girls)
- Tennis (Boys & Girls)
- Track (Boys & Girls)
- Softball
- Volleyball (Girls)
- Wrestling



# SARAH PYLE ACADEMY (SPA)



501 NORTH LOMBARD STREET, WILMINGTON, DE 19801  
SARHPYLEACADEMY.ORG | 302.429.4158

Sarah Pyle Academy offers an award-winning non-traditional college prep educational program focused on dropout prevention and creating successful career and college transitions.

For more information on Sarah Pyle Academy, please visit [sarahpyleacademy.org](http://sarahpyleacademy.org). On our website you can view student testimonials and photos, find out more about our teachers and staff, and if you think that Sarah Pyle is what you need to get back on track for graduation, you can apply online by going to the Admissions page.

## PROGRAM AT A GLANCE

- Available to students ages 16-20 who struggle in school but do not have serious disciplinary issues
- Average class size of 12 students per class
- Smaller classes utilizing a combination of text, digital, and project based learning using blended instruction and personalization
- Support services and curriculum that includes social-emotional learning, career / college planning, and work / internship experience
- Nationally recognized leader in using digital technology to enhance learning
- Google Apps for Education school where all students will work towards Google Certification while completing their required credits for their high school diploma
- State-of-the-art technology and online resources to extend learning beyond the classroom
- Opportunity for CTE Certification Program, Cross-Aged Mentorship / Leadership Program, Job / Internship Skill Development

## WHAT SETS US APART?

- Flexible scheduling that includes work experience opportunities
- Individualized course planning and goal setting with as much or as little personalization that makes sense for you
- Bi-monthly collaborative goal setting and monitoring, guiding you to self-regulate your learning and align strategies for maximized success
- Personalized curriculum that fits how you learn best with dedicated teacher who are continually growing in personalized and digital learning and strategies
- Rigorous curriculum options that combine online and text-based resources to give students options that will help prepare them for multiple options after high school, including college, trade school, military or full-time employment
- Comprehensive student support services including career and college planning, life skills, health and wellness, counseling services, cross age mentoring, and resources for parents

# PATHWAYS AT A GLANCE

PATHWAYS	CHS	GHS	NHS
<b>AGRICULTURAL SCIENCES &amp; NATURAL RESOURCES</b>			
Agricultural Power & Engineering Pathway	●		
Animal Science & Management Pathway	●		
Environmental Sciences & Natural Resources Pathway	●		
Food Sciences Pathway	●		
Plant Science Pathway	●		
<b>BUSINESS MANAGEMENT &amp; ADMINISTRATION</b>			
Banking Pathway	●		
Marketing Pathway	●	●	
NAF Academy of Business Information Management Pathway		●	
NAF Academy of Finance Pathway		●	
<b>COMMUNICATION &amp; MEDIA</b>			
Communications Technology Pathway			●
Digital Communications Pathway			●
<b>EDUCATION &amp; HUMAN STUDIES</b>			
K-12 Teacher Academy Pathway		●	
<b>FASHION &amp; APPAREL</b>			
Fashion and Apparel Pathway		●	
<b>HEALTH SCIENCES</b>			
Allied Health Pathway	●		
Public & Community Health Pathway	●		

PATHWAYS	CHS	GHS	NHS
<b>HOSPITALITY &amp; TOURISM</b>			
Culinary Arts Pathway		●	●
<b>PERFORMING &amp; DESIGN ARTS</b>			
Choral Music Pathway			●
Instrumental Music Pathway			●
Performing Arts (Band, Chorus, & Theater Pathways)	●	●	
Theater Pathway			●
Visual Arts Pathway	●	●	●
<b>SCIENCE, TECHNOLOGY, ENGINEERING &amp; MATHEMATICS</b>			
Biomedical Sciences Pathway		●	
Computer Science Pathway			●
Drafting & Design Pathway			●
Engineering Pathway	●		●
<b>ADDITIONAL PATHWAYS</b>			
Air Force Junior ROTC Pathway		●	
Jobs for Delaware Graduates Pathway	●	●	●
Navy Junior ROTC Pathway	●		



# COURSE DESCRIPTIONS

# AGRICULTURAL SCIENCES

This section includes courses in the Agricultural Power & Engineering Pathway, Animal Science & Management Pathway, Biotechnology Pathway, Environmental Science & Natural Resources Pathway, Food Sciences Pathway and Plant Science Pathway.

## AGRICULTURAL POWER & ENGINEERING

### FUNDAMENTALS OF AGRICULTURAL POWER AND ENGINEERING

AGR 5510  
1 SEMESTER  
1 CREDIT  
GRADES 9-10

This course introduces students to skills needed in the agricultural power and engineering industries. This course offers hands-on opportunities in workplace safety, communication skills, application of construction mathematics, reading and developing construction plans, tool usage and safety practices, and cutting and gouging processes of metals using oxyfuels and plasma.

*Offered at CHS*

### AGRICULTURAL WELDING AND FABRICATION

AGR 5610  
1 SEMESTER  
1 CREDIT  
GRADES 10-11

This course enables students to build on the knowledge and experiences gained in Fundamentals of Agricultural Power and Engineering. Students learn shielded metal arc welding, gas metal arc welding, gas tungsten arc welding, agricultural welding, and metal fabrication. This course includes

hands-on experiences for students to learn metallurgy, read welding drawings and identify welding symbols. Prerequisite: Fundamentals of Agricultural Power and Engineering.

*Offered at CHS*

### POWER AND MECHANICAL SYSTEMS

AGR 5710  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course teaches students to apply principles of dynamic power and mechanical systems while incorporating scientific and engineering principles in power mechanical and related agricultural industries. Students learn about energy principles, engine theory, engine systems troubleshooting, electrical motor principles, hydraulic systems, and electronics. Prerequisite: Agricultural Welding and Fabrication.

*Offered at CHS*

## ANIMAL SCIENCE & MANAGEMENT

### FOUNDATIONS OF ANIMAL SCIENCE

AGR 9110  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course focuses on the fundamentals of animal science including animal origin, domestication and uses, careers in the animal industry, animal safety and sanitation, ways animals help humans, taxonomy and breeds, basic nutrition and health, biosecurity principles and environmental conditions on animals, and animal rights versus welfare. Students learn the foundational leadership skills, responsibility and cooperation needed to be a successful and productive citizen through a school-based agricultural education model that includes FFA activities, SAEs, and

career and leadership development events.

*Offered at CHS*

### GROWTH AND DEVELOPMENT OF DOMESTIC ANIMALS

AGR 9210  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course teaches students to apply animal science principles including biosecurity principles and environmental conditions on animals, scientific principles of anatomy, physiology and reproduction, nutrition, animal health and management, animal products and processing, laws and sustainable practices, and industry standards on the animal selection process. Students develop leadership skills, increase levels of responsibility, and engage in cooperative activities through FFA activities, SAEs, and career and leadership development events through a school-based agricultural education model. Prerequisite: Foundations of Animal Science.

*Offered at CHS*

### DOMESTIC ANIMAL MANAGEMENT

AGR 9310  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course teaches students to demonstrate their mastery of the content covered in Foundations of Animal Science and Growth and Development of Domestic Animals by applying their technical knowledge and skills in the field of animal agriculture. Through hands-on activities, students apply their mastery of biosecurity principles and environmental conditions on animals, global applications of animal agriculture, reproduction and genetics, animal nutrition, animal health care and evaluation, selection and marketing, and legal responsibilities.

# AGRICULTURAL SCIENCES

Students also apply skills gained through SAEs, FFA leadership activities, and career and leadership development events to better serve the community through a school-based agricultural education model. Prerequisite: Growth and Development of Domestic Animals.

*Offered at CHS*

**ANIMAL SCIENCE IV / VETERINARY SCIENCE**  
AGR 6410 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADE 12

This advanced course emphasizes veterinary science and technology, with a higher level of hands-on activities in the areas of safety, global implications, breeds, reproduction, nutrition, animal health, animal management, animal evaluation, legal responsibilities, and anatomy and physiology. Students are expected to continue and expand their FFA experiences and SAEs. Prerequisite: Domestic Animal Management.

*Offered at CHS*

## ENVIRONMENTAL SCIENCE & NATURAL RESOURCES

**ENVIRONMENTAL SCIENCE / NATURAL RESOURCES I**  
AGR 7110 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course examines natural resource systems with an emphasis on ecology, soils, aquatics, and energy utilization. Students practice using sampling equipment, gathering environmental data and analyzing their results. Students are required to complete an environment-related SAE.

*Offered at CHS*

**ENVIRONMENTAL SCIENCE / NATURAL RESOURCES II**  
AGR 7210 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course examines natural resource systems with an emphasis on forestry, wildlife management, land use, waste, and wetlands and estuarine systems. Students practice using sampling equipment, gathering environmental data, and analyzing their results. Students are required to complete an environment-related SAE. Prerequisite: Environmental Science / Natural Resources I.

*Offered at CHS*

**ENVIRONMENTAL SCIENCE / NATURAL RESOURCES III**  
AGR 7310 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course examines natural resource systems with an emphasis on conservation, human population analysis, environmental law, and natural resource communications. Students gather information and communicate their professional knowledge both orally and in writing. Students are required to complete an environment-related SAE. Prerequisite: Environmental Science / Natural Resources II.

*Offered at CHS*

## FOOD SCIENCES

**FOOD SCIENCE AND TECHNOLOGY I**  
AGR 8110 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This introductory course focuses on the inner workings of the food industry from farm to table. Students examine many aspects of

food with an emphasis on nutrition, the food industry, quality factors of foods, and food processing. Through these topics, students gain skills and knowledge that will help them in various aspects of their academic career and as consumers in the community.

*Offered at CHS*

**FOOD SCIENCE AND TECHNOLOGY II**  
AGR 8210 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course offers a deeper dive into specific food groups such as candy and confectionery, fruits and vegetables, milk and more. Students learn about food deterioration, food preservation, and careers in the food industry. Students will become more informed consumers while also gaining skills and knowledge that will help them in various aspects of their academic careers. Prerequisite: Food Science and Technology I.

*Offered at CHS*

## PLANT SCIENCE

**FOUNDATIONS OF PLANT SCIENCE**  
AGR 0110  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course explores the plant industries and food system of the U.S. to foster an understanding of the steps involved in growing crops for food and plants for ornamental and aesthetic purposes. Students study the major characteristics of plant life, plant structures and functions, nutrient needs of plants, fundamentals of soil science, water management, cultural practices, and pest management. Students also explore career options in the horticulture industry through classroom and laboratory

# AGRICULTURAL SCIENCES

instruction. Students are introduced to the foundational leadership skills, responsibility and cooperation needed to be a successful and productive citizens through a school-based agricultural education model that includes FFA activities, SAEs, and career and leadership development events.

*Offered at CHS*

## PLANT AND SOIL SYSTEMS

AGR 0210  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course builds on the knowledge and experiences gained in Foundations of Plant Science. Students apply knowledge and concepts of plant science, soil science, water management, pest management, and various crop production characteristics through hands-on laboratory and experiential learning. This course uses a combination of classroom and laboratory instruction that includes land labs, greenhouses, landscape beds, floral production, and hydroponics. Students develop leadership skills, increase levels of responsibility, and engage in cooperative activities through FFA activities, SAEs, and career and leadership development events through a school-based three-component agricultural education model. Prerequisite: Foundations of Plant Science.

*Offered at CHS*

## PLANT SYSTEMS MANAGEMENT AND SUSTAINABILITY

AGR 0310  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course enables students to apply principles of horticulture production and facility maintenance and design. Students learn soil conservation and land management practices, concepts related

to integrated pest management and the use and application of pesticides, and principles of business management and record keeping. Students explore global economic systems, sustainability of plant life, and the multifaceted role that plants play in sustaining and improving the quality of life. Students apply skills gained through SAEs, FFA leadership activities, and career and leadership development events to better serve the community through a school-based agricultural education model. Prerequisite: Plant and Soil Systems.

*Offered at CHS*

## LANDSCAPE MANAGEMENT & TURF GRASS II

AGR 4210 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course can be used to complete either the Plant Science or Power Mechanics Pathways. Students will use prior knowledge learned from the introductory classes in both pathways and relate this knowledge for advanced training for an introductory level position in a landscape construction, design or maintenance company, preparation for an agricultural major in college, or entrance to a technology or trade school. Prerequisite: Foundations of Plant Science.

*Offered at CHS*

## LANDSCAPE, TURF MANAGEMENT & DESIGN III

AGR 4310 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course expands on knowledge and skills in landscape design drawings and in implementing and maintaining attractive landscapes and lawns. Students will be required to pass a safety exam and sign a safety agreement, along with their parent / guardian. Prerequisite: Landscape

Management & Turf Grass II.

*Offered at CHS*

## OTHER

Christiana High School is pleased to offer a partnership with the University of Delaware's College of Agriculture and Natural Resources. This dual enrollment opportunity provides students an opportunity to broaden their exposure to the Agriscience curriculum, earn a University of Delaware transcript with college credit and obtain use of the university library. Mentoring from current Agricultural Sciences majors will be available to support students through the coursework. Classes will be taught on the Christiana High School campus by university professors. Academic performance prerequisites. Please speak with your school counselor for more information or see your Agriscience teacher.

## LEADERSHIP IN AGRICULTURE

UNIVERSITY OF DELAWARE  
DUA 8030  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course provides an overview of management and leadership in agricultural science, which focuses on industry trends and careers.

*Offered at CHS*

## INTRODUCTION TO EQUINE SCIENCE

UNIVERSITY OF DELAWARE  
DUA 8130  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course provides an overview of equine science, which focuses on the unique equine biology, function and husbandry of the horse.

*Offered at CHS*



# AIR FORCE JUNIOR ROTC

This section includes courses in the Air Force Junior ROTC (AFJROTC) Pathway.

The AFJROTC program complements the curricula and overall educational programs of America's high schools, offering students a unique opportunity for personal growth. AFJROTC is remarkably comprehensive. To a base of American citizenship and history, AFJROTC adds a battery of values and skills indispensable to success in school and beyond.

AFJROTC teaches self-discipline, confidence, organization, ethics, integrity and responsibility. AFJROTC trains students to think on their feet, to make decisions, to work as team members, to motivate themselves and others, and to lead. AFJROTC instructors teach as much by example as by syllabus. They serve as role models for their students, and as mentors who provide strong incentives to stay in school and graduate.

Enrollment is available to students in any grade and AFJROTC may be taken every year of high school, if desired. AFJROTC is not a recruitment program for the military. Although some graduating cadets pursue military training, most do not. Participation in AFJROTC incurs no service obligation whatsoever, nor is it intended to apply any pressure in that direction. All uniforms (worn once weekly), textbook, and related materials for the course are provided at no cost to the student.

**AEROSPACE SCIENCE 200:  
THE SCIENCE OF FLIGHT:  
A GATEWAY TO NEW HORIZONS**  
ROT 2110  
1 SEMESTER  
1 CREDIT  
GRADE 9

The Science of Flight: A Gateway to New Horizons is an introductory course and customized textbook that focuses on how airplanes fly, how weather conditions affect flight, flight and the human body, and flight navigation. The course is designed to complement materials taught in mathematics, physics, and other science-related courses and is aligned with the National Science Education Standards, the Math Standards and Expectations, and ISTE National Educational Technology Standards for Students. The course outcomes are 1) analyze the elements of flight.; 2) evaluate how atmospheric conditions affect flight; 3) evaluate how flight affects the human body; and 4) analyze flight navigation and the purpose of aerial navigation aid.

*Offered at GHS*

**AEROSPACE SCIENCE 300:  
EXPLORING SPACE: THE HIGH FRONTIER**  
ROT 2210  
1 SEMESTER  
1 CREDIT  
GRADE 10

This is a science course that includes the latest information available in space science and space exploration. The course begins with the study of the space environment from the earliest days of interest in astronomy and early ideas of the heavens, through the Renaissance, and on into modern astronomy. It provides an in-depth study of the Earth, Sun, stars, Moon, and solar system, including the terrestrial and the outer planets. It discusses issues critical to

travel in the upper atmosphere such as orbits and trajectories unmanned satellites, and space probes. It investigates the importance of entering space and discusses manned and unmanned space flights, focusing on concepts surrounding spaceflight, space vehicles, launch systems, and space missions. The section on manned spaceflight focuses on the Space Shuttle, space stations and beyond, covering milestones in the endeavor to land on the Moon and to safely orbit humans and crafts for temporary and prolonged periods. The course covers the human aspect of spaceflight, focusing on the human experience in space. It also examines the latest advances in space technology, including robotics in space, the Mars Rover, and commercial uses of space. Prerequisite: Aerospace Science 200: The Science of Flight: A Gateway to New Horizons.

*Offered at GHS*

**AEROSPACE SCIENCE 400:  
MANAGEMENT OF THE CADET CORPS**  
ROT 2310  
1 SEMESTER  
1 CREDIT  
GRADE 11

The cadets should be in a leadership position of managing cadet corps programs by their fourth year in the Air Force Junior ROTC program. Not every leadership position needs to be held by fourth year cadets and AS 400 is intended for 4th year cadets who hold corps management positions. However, if necessary due to low number of 4th year cadets, 3rd year cadets may be placed in corps management positions and enrolled in AS 400. AS 400 is not intended for cadets who do not hold corps management / leadership positions and instructors should ensure only those cadets holding corps management / leadership positions are enrolled in the course. This hands-on experience affords

# AIR FORCE JUNIOR ROTC

cadets the opportunity to put theories of previous leadership courses into practice. Planning, organizing, coordinating, directing, controlling, and decision making will be done by cadets. They will put into practice their communication, decision-making, personal-interaction, managerial, and organizational skills. Instructors should keep in mind that since there is no textbook for this course, the course syllabus will be structured so that cadets achieve course objectives by completing corps management activities. Prerequisite: Aerospace Science 300: Exploring Space: The High Frontier.

*Offered at GHS*

**AEROSPACE SCIENCE 410:  
SURVIVAL: SURVIVE RETURN**  
ROT 2410  
1 SEMESTER  
1 CREDIT  
GRADE 12

The Survival text is a synthesis of the basic survival information found in Air Force Regulation 64-4 Survival Training. The survival instruction will provide training in skills, knowledge, and attitudes necessary to successfully perform fundamental tasks needed for survival. Survival also presents “good to know” information that would be useful in any situation. The information is just as useful to an individual lost hunting or stranded in a snowstorm. Prerequisite: Aerospace Science 400: Management of the Cadet Corps.

*Offered at GHS*

**AEROSPACE SCIENCE 510:  
AFJROTC HONORS SENIOR PROJECT**  
ROT 2510  
1 SEMESTER  
1 CREDIT  
GRADE 12

This project is provided for those units who have students that want to continue on in

AFJROTC during their senior year and receive honors credit. It will allow top cadets to earn honors credit for a more demanding version of Management of the Cadet Corps allowing cadets the opportunity to improve their leadership, management, and organizational skills.

This culminating Honors Senior Project is designed for cadets to demonstrate essential skills through reading, writing, speaking, production, and performance. Cadet skills in analysis, logic, and creativity will also be showcased through successful completion of this project.

The Honors Senior Project is primarily targeted for senior cadets in a three- or four-year program. However, it is not uncommon for other academically successful cadets enrolled in Advanced Placement, other Honors, or in an International Baccalaureate program to successfully complete this project.

In order to retain these cadets in the unit’s AFJROTC program and to continue to improve their critical thinking and research skills, selected cadets with demonstrated academic capabilities may also enroll in this class with SASI approval. Successful completion of the Honors Senior Project will allow cadets to receive honors credit while maintaining their enrollment in the AFJROTC program. For cadets to receive honors credit, they must meet state / district / school honors course criteria.

Subject material for Aerospace Science 510 must come from Holm Center / DEJ provided curriculum materials. All materials including the grading rubric for the Honors Senior Project is posted at:

Science and Engineering STEM:

Unmanned Aerial Vehicles (UAVs) /  
Quadcopters

Modern UAVs and Quadcopters are probably the most advanced equipment in the field of robotics, aeronautics, and electronics today. These aerial vehicles that come in wide variety of sizes, shapes, functions can be programmed to fly independently or be remotely controlled systems from the ground. They are usually used to carry out tasks which may be too risky for manned flight. UAVs / Quadcopters that were initially used by the military are now finding uses in the civilian market, such as search and rescue, weather analysis, ground mapping, and as a hobby. Prerequisite: Aerospace Science 410: Survival: Survive Return.

*Offered at GHS*

# AVID

AVID stands for Advancement Via Individual Determination and is also derived from the Latin word meaning “eager for knowledge.” AVID is designed to increase schoolwide learning and performance. The mission of AVID is to ensure that all students and most especially the least served students in the middle are capable of completing a college preparatory path. Strategies used are WICR (Writing, Inquiry, Collaboration and Reading), Cornell Note-taking, Socratic Seminars, and Tutorials.

Students in the AVID program will work with AVID trained instructors in addition to taking this AVID elective course which will instruct them in the learning strategies identified above. Students enrolled in AVID at the middle school level will be included in AVID at the high school level. Additional AVID enrollees are accepted by application only. To apply for AVID, students must apply in the spring before their freshman year.

**AVID 9**  
**AVD 0910 (CP)**  
**2 SEMESTERS**  
**1 CREDIT**  
**GRADE 9**

This course introduces students to the AVID college readiness system, a set of strategies to build the learning, study and academic behavioral skills that are essential for success in rigorous coursework such as honors and AP courses.

*Offered at CHS, GHS and NHS*

**AVID 10**  
**AVD 1010 (CP)**  
**2 SEMESTERS**  
**1 CREDIT**  
**GRADE 10**

This course helps students to build a foundation for success in high school AP courses and college coursework. With a focus on developing skills in writing, inquiry, collaboration, and reading across the content areas, students also explore college and career research.

*Offered at CHS, GHS and NHS*

**AVID 11**  
**AVD 1110 (CP)**  
**2 SEMESTERS**  
**1 CREDIT**  
**GRADE 11**

In this course students refine their writing, inquiry, collaboration, and reading skills, while also examining the college entrance essay and admission requirements for four-year universities. Students have an opportunity to build leadership experience by designing and completing service projects in this course.

*Offered at CHS, GHS and NHS*

**AVID 12**  
**AVD 1210 (CP)**  
**2 SEMESTERS**  
**1 CREDIT**  
**GRADE 12**

This course takes students inside the college application and financial aid processes and continues to build leadership skills through service projects.

*Offered at CHS, GHS and NHS*

# BUSINESS MANAGEMENT & ADMINISTRATION

This section includes courses in the Accounting Pathway, Banking Pathway, Marketing Pathway, NAF Academy of Business Information Management Pathway, and NAF Academy of Finance Pathway.

## **BUSINESS, FINANCE AND MARKETING ESSENTIALS**

**BFM 1110**  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course offers a sampling of career options focusing on business, management and administrative theories. Students learn the competencies required for effective leadership, communications, planning, organization control, decision making and teamwork. Students also solve problems typically faced by those working in law, economics, entrepreneurship, information technology, finance, credit, insurance and human resources.

*Offered at CHS and NHS*

## **BBM 102 INTRODUCTION TO BUSINESS WILMINGTON UNIVERSITY**

**DUA 5130**  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course is designed to provide a broad overview of the functions of the business entity. Business and its environment, organization and management, finance, production, marketing, human resources, and control systems are reviewed. Prerequisite: Completion of three (3) Business Management & Administration pathway courses.

*Offered at CHS*

## **CTA 206 COMPUTER APPLICATIONS WILMINGTON UNIVERSITY**

**DUA 5530**  
1 SEMESTER  
1 CREDIT  
GRADES 9-12

This course provides an introduction to

personal computers and their use in meeting a wide variety of application needs. It uses a simulation lab for part of the learning and offers many resources in the use of computer applications, and handling of storage media. It emphasizes the use of Windows-based operating systems and Microsoft Office-based word processing, computer presentations, and spreadsheet software. Students are also given the skills to take the Microsoft Office Specialist (MOS) Word Exam. Students will also receive an introduction to Blackboard, Wilmington University's online learning platform. Students who have completed CTA 210, CTA 226 or CTA 326 should not register for CTA 206.

*Offered at CHS and GHS*

## **CTA 326 INTEGRATING EXCEL INTO BUSINESS PROBLEM SOLVING**

**WILMINGTON UNIVERSITY**  
**DUA 5630**  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course provides an intermediate level of Microsoft Excel which meets a wide variety of business technology needs. Students should have a basic knowledge of Excel skills, such as how to develop formulas. They will receive a more intensive experience in the use of spreadsheets, formulation, analysis, and presentation of data. This course emphasizes the use of pivot tables, collaboration, presentation, and problem solving techniques that are valuable in business practice, as well as a short introduction to Blackboard.

*Offered at GHS*

# BUSINESS MANAGEMENT & ADMINISTRATION

## ACCOUNTING

**ACCOUNTING**  
WILMINGTON UNIVERSITY  
DUA 5030  
1 SEMESTER  
1 CREDIT  
GRADE 11-12

This course studies the double-entry accounting system, including: the accounting cycle, books of original entry, preparation of journal entries, worksheets, the trial balance, and statements of financial position and income. Emphasis is on the proper recording and reporting of assets, liabilities, equity, revenue, and expenses. Prerequisite: Completion of three (3) Business Management & Administration pathway courses.

*Offered at CHS*

## MARKETING

**MARKETING ESSENTIALS FOR A DIGITAL AND DYNAMIC WORLD**  
COURSE CODE PENDING  
1 SEMESTER  
1 CREDIT  
GRADES 9-10

Marketing is the business function that deals with customers' needs and wants. The role of marketing is to facilitate understanding of customer preferences, link that knowledge to designing appropriate products and services for selected groups of customers, and determine appropriate methods to communicate, to deliver, and to capture value. Successful firms are those that strategically pursue objectives, deploy resources, and invest in the future of an organization, to consistently satisfy the needs of customers

better than competitors. Basic marketing principles apply to both for-profit and non-profit organizations.

*Offered at GHS*

**DIGITAL & DATA DRIVEN MARKETING**  
(AVAILABLE IN SY2022)  
COURSE CODE PENDING  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

As more and more human behavior takes place in digital environments and big data moves into the mainstream, marketers are pursuing the opportunity to make the profession more scientific and numbers-driven. In addition, with measurement at the center of every marketing campaign, marketers have the opportunity to assess the return on investment of their programs with unprecedented accuracy. However, this wealth of data can be overwhelming. Every channel has its own metrics, every demographic group's behavior can be mined for insights that will improve future performance. What are the numbers that matter? And what are they really telling us? How can we best leverage big data and marketing analytics to optimize results? This course explores the growing role of data in marketing. Prerequisite: Marketing Essentials for a Digital and Dynamic World.

*Offered at GHS*

**ENTREPRENEURIAL & CORPORATE MARKETING**  
(AVAILABLE SY2023)  
COURSE CODE PENDING  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

The Entrepreneurial and Corporate Marketing course will have students explore the unique

set of similarities and differences between entrepreneurship-based marketing and corporate-based marketing. Students will learn and apply communication strategies, problem solving and critical thinking skills and learn how systems provide efficiency in the workplace. Students will explore and exhibit leadership and teamwork throughout work-based learning activities as it pertains to marketing employment in both: the entrepreneurial setting (working within a startup) and corporate marketing careers. Prerequisites: Marketing Essentials for a Digital and Dynamic World and Digital & Data Driven Marketing.

*Offered at GHS*

**MARKETING COMMUNICATIONS II**  
BFM 7210  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

Students use marketing concepts, functions, theories and computerized tools to analyze the ways in which economic, consumer, and environmental variables affect the marketing process. Students will develop skills in business law, customer relations, human resources management and financial analysis. This course also features a detailed study of selling, pricing, promotion and product. Prerequisite: Business, Finance and Marketing Essentials.

*Offered at CHS and NHS*

**MARKETING COMMUNICATIONS III**  
BFM 7310 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course involves advanced creative projects in which students build upon

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# BUSINESS MANAGEMENT & ADMINISTRATION

their knowledge from Marketing Communications II. This course covers more complex topics including retail, entertainment, restaurants, travel and other industries. Prerequisite: Marketing Communications II.

*Offered at CHS and NHS*

**MARKETING**  
WILMINGTON UNIVERSITY  
DUA 5230  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course is an introduction to marketing, emphasizing the problems of policy determination by management. The nature and operation of marketing functions, consumer preferences, product planning, promotion, distribution, and pricing are studied. Environmental factors affecting marketing processes are also examined. This is a required marketing course for all business majors. Prerequisite: Completion of three (3) Business Management & Administration pathway courses.

*Offered at CHS*

**NAF ACADEMY OF BUSINESS  
INFORMATION MANAGEMENT**

**BUSINESS INFORMATION TECHNOLOGY**  
BFM 9110  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course examines the role of ethics across professions and provides an overview of IT today. Students consider contemporary IT issues such as security and privacy, the effects of IT on society and the individual,

and technological inequality. Through a culminating project students demonstrate their knowledge and skills in exploring a serious ethical issue facing the IT industry.

*Offered at GHS*

**GLOBAL BUSINESS ECONOMICS**  
BFM 9210  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course introduces economics as it pertains to supply, demand, profit, costs and markets with a differentiation between microeconomics and macroeconomics. This course focuses on the relationship of labor and business and provides a broad overview of the global economy. Students explore the culture, economics and fundamentals of international trade, investments, and finance. Through culminating projects students analyze financial information and assess the risks and benefits of doing business globally. Prerequisite: Business Information Technology.

*Offered at GHS*

**ENTREPRENEURSHIP**  
BFM 9310  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course introduces the concept of service in business and the critical role of entrepreneurs in the national and global economies. Students learn how the principles of great customer service have far-ranging implications for all professional endeavors. Students also learn entrepreneurial skills including the attitudes, characteristics and techniques of successful entrepreneurs. Through a culminating project, students

research the market and develop a business plan. Prerequisite: Global Business Economics.

*Offered at GHS*

**NAF ACADEMY OF FINANCE**

**FUNDAMENTALS OF FINANCE**  
BFM 4510  
1 SEMESTER  
1 CREDIT  
GRADES 9-10

This course explores the foundation of financial literacy, the function of finance in society, and the role of a financial planner, with a focus on income and wealth, financial institutions, and finance in organizations. Students examine technology's impact on the financial services field and the importance of financial planning. Through a culminating project students demonstrate expertise on issues critical to financial independence.

*Offered at GHS*

**PRINCIPLES OF ACCOUNTING**  
BFM 4610 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 10-11

This course provides an understanding of the critical accounting process and how it facilitates decision making by providing data and information to internal and external stakeholders. Students learn how to apply technology to accounting by creating formulas and inputting data into spreadsheets and accounting software such as QuickBooks and Peachtree. Students are introduced to the fundamentals of management accounting, manufacturing and cost accounting, budgeting, accounting for managerial decision

# BUSINESS MANAGEMENT & ADMINISTRATION

making, and financial analysis. Technology will be used for internal decision making, planning and control. A culminating project incorporates costing and pricing, sales mix analysis, performance report preparation, financial ratio comparisons, and profitability. Prerequisite: Fundamentals of Finance.

*Offered at GHS*

## **FINANCIAL SERVICES**

**BFM 4710**

**1-2 SEMESTERS\***

**1 CREDIT**

**GRADES 11-12**

This course investigates the origins of money and the early history of banking in the United States. Students learn to research and discriminate between investment options through an in-depth study of the financial services industry. Through an introduction to the insurance industry, students examine the critical role it plays in the financial services sector. A culminating project combines research of potential risks, regulations and ethical issues related to insurance in order to create a comprehensive needs assessment. Prerequisite: Principles of Accounting.

*Offered at GHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# COMMUNICATION & MEDIA

This section includes courses in the Communications Technology Pathway and Digital Communications Pathway.

## COMMUNICATIONS TECHNOLOGY

### COMMUNICATIONS & TECHNOLOGY I

TEC 5110 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 9-11

This course provides students with the basic understanding and skills needed to communicate through the media. It surveys the development of radio and television as a communications force in society and analyzes specific areas of radio and television production and operations. Students will research the history of radio and television.

*Offered at NHS*

### COMMUNICATIONS & TECHNOLOGY II

TEC 5210 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 10-12

This course emphasizes specific areas of television production. Students get in-depth instruction and hands-on experience in such areas of cameras, floor managing, announcing, and video, audio, and technical directing. Students will use the studio and portable video equipment to produce short programs. Students are expected to provide time outside of class for productions and taping school events. Prerequisite: Communications & Technology I.

*Offered at NHS*

### COMMUNICATIONS & TECHNOLOGY III

TEC 5310 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

In this course, students operate all of the studio and portable equipment and manage all functions of the program. Students develop programming by organizing production crews and all necessary materials and become producers and directors, overseeing all facets of a television production and are expected to commit additional time for video productions. Prerequisite: Communications & Technology II.

*Offered at NHS*

### COMMUNICATIONS & TECHNOLOGY IV

TEC 5410 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADE 12

In this course, students may begin to specialize in an area of television production or operations. Students assume roles of leadership as student producers, student directors; and staff positions such as general manager, student engineers, and student trainers. The students will oversee all video productions and programming of the studio. Students are scheduled individually for a double period each day and are expected to commit additional time during and after school. Prerequisite: Communications & Technology III.

*Offered at NHS*



# COMMUNICATION & MEDIA

## DIGITAL COMMUNICATIONS

### FOUNDATIONS OF DIGITAL DESIGN

AVC 1010  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-10

This course introduces students to the foundational principles, techniques, and skills of visual communications. Students learn the elements and principles of design, color theory, typography, packaging / promotional design, copyright / fair use, and image manipulation techniques along with the communication skills required to work in the media industry and a client-based realm. Students begin to develop the capstone cumulative professional portfolio.

*Offered at NHS*

### PROCESSES OF DIGITAL DESIGN

AVC 1110  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-11

This course engages students to produce media and design content using the computer as an artistic medium. Students are prepared with the skills to develop digital files in Adobe Photoshop. Students learn raster image manipulation, editing, software application, publishing, digital media literacy, HTML coding, web development, and the delivery of digital products. Using the software, students will see their original design concepts and brainstorming come to actualization in the digital world. Students continue to develop the capstone cumulative portfolio through production of their media and design concepts. Prerequisite: Foundations of Digital Design.

*Offered at NHS*

### APPLICATIONS OF DIGITAL DESIGN

AVC 1210  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course engages students in the use of the computer as an illustrative medium and film as an influential medium. Through the use of Adobe Illustrator and video production software, students prepare work in digital video production, video editing, and broadcasting of digital videos. Students are prepared in Adobe Illustrator with a focus on vector image manipulation, editing, illustration, publishing, and the delivery of digital products. Capstone skills learned from prior coursework are applied for students to develop client-based design work through district and community partnerships to with the completion of the capstone cumulative professional portfolio. Prerequisite: Processes of Digital Design.

*Offered at NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# DRIVER EDUCATION

Driver Education is required for anyone under 18 years of age to obtain driving privileges in Delaware.

Students must be classified as a 10th-grade student or above in high school in order to be eligible to sign up for Driver Education. State law requires that students must pass five subjects, two of which must be English, Mathematics, Science, or Social Studies to be eligible for their Driver Education Certificate upon completion of all course requirements.

The State of Delaware allows students the opportunity to take Driver Education one time through a local high school.

**DRIVER EDUCATION: FALL**  
**DRI 1010**  
**1 SEMESTER OR 1 MARKING PERIOD\***  
**0.25 CREDIT**  
**GRADE 10**

This course consists of two separate instructional phases: the classroom theory phase, which meets for a minimum of 30 classroom hours, and the roadwork phase, which provides the student with at least 7 hours behind the wheel, plus an additional 7 hours of observation time. (Semester is determined by birth month and year.)

*Offered at CHS, GHS and NHS*

**DRIVER EDUCATION: SPRING**  
**DRI 2010**  
**1 SEMESTER OR 1 MARKING PERIOD\***  
**0.25 CREDIT**  
**GRADE 10**

This course consists of two separate instructional phases: the classroom theory phase, which meets for a minimum of 30 classroom hours, and the roadwork phase, which provides the student with at least 7 hours behind the wheel, plus an additional 7 hours of observation time. (Semester is determined by birth month and year.)

*Offered at CHS, GHS and NHS*

# EDUCATION & HUMAN STUDIES

This section includes courses in the K-12 Teacher Academy Pathway.

## K-12 TEACHER ACADEMY

### HUMAN GROWTH & DEVELOPMENT

EDU 1210  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course introduces students to human physical, cognitive, social and emotional development from conception to adulthood. Students examine theories supporting current thinking and research on human development and the processes and influences affecting the developing person. Students also explore challenges to normal growth and development.

*Offered at CHS and GHS*

### TEACHING AS A PROFESSION

EDU 1310  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course explores the role of the teacher in the past, present and future in order to understand the importance of teaching in American society and its historical significance and social impact. Students explore the responsibilities and opportunities of an effective teacher at various grade bands and consider the function of the teacher as a leader. Students also identify personal professional goals to establish a path to becoming a teacher. Prerequisite: Human Growth & Development.

*Offered at GHS*

### FUNDAMENTALS OF CURRICULUM & INSTRUCTION

EDU 1410  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course explores curriculum delivery models in response to the needs of the learner. Emphasis is placed on the development of a variety of instructional materials that promote learning and a supportive classroom environment. Students analyze technology's impact on learning. Students develop lesson plans and assessments while practicing appropriate classroom management techniques to maximize the learning process for every student. Prerequisite: Teaching as a Profession.

*Offered at GHS*

# ENGLISH

**ENGLISH 9**  
ELA 0910 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course is designed to expand reading and writing skills in conjunction with the study of various types of literature such as short stories, poetry, drama, nonfiction and novels. This course includes an intense study of grammar and vocabulary, multi-paragraph composition, prompt-based exercises, text-based writing, reading comprehension strategies, and research and documentation skills.

*Offered at CHS, GHS and NHS*

**ENGLISH 9 HONORS**  
ELA 0920 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course is designed for students whose maturity, motivation, verbal aptitude and reading ability qualify them for a course that includes a variety of challenging writing and multicultural reading experiences. Students should be proficient in writing and have a strong vocabulary. Reading with speed, comprehension, and perception are important. Students examine short stories, poetry, drama, nonfiction and novels. This course includes advanced grammar and multi-paragraph compositions. Students write papers, analyze literature and complete a research project.

*Offered at CHS, GHS and NHS*

**CAMBRIDGE ENGLISH 9**  
ELA 0940 (CM)  
2 SEMESTERS  
1 CREDIT  
GRADE 9

This course requires students to meet the internationally recognized Cambridge guidelines which aim to encourage the skills of independent research and investigation, the use of initiative and creativity, and the application of skills and knowledge.

*Offered at NHS*

**ENGLISH 10**  
ELA 1010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This course is designed to further reading and writing skills in conjunction with the study of various types of literature such as short stories, poetry, drama, nonfiction and novels. This course includes an intense study of grammar and vocabulary, multi-paragraph composition, prompt-based exercises, text-based writing, reading comprehension strategies, and research and documentation skills. This course focuses on preparing students for the state assessment.

*Offered at CHS, GHS and NHS*

**ENGLISH 10 HONORS**  
ELA 1020 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This course is designed to further reading and writing skills through a variety of challenging writing and multicultural reading experiences. Students should be proficient in writing and have a strong vocabulary. Reading with speed, comprehension, and perception are important. Students examine short story, poetry, drama, nonfiction and novels. This course includes

advanced grammar and multi-paragraph compositions. Students write papers, analyze literature and complete a research component.

*Offered at CHS, GHS and NHS*

**CAMBRIDGE ENGLISH 10**  
ELA 1040 (CM)  
2 SEMESTERS  
1 CREDIT  
GRADE 10

This course requires students to meet the internationally recognized Cambridge guidelines which aim to encourage the skills of independent research and investigation, the use of initiative and creativity, and the application of skills and knowledge. Prerequisite: Cambridge English 9.

*Offered at NHS*

**ENGLISH 11**  
ELA 1110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course covers themed American and multicultural literature including a variety of short stories, poetry, drama, nonfiction and novels. Writing assignments help students develop more sophisticated writing skills to progress from literary analysis to creative expression. Students are required to complete a formal research paper that includes accurate documentation.

*Offered at CHS, GHS and NHS*

**ENGLISH 11 HONORS**  
ELA 1120 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course offers a rigorous study of themed American and multicultural literature including a variety of short stories, poetry,

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# ENGLISH

drama, nonfiction and novels. Students are encouraged to practice comprehension strategies in order to find meaning in complex reading material and expand their base of literary knowledge. Writing assignments include analytical writing and exercises that help develop style and voice. Students are required to complete a formal research paper that includes accurate documentation.

*Offered at CHS, GHS and NHS*

## AP ENGLISH LANGUAGE & COMPOSITION

ELA 1130 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course focuses on rhetorical analysis of nonfiction texts and the development and revision of well-reasoned, evidence-centered analytical and argumentative writing. Students should be interested in studying and writing various kinds of analytical or persuasive essays. Prerequisite: English 10.

*Offered at CHS, GHS and NHS*

## ENGLISH 12

ELA 1210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course focuses on British literature, composition and vocabulary. Students examine the play, the short story, the novel and poetry in order to recognize and understand universal themes in literature. Literary elements such as theme, character, tone, mood, and structure are emphasized and vocabulary is studied. Students are required to complete a formal research paper that includes accurate documentation.

*Offered at CHS, GHS and NHS*

## ENGLISH 12 HONORS

ELA 1220 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course engages students in the careful reading and critical analysis of British literature. Close textual study allows students to deepen their understanding of elements of writing such as structure, style, theme, figurative language and tone. Interpretation is enhanced by awareness of textual detail and historical context. The study of literature is accompanied by thoughtful discussion and reflective writing that demonstrates both an understanding of and appreciation for great literature. Students leave the course with an awareness of the continuum of literary themes across time and culture. Students are required to complete a formal research paper that includes accurate documentation.

*Offered at CHS, GHS and NHS*

## AP ENGLISH LITERATURE & COMPOSITION

ELA 1230 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course focuses on reading, analyzing and writing about imaginative literature (fiction, poetry, drama) from various periods. Students should be interested in studying literature of various periods and genres and using wide reading knowledge in discussions of literary topics. Prerequisite: English 11 or AP English Language & Composition.

*Offered at CHS, GHS and NHS*

## YEARBOOK

ELA 2110  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course is designed to develop students' skills in yearbook production by providing experiences in selected aspects of yearbook production. Students learn basic principles of yearbook production and develop skills that include writing copy, captions and headlines; digital photography; desktop publishing and using appropriate technology tools for media production.

*Offered at GHS*

## FOUNDATIONS OF COLLEGE ENGLISH

ELA 9710  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This preparatory course is designed to provide reinforcement in writing skills and improve reading fluency and comprehension skills. Reading and writing activities are integrated to provide continuity and practical application. Students completing the course with a score of 75% or higher will qualify to take credit-bearing English coursework at Delaware institutions of higher education. This course is offered to students who have not reached the 480 PSAT/SAT benchmark for English Language Arts, but are seeking college-level course work while enrolled in high school.

*Offered at CHS, GHS and NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# ENGLISH

**ENG 121 ENGLISH COMPOSITION I**  
WILMINGTON UNIVERSITY  
DUA 3030  
1 SEMESTER  
1 CREDIT  
GRADE 11

This course is designed to help students become more proficient and effective writers, while also developing reading comprehension and analysis skills. Students will study the basic tenants of effective writing before incorporating those elements into four essays and a visual presentation. Students will be introduced to effective reading strategies and will apply these to reading and writing assignments. Students will learn to write in stages, including pre-writing, drafting, and revising. Students will learn about academic integrity and submit each essay draft through SafeAssign. Prerequisite: ENG 110 with a grade of a C or higher, or placement through Accuplacer. Please note the minimum passing grade of ENG 121 is a C.

*Offered at CHS and GHS*

**ENG 122 ENGLISH COMPOSITION II**  
WILMINGTON UNIVERSITY  
DUA 3130  
1 SEMESTER  
1 CREDIT  
GRADE 11

This course is designed to help students further develop their composition skills and become proficient in college-level research writing. Students will continue to use the writing strategies they learned in ENG 121 and apply them to four essays, including an 8-10 page researched, argumentative paper. Students will develop information literacy skills, including how to search for, evaluate, and utilize scholarly sources. Students will further develop their knowledge of APA formatting and apply it to each writing assignment. Students will learn about academic integrity and submit each essay draft through SafeAssign. Prerequisite: ENG 121 with a C or higher. The minimum passing grade of ENG 122 is a C.

*Offered at CHS*

# FASHION & APPAREL

This section includes courses in the Fashion & Apparel Pathway.

**FASHION AND FABRIC**  
 COURSE CODE PENDING  
 1 SEMESTER  
 1 CREDIT  
 GRADES 9-10

Introduction to Fashion and Fabrics provides an overview of fashion related career opportunities and basic construction and reconstruction skills. Students will analyze fabrics to understand application and performance. The business of fashion and its global impact will be introduced.

*Offered at GHS*

**FASHION AND DESIGN**  
 (AVAILABLE IN SY2022)  
 COURSE CODE PENDING  
 1 SEMESTER  
 1 CREDIT  
 GRADES 10-12

Fashion Design expands on prior construction skills while presenting design principles, including proportion and color. Students will evaluate the impact of history on fashion as well as societal issues related to fashion. Technology used in fashion design and pattern making will be introduced. Prerequisite: Fashion and Fabric.

*Offered at GHS*

**FASHION MANAGEMENT**  
 (AVAILABLE IN SY2023)  
 COURSE CODE PENDING  
 1 SEMESTER  
 1 CREDIT  
 GRADES 11-12

Fashion Management and Design helps students gain in depth knowledge of the fashion industry, with an entrepreneurial and business focus. Utilizing advanced construction and design skills students develop a collection strategy. Apply research methods for marketing and to reduce negative impacts of fashion Prerequisite: Fashion and Design.

*Offered at GHS*

# HEALTH & FITNESS

One credit of Physical Education and a half credit of Health are required during high school. The one credit in Physical Education is broken down into two half credits which are taken over the course of two school years. In some cases a student may postpone physical education when a physician certifies in writing that the student cannot participate. No credit is granted for a medical excuse. The Physical Education requirement can be completed during the following year.

**HEALTH**  
HLT 2010  
1 SEMESTER OR 1 MARKING PERIOD\*  
0.5 CREDIT  
GRADES 9-11

This course offers a well-rounded framework of subjects that help students develop the skills to manage everyday needs. Topics include decision making in relation to substance abuse (e.g., drugs, alcohol and tobacco), the human body, chronic and infectious diseases, human sexuality, mental health, and health careers.

*Offered at CHS, GHS and NHS*

**PHYSICAL EDUCATION I**  
PHY 2110  
1 SEMESTER OR 1 MARKING PERIOD\*  
0.5 CREDIT  
GRADES 9-11

This course consists of physical fitness activities and the basic fundamentals of team sports. Activities include flag football, soccer, floor hockey, basketball, volleyball and cooperative games.

*Offered at CHS, GHS and NHS*

**PHYSICAL EDUCATION II**  
PHY 2210  
1 SEMESTER OR 1 MARKING PERIOD\*  
0.5 CREDIT  
GRADES 10-12

This course consists of physical fitness activities and basic fundamentals of lifetime sports. Students cover rules and strategies for participating in activities such as tennis, ultimate games, badminton, pickle ball and table tennis. Prerequisite: Physical Education I.

*Offered at CHS, GHS and NHS*

**EXERCISE PHYSIOLOGY**  
PHY 3110  
1 SEMESTER  
0.5 CREDIT  
GRADES 11-12

This course explores the adaptable nature of the human physiology, with a look at the science behind it. This course provides an opportunity to understand athletic training, anatomy and specific physiological adaptations in athletic performance. Students apply this knowledge to setting fitness goals and learn how to build a fitness plan for themselves or others. Students learn how nutrition, flexibility and proper rest are vital to maximizing one's potential.

*Offered at NHS*

**HUMAN ANATOMY & PHYSIOLOGY I**  
PHY 4110  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course offers detailed knowledge about how the body functions. Specific body processes and systems are explored, showing how the anatomy achieves what the body needs. Topics include body organization cells, tissues, the skin system, skeletal system, blood, immunity and body defenses, and the endocrine system. Prerequisites: Physical Education II and Health.

*Offered at NHS*

**WEIGHT TRAINING & CONDITIONING**  
PHY 5110  
1 SEMESTER  
0.5 CREDIT  
GRADES 10-12

This activity-based course helps students develop personal fitness skills and gain knowledge of anatomy and physiology. Students learn the many aspects of physical fitness, weight training, and conditioning and



# HEALTH & FITNESS

their role in promoting strength, muscular endurance, cardiovascular endurance, agility and flexibility. Students apply weight training and fitness concepts through the development of their own personal fitness program. Students learn the proper use of the weight machine and free weights, and various nutritional and weight control programs. Students are expected to change into Physical Education clothing and participate daily. Note: This course cannot replace Physical Education II. Prerequisite: Physical Education I.

*Offered at CHS, GHS and NHS*

## PRINCIPLES OF COACHING AND LEADERSHIP

PHY 6110  
1 SEMESTER  
0.5 CREDIT  
GRADES 11-12

This course explores the psychology of coaching sports. Students examine scenarios related to motivating, encouraging and coaching athletes. Students learn what it means to coach an entire team and examine the leadership skills needed to be an effective leader. Prerequisites: Physical Education II and Health.

*Offered at NHS*

## FITNESS / CONDITIONING ACTIVITIES

PHY 7110  
1 SEMESTER  
0.5 CREDIT  
GRADES 11-12

This course offers a variety of fitness and physical conditioning activities that are designed to advance the overall health of the student. This course emphasizes appropriate exercise techniques and general wellness principles. Topics include the five components of physical fitness, yoga, core strength and flexibility. Prerequisite: Physical Education II.

*Offered at GHS*

## CARDIO FITNESS

PHY 7210  
1 SEMESTER  
0.5 CREDIT  
GRADES 11-12

This course offers an opportunity for students to develop a fitness workout plan through walking and other forms of aerobic exercise. Flexibility, cardiovascular and muscular endurance, and muscular strength are emphasized. Students will be introduced to a low-impact form of exercise that is a lifelong activity. Prerequisites: Physical Education II and Health.

*Offered at NHS*

## PRINCIPLES OF ATHLETIC TRAINING

PHY 7510  
1 SEMESTER  
0.5 CREDIT  
GRADES 11-12

This course is designed for students who are interested in fields such as athletic training, physical therapy, medicine, fitness, physiology of exercise, kinesiology, nutrition and other areas of sports medicine. Topics include class work and practical, hands-on application in the prevention, treatment and rehabilitation of specific sports injuries, taping and wrapping injuries, emergency procedures, and sports medicine careers. Prerequisites: Physical Education II and Health.

*Offered at NHS*

# HEALTH SCIENCES

This section includes courses in the Allied Health Pathway and Public & Community Health Pathway, and other courses in Health Sciences.

## ALLIED HEALTH

### HUMAN GROWTH & DEVELOPMENT

EDU 1210  
1 SEMESTER  
1 CREDIT  
GRADES 9-11

This course introduces students to human physical, cognitive, social and emotional development from conception to adulthood. Students examine theories supporting current thinking and research on human development and the processes and influences affecting the developing person. Students also explore challenges to normal growth and development.

*Offered at CHS and GHS*

### FUNDAMENTALS OF HEALTH SCIENCES

HSC 5110  
1 SEMESTER  
1 CREDIT  
GRADES 9 (HA ONLY), 10-12

This course introduces students to careers in healthcare, with an exploration of the National Consortium for Health Science Education (NCHSE) National Health Science Standards, entry-level healthcare skills and the language of medicine. This course is offered as an articulated course with Delaware Technical Community College (BIO100 Medical Terminology). Students begin preparation for the NCHSE National Health Science Assessment.

*Offered at CHS*

### ESSENTIALS OF HEALTH CAREERS

HSC 5210  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course helps students to become effective and efficient healthcare providers as they develop a working knowledge of various

healthcare opportunities. As students explore different areas of allied health, they will discuss the potential education, advancement, employment opportunities, employment sites and financial rewards. Students will focus on careers in the healthcare field by applying classroom / lab knowledge and skills to clinical settings as they participate in direct or simulated patient care. This course is offered as an articulated course with Delaware Technical Community College (HLS100 Introduction to Health Careers). Students participate in CPR / First Aid Certification through the American Heart Association. Prerequisite: Fundamentals of Health Sciences.

*Offered at CHS*

### ANATOMY AND PHYSIOLOGY

SCI 5020  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course details human anatomy and physiology and includes laboratory work in histology, cytology, and human physiological processes. This course parallels introductory courses offered at most colleges such as the University of Delaware and Delaware Technical and Community College. Prerequisites: Essentials of Health Careers and Chemistry.

*Offered at CHS*

## PUBLIC & COMMUNITY HEALTH

### FUNDAMENTALS OF HEALTH SCIENCES

HSC 6110  
1 SEMESTER  
1 CREDIT  
GRADES 10-11

This course introduces students to careers in healthcare. This course will explore the

# HEALTH SCIENCES

National Consortium for Health Science Education (NCHSE) National Health Science Standards, entry-level healthcare skills and the language of medicine. This course is offered as an articulated course with Delaware Technical Community College (BIO100 Medical Terminology). Students begin preparation for the NCHSE National Health Science Assessment.

*Offered at CHS*

**ESSENTIALS OF PUBLIC & COMMUNITY HEALTH**  
HSC 6210  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course introduces population health and the interdisciplinary approach to social and behavioral influences. Students learn the history of public and community health and a multi-disciplinary approach to health, which includes examining various organizations and healthcare delivery systems. Students explore complex health problems, major theories of disease etiology and intervention, and public health issues related to epidemiology, mental health, disabilities and substance abuse. Students are eligible to participate in Mental Health First Aid certification through the National Council for Behavioral Health (NCBH) and continue preparation for the NCHSE National Health Science Assessment. Prerequisite: Fundamentals of Health Sciences.

*Offered at CHS*

**PERSONAL WELLNESS**  
HSC 6310  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course introduces the Six Dimensions of Wellness, which include physical, social, intellectual, spiritual, emotional

and occupational wellness. Students learn basic nutritional requirements for healthy individuals, how exercise affects health, and methods of disease prevention. Students also explore factors that predispose individuals to unhealthy behaviors, along with key components of health behavior change. This course is offered as an articulated course through Wilmington University (HLT 321 Personal Wellness). At the completion of the program of study, students complete the NCHSE National Health Science Assessment. Prerequisite: Essentials of Public & Community Health.

*Offered at CHS*

## OTHER

Newark High School is pleased to offer a partnership with the University of Delaware's College of Health Sciences. This dual enrollment opportunity provides students an opportunity to broaden their exposure to the Health Science curriculum, earn a University of Delaware transcript with college credit and obtain use of the university library. Mentoring from current Health Sciences majors will be available to support students through the coursework. Classes will be taught on the Newark High School campus by university professors. A fee will be required for participation as well as academic performance prerequisites. Please talk to your school counselor for more information

**INTRODUCTION TO HEALTH SCIENCES**  
UNIVERSITY OF DELAWARE  
DUA 1030  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This is a dual enrollment course opportunity.

Successful completion of the course and it's requirements will allow the student to earn high school and college credit via the University of Delaware. Please contact your school counselor to find out more information about this course and other dual enrollment specifics.

*Offered at NHS*

**THE LANGUAGE OF MEDICINE**  
UNIVERSITY OF DELAWARE  
DUA 2030  
1-2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This is a dual enrollment course opportunity. Successful completion of the course and it's requirements will allow the student to earn high school and college credit via the University of Delaware. Please contact your school counselor to find out more information about this course and other dual enrollment specifics.

*Offered at NHS*

*\*Course is offered in 1 semester or 1 marking period format depending on the scheduling model offered by the school.*

# HOSPITALITY & TOURISM

This section includes courses in the Culinary Arts Pathway.

## CULINARY ARTS

### FOOD PREPARATION & PRODUCTION

FCS 1110 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course prepares students for careers in the food service industry. Topics include nutrition, preparing foods for a healthy lifestyle, safety, sanitation, organization of the work area, maintaining a safe working environment, measuring, and developing a positive attitude and a strong work ethic. Students practice honesty, reliability, punctuality, handling, taking initiative, good co-worker / supervisor relations, customer relations, listening skills, following directions and more. Students participate in local, state and national FCCLA competitions to build leadership, teamwork and workplace skills.

*Offered at GHS and NHS*

### ADVANCED FOOD PREPARATION & PRODUCTION

FCS 1210 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

In this course students apply industry standards to use commercial equipment and prepare standardized recipes. Students explore careers in the food service industry, creating a portfolio of career resources to prepare them for job seeking. Laboratory exercises emphasize reading, planning and designing restaurant menus, and guest speakers and chefs, culinary colleges and universities, and the military offers demonstrations that reinforce essential concepts and preparation skills. Students participate in local, state and national FCCLA competitions to build leadership, teamwork and workplace skills. Prerequisite: Food Preparation & Production.

*Offered at GHS and NHS*

## CULINARY PROFESSIONALS

FCS 1310 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course teaches advanced skills to help students become professionals in the food service industry. Students demonstrate independent skills in food preparation, planning and serving meals, good customer service, safety and sanitation, and the planning, preparation and execution of major events. Students update their portfolios, research colleges and universities, complete the college / workplace or military entrance process, and compete in events through the FCCLA and other related professional organizations. Prerequisite: Advanced Food Preparation & Production.

*Offered at GHS and NHS*

## ADVANCED CULINARY PROFESSIONALS

FCS 1410 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

In this course students complete coursework and testing with an opportunity to become ServSafe certified. Students focus on knowledge needed for the commercial restaurant setting in the areas of customer service, the dining experience, food service management, food service laws and regulations, commercial kitchen equipment and cost control techniques. Students create resumes for food service employment, after completing coursework in food service career opportunities, employability and job seeking skills. Prerequisite: Culinary Professionals.

*Offered at GHS and NHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# JOBS FOR DELAWARE GRADUATES

The Jobs for Delaware Graduates (JDG) program helps students reach academic and career goals, with a curriculum that features 16 school-to-work transition competencies per year.

All JDG students are eligible for membership in the Delaware Career Association (DCA), a youth organization that enhances classroom instruction with field trips, group activities and state conferences. The four goals of the DCA are leadership development, citizenship, social awareness and career preparation.

A JDG Specialist is available to assist students throughout the school year, in the summer and 12 months after graduation, to help them find jobs in the field of their choice.

**JDG 9**  
JDG 0910 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course covers study skills, personal grooming, goal plan, positive attitude, image assessment, autobiography, group dynamics, conflict resolution, life skills math, career path, leadership, decision making and coping with change.

*Offered at CHS, GHS and NHS*

**JDG 10**  
JDG 1010 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This course focuses on teamwork, courtesy, respect, goal setting, money management, problem solving, customer service and workplace diversity. Students learn how to understand insurances and write job applications. Prerequisite: JDG 9.

*Offered at CHS, GHS and NHS*

**JDG 11**  
JDG 1110 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course covers career vocabulary, listening skills, resumes, sources of jobs, phone skills, stress management, personal budgeting, self-directed search, career manual, verbal presentations, critical thinking, constructive criticism and professional ethics. Prerequisite: JDG 10.

*Offered at CHS, GHS and NHS*

**JDG 12**  
JDG 1210 (CTE)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course focuses on time management, letter of application, career attire, employment interview, job survival, business etiquette, employee rights, performance evaluations, pay and benefits, financial planning, career travel, letter of resignation and career portfolio. Students develop a Career Portfolio that includes a resume and references, sample job application, and recommendations. Prerequisite: JDG 11.

*Offered at CHS, GHS and NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# MATHEMATICS

The integrated mathematics program is a rigorous college preparatory program designed to connect algebra, geometry, statistics, discrete mathematics and trigonometry (Algebra / Geometry / Statistics) through active learning via explorations and experimentation; multi-data representations; verbal, visual and recursive thinking; and cooperative learning.

Heavy emphasis will be placed on modeling mathematics applications, using graphing calculators, math manipulatives, and other technology.

All topics addressed by the Delaware State High School Mathematics Content Standards are covered in course I and II. Graphing calculators and other appropriate technology will be used to enhance their studies.

## INTEGRATED MATHEMATICS I

**MAT 2110 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

In this course students collect and analyze data using graphs and summary statistics while developing skills in using linear equations to model and solve problems with constant rates of change along with other algebraic functions. Patterns and spatial visualization include similarity, symmetry, area, surface area and volumes. Students investigate and model situations involving chance and study experimental and theoretical probability.

*Offered at CHS and GHS*

## INTEGRATED MATHEMATICS II

**MAT 2210 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-10

This course covers modeling quadratic and other power models, exponential growth, and linear systems, with an emphasis on graphs and their properties. Students learn trigonometric functions and periodic change using real-world applications, along with coordinate geometry and the analysis of physical geometric phenomena with geometric shapes and their functions. Constructions are created using a compass and straightedge, and sides of a right triangle are determined using trigonometry. Students also study properties and proofs using transversals. Prerequisite: Integrated Mathematics I.

*Offered at CHS and GHS*

## HONORS ACADEMY MATH A

**MAT 2220**  
1 SEMESTER  
1 CREDIT  
GRADE 9

This rigorous course builds on ideas from Geometry and Algebra I, including basic terms and definitions, logic and reasoning, and a study of two and three-dimensional figures. Students participate in arduous collaborative projects at a fast pace equivalent to one chapter every two weeks.

*Offered at CHS*

## INTEGRATED MATHEMATICS II HONORS

**MAT 2220 (HON)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-10

This rigorous, fast-paced course builds on ideas from Integrated Mathematics I and extends them to more complex situations.

Students will model quadratic and other power models, exponential growth, and linear systems with an emphasis on graphs and their properties. Students learn trigonometric functions and periodic change using real-world applications, along with coordinate geometry and the analysis of physical geometric phenomena with geometric shapes and their functions. Constructions are created using a compass and straightedge, and sides of a right triangle are determined using trigonometry. Students also study properties and proofs using transversals. Prerequisite: Integrated Mathematics I.

*Offered at CHS, GHS and NHS*

## INTEGRATED MATHEMATICS III

**MAT 2310 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course continues the study of algebra, with a focus on solving problems by setting up a model and solving the equation symbolically. Students use inductive and deductive reasoning and discrete models of change to solve problems involving sequential and serial change. The study of statistics continues with the investigation of normal distributions and probability. Prerequisite: Integrated Mathematics II.

*Offered at CHS, GHS and NHS*

## HONORS ACADEMY MATH B

**MAT 2320**  
1 SEMESTER  
1 CREDIT  
GRADE 9

This rigorous course builds on ideas from Geometry and Algebra II, including basic terms and definitions, systems and quadratics, and polynomial and rational concepts in a study of functions. Students participate in arduous collaborative projects.

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# MATHEMATICS

This course moves at an advanced pace course, preparing students to move onto Pre-Calculus.

*Offered at CHS*

## INTEGRATED MATHEMATICS III HONORS

**MAT 2320 (HON)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This rigorous, fast-paced course builds on ideas from Integrated Mathematics I and extends them to more complex situations. This course continues the study of algebra, with a focus on solving problems by setting up a model and solving the equation symbolically. Students use inductive and deductive reasoning and discrete models of change to solve problems involving sequential and serial change. The study of statistics continues with the investigation of normal distributions and probability. Prerequisite: Integrated Mathematics II.

*Offered at CHS, GHS and NHS*

## CAMBRIDGE MATHEMATICS 9

**MAT 2340 (CM)**  
2 SEMESTERS  
1 CREDIT  
GRADE 9

This course covers all of the concepts in Integrated Mathematics III Honors plus additional advanced topics such as trigonometric functions, identities, and other topics usually found in Pre-Calculus. Prerequisite: Integrated Mathematics II.

*Offered at NHS*

## INTEGRATED MATHEMATICS IV: ALGEBRA

**MAT 2410 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course is designed for college-bound students who do not plan to major in mathematics, physics, chemistry or engineering. Topics include probability and statistics, polar coordinates and trigonometry.

This course covers modeling functions using linear, quadratic, exponential, logarithmic, and trigonometric models. Prerequisite: Integrated Mathematics III.

*Offered at CHS, GHS and NHS*

## INTEGRATED MATHEMATICS IV: STATISTICS

**MAT 2510 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course is designed for college-bound students who do not plan to major in mathematics, physics, chemistry or engineering. Topics include probability and statistics, polar coordinates and trigonometry. Students investigate linear, exponential and quadratic functions more in depth, while also studying normal distributions and sequences and series. This course emphasizes collecting and analyzing real-world statistical data. Prerequisite: Integrated Mathematics III.

*Offered at CHS, GHS and NHS*

## PRE-CALCULUS

**MAT 4110 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course is designed for students who plan to study calculus in high school or college, providing a strong foundation of pre-calculus concepts, techniques and applications using real-world problems and technology. Topics

include a review of linear, quadratic and polynomial functions, with emphasis on modeling real-world situations, trigonometry and analytic geometry, exponential and logarithmic functions, sequences, combinations, descriptive and inferential statistics and curve-fitting. Prerequisite: Integrated Mathematics III.

*Offered at CHS, GHS and NHS*

## PRE-CALCULUS HONORS

**MAT 4120 (HON)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course is designed for students who plan to study AP Calculus in high school or college-level calculus. This course provides a strong foundation of pre-calculus concepts and techniques with an emphasis on applications and the use of technology. Topics include a review of linear, quadratic and polynomial functions, with an emphasis on modeling real-world situations, trigonometry and analytic geometry, exponential and logarithmic functions, sequences, combinations, descriptive and inferential statistics and curve-fitting. Prerequisite: Integrated Mathematics III.

*Offered at CHS, GHS and NHS*

## CAMBRIDGE MATHEMATICS 10

**MAT 4140 (CM)**  
2 SEMESTERS  
1 CREDIT  
GRADE 10

This course covers all of the coursework in Pre-Calculus Honors and additional advanced topics from Calculus, including the conceptual and procedural understanding and the application of differentiating and integrating functions. Prerequisite: Cambridge Mathematics 9.

*Offered at NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# MATHEMATICS

## CALCULUS

**MAT 4210 (CP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course is designed for the college-bound student who will encounter calculus in college in a mathematics, science, business or finance major. Topics include limits, the derivative and the integral. Students explore derivatives of polynomial, rational, trigonometric, exponential and logarithmic functions, with an emphasis on real-world applications. Students use a graphing calculator extensively in this course. Prerequisite: Pre-Calculus.

*Offered at GHS and NHS*

## CALCULUS HONORS

**MAT 4220 (HON)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This rigorous course is designed for the college-bound student who will encounter calculus in college in a mathematics, science, business or finance major. Topics include limits, the derivative and the integral. Students explore derivatives of polynomial, rational, trigonometric, exponential and logarithmic functions, with an emphasis on real-world applications. Students will use a graphing calculator extensively in this course. Prerequisite: Integrated Mathematics IV or Pre-Calculus.

*Offered at CHS*

## AP CALCULUS AB

**MAT 4330 (AP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course parallels the first semester course in calculus that is given in most colleges. Concepts include the fundamentals of analytic geometry and functions, limits and

continuity, methods of differentiation with an emphasis on its application to maximum / minimum problems and velocity, and methods of integration with emphasis on area and volume. This course is designed to prepare students for the AP Calculus AB exam. Prerequisite: Pre-Calculus.

*Offered at CHS, GHS and NHS*

## AP CALCULUS BC

**MAT 4430 (AP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course parallels two semester courses in this subject given in college. All the topics of AP Calculus AB are covered, along with the analysis of parametric, polar and vector functions, Euler's method for differential equations, the geometric interpretation of differential equations via slope fields, the convergence or divergence of series, and Taylor series. This course is designed to prepare students for the AP Calculus BC exam. Prerequisite: Pre-Calculus.

*Offered at GHS and NHS*

## AP STATISTICS

**MAT 5130 (AP)**  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course is equivalent to a college-level introductory statistics course. Topics include experimental design, exploratory data analysis, probability distributions, and statistical inference. Students design and execute experiments and surveys determining sampling methods, performing data collection and data analysis. This course is designed to prepare students AP Statistics exam. Prerequisite: Integrated Mathematics III or Pre-Calculus.

*Offered at CHS, GHS and NHS*

## ALGEBRA I

**MAT 5510 (CP)**  
2 SEMESTERS  
1 CREDIT  
GRADE 9

This course expands on the students understanding of using arithmetic operations and properties to include the symbolic language of algebra. Students will formalize their understanding of functions with a focus on linear and quadratic functions. Other topics will include solving equations and inequalities, linear models, systems of linear equations and inequalities, nonlinear equations, exponents and exponential functions, polynomials and factoring, solving quadratic equations, radical functions, and statistics.

*Offered at NHS*

## GEOMETRY

**MAT 5510**  
2 SEMESTERS  
1 CREDIT  
GRADES 9-10

This course will teach the concepts of geometric thinking and spatial reasoning, geometric figures and their properties in two as well as three dimensions, the relationship between geometry and other mathematics and other disciplines, geometric structure, analyzing geometric relationships in order to make and verify conjectures, logical reasoning, and problem solving involving geometry, geometric patterns, coordinate systems, congruence, and similarity. Algebra I concepts will be used regularly during this course. Prerequisite: Algebra I.

*Offered at NHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*



# MATHEMATICS

## **MAT 308 INFERENCE STATISTICS**

WILMINGTON UNIVERSITY  
DUA 0030  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course introduces the student to the scientific method of collecting, organizing, and interpreting quantitative data in real-world applications. Topics include sampling methods, graphical displays, measures of central tendency and dispersion, linear regression and correlation, continuous and discrete probability distributions, confidence intervals for one-sample means and proportions, hypothesis testing for one- and two-sample population means, and goodness of fit hypothesis testing. Effective Fall 2017, this course requires a minimum passing grade of "C-." Prerequisite(s): MAT 205 with minimum grade of "C".

*Offered at GHS*

## **MAT 320 FINITE MATHEMATICS**

WILMINGTON UNIVERSITY  
DUA 0130  
1 SEMESTER  
1 CREDIT  
GRADE 12

This course provides a survey of selected topics in mathematics, with emphasis on problem solving and applications. Core topics include an introduction to logic, set theory, probability, systems of linear equations, and an introduction to linear programming. Additional topics may include an introduction to statistics and mathematics of finance, if time permits. Prerequisite(s): MAT 304, MAT 205, MAT 121 or college algebra equivalent.

*Offered at CHS*

## **MAT 330 DISCRETE MATHEMATICS**

WILMINGTON UNIVERSITY  
DUA 0230  
1 SEMESTER  
1 CREDIT  
GRADE 12

This course provides an introduction to discrete mathematics. Topics include sets, functions and relations, mathematical induction and logic, elements of number theory, counting techniques, recursion, graphs and trees, and an introduction to Boolean algebra. Applications in computer science are reviewed. Prerequisite(s): MAT 200 and MAT 320.

*Offered at CHS*

## **MAT 205 INTRODUCTORY SURVEY OF MATHEMATICS**

WILMINGTON UNIVERSITY  
DUA 0430  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course provides an introduction to a broad range of areas in mathematics, including algebra, probability, and statistics. Topics in algebra include solving and graphing linear, quadratic, and exponential functions in context. Topics in probability include counting principles, combination, permutations, compound and independent events. The statistics portion of the course covers measures of central tendency, measures of dispersion and the normal curve. Please note that the minimum passing grade for this course is "C." Prerequisite – Minimum score on the Math SAT of 530 or Accuplacer placement.

*Offered at GHS*

## **MAT 310 CALCULUS 1**

WILMINGTON UNIVERSITY  
DUA 0230  
1 SEMESTER  
1 CREDIT  
GRADE 12

After a brief review of classes of functions and their properties, this course focuses on students' understanding and application of limits, continuity, techniques for finding the derivative, use of the derivative in graphing functions, applications of the derivative, implicit differentiation, anti-derivatives, areas under the curve, the Fundamental Theorem of Calculus, integration by substitution and differential equations. Students are required to explain their reasoning graphically, numerically, analytically, and verbally. At the conclusion of this course students will be asked to evaluate the course based on the following objectives: 1) gain factual knowledge (terminology, classifications, methods, trends); 2) learn fundamental principles, generalizations or theories; and 3) learn to apply course material (to improve thinking, problem solving and decisions). Prerequisite: MAT 205

*Offered at GHS*

# NAVY JUNIOR ROTC

This section includes courses in the Navy Junior ROTC Pathway.

In these courses, cadets are required to wear the Navy uniform once a week and follow Navy uniform and grooming regulations. Cadets also participate in physical training once a week.

## **NAVAL SCIENCE I** ROT 3110 FULL YEAR 2 CREDITS GRADES 9-10

This course introduces the precepts of citizenship, the elements of leadership and the value of scholarship in attaining life goals. This course also engenders a sound appreciation for the heritage and traditions of the United States with a focus on the historical significance of sea power. This course helps students to develop a sense of pride in community, school, unit, associates and self, with a focus on self-discipline. Though not required, participation in extracurricular activities and field trips sponsored by the NJROTC is highly encouraged.

*Offered at CHS*

## **NAVAL SCIENCE II** ROT 3210 FULL YEAR 2 CREDITS GRADES 10-11

This course further develops the traits of citizenship and leadership. This course employs historical references in the development of sea power and the U.S. Navy, with a focus on world events in which the U.S. Navy had a significant influence. With an introduction to the technical areas of naval science study, this course engenders a deeper awareness of the vital importance of the world's oceans to the continued well-being of the U.S. Participation in extra-curricular activities and field trips is highly encouraged. Prerequisite: Naval Science I.

*Offered at CHS*

## **NAVAL SCIENCE III** ROT 3310 FULL YEAR 2 CREDITS GRADES 11-12

This course further develops the traits of citizenship and leadership in students. This course builds on discipline and leadership, with an introduction to military law, Naval operations and seamanship. This course familiarizes cadets with Navy life at sea and develops a deeper appreciation for the role the Naval Service and its sailors perform in defending our nation. Cadets practice leadership in drill and uniform inspection. Participation in extra-curricular activities and field trips is highly encouraged. Prerequisite: Naval Science II.

*Offered at CHS*

## **NAVAL SCIENCE IV** ROT 3410 FULL YEAR 2 CREDITS GRADE 12

This course continues to develop leadership and citizenship in students. This course utilizes self-paced study of cultural studies and global awareness, with a focus on U.S. foreign interactions. This course introduces cadets to ethics of leadership using critical thinking skills. Cadets practice leadership in drill, uniform inspection and classroom instruction. Participation in extra-curricular activities and field trips is highly encouraged. Prerequisite: Naval Science III.

*Offered at CHS*

# PERFORMING & DESIGN ARTS: CHORAL MUSIC

This section includes courses in the Choral Music Pathway and Performing Arts Pathway.

## **CHORUS** MUS 1010 1-2 SEMESTERS\* 1-2 CREDIT GRADES 9-11

This performance-based course is intended for students who demonstrate abilities and interests in choral singing. Students will perform beginner to intermediate choral literature spanning various genres, including classical, multicultural, and contemporary.

*Offered at CHS, GHS and NHS*

## **ADVANCED CHORUS** MUS 1410 1 SEMESTER 1 CREDIT GRADES 10-12

This performance-based course is intended for students who demonstrate outstanding abilities in choral singing. Students will perform advanced choral literature spanning various genres, including classical, multicultural and contemporary. Students will also gain a mastery of vocal techniques and musical concepts such as sight reading musical notation.

*Offered at CHS and GHS*

## **AUDITIONED CHOIR (SHOW CHOIR / ADVANCED CHOIR)** MUS 1910 / MUS 1410 2 SEMESTERS 1 CREDIT GRADES 10-12

This course is for highly motivated students who have taken a previous choir course (Choir 1-3), passed a singing / dancing audition, and completed the musician's contract. Designed for musicians who wish to sing more challenging repertoire, this course emphasizes active participation and performance, tone quality, expression, diction, blend, breath support, musical discrimination, and interpretation. This choir performs outside the school day and attendance is mandatory. This choir will perform literature on its own and with other ensembles.

*Offered at NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# PERFORMING & DESIGN ARTS: INSTRUMENTAL MUSIC

This section includes courses in the Instrumental Music Pathway and Performing Arts Pathway.

## BAND

**BAND FRONT**  
MUS 2010  
1 SEMESTER  
1 CREDIT  
GRADES 9-12

Auditions for this ensemble occur in the spring. All students selected will participate with the marching band. There will be a mandatory band camp the second and third weeks of August. Students are required to perform at all football games, competitions, and parades. Audition required. Prerequisite: There is a mandatory Band Camp in early to mid-August. This is an expectation for this course.

*Offered at CHS*

**MARCHING BAND**  
MUS 2110 (RC)  
1 SEMESTER  
1 CREDIT  
GRADES 9-12

This band performs at all football games, competitions and parades. Students must participate in a mandatory band camp the second and third weeks of August. The drum line will have auditions during the last week of May. Prerequisite: Prior experience playing an instrument. Audition required. Prerequisite: There is a mandatory Band Camp in early to mid-August. This is an expectation for this course.

*Offered at CHS and GHS*

**CONCERT BAND**  
MUS 2410 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This course is for students who play wind instruments. It is a full-year course with two basic components: Marching Band (August to November) and Concert Band (November to June). During the marching season, the band performs at football games, festivals, competitions and parades. During the concert season, the band performs 3 concerts and special music events. This course requires rehearsals outside of school for the marching band season including band camp (early- to mid-August) and evening rehearsals during the school year. This course emphasizes improving instrumental technique and performance practices. Audition required.

*Offered at CHS, GHS and NHS*

**ADVANCED CONCERT BAND**  
MUS 2610 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course is for students who play wind instruments. It is a full-year course with two basic components: Marching Band (August to November) and Concert Band (November to June). During the marching season, the band will perform at football games, festivals, competitions and parades. During the concert season, the band performs 3 concerts per year as well as other special music events. This course requires rehearsals outside of school for the marching band season including band camp (early- to mid-August) and evening rehearsals during the school year. Audition required.

*Offered at GHS and NHS*

# PERFORMING & DESIGN ARTS: INSTRUMENTAL MUSIC

## STEEL DRUM BAND

MUS 2710 (RC)  
1 SEMESTER  
1 CREDIT  
GRADES 9-12

In this ensemble students perform modern and traditional steel band literature and develop musical competence on a steel band instrument while focusing on stylistic understanding, improvisation, and comprehension of chords. Performances include winter and spring concerts, District Band, school and community events and the Delaware Steel Band Festival. Prerequisite: Prior experience playing an instrument.

*Offered at CHS and GHS*

## ADVANCED STEEL DRUM BAND

MUS 2910  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course will cover many genres including classical, jazz, Latin, rock and traditional island music such as calypso and soca. Students will learn scales, chord patterns and several different pieces for the steel band. Students will learn basic music terminology such as meter, tempo, style, duration, scales and rhythm. Students are required to perform in various performances throughout the semester.

*Offered at CHS and GHS*

## PERCUSSION ENSEMBLE

MUS 3610 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

All percussion students should register for this course instead of band. Students will still participate in the marching band and concert

band, but this course focuses on percussion techniques with the first part focusing on marching percussion techniques, and the second part focusing on concert percussion techniques. Students are required to read music and perform at all marching and concert performances. Audition required.

*Offered at CHS, GHS and NHS*

## JAZZ ENSEMBLE

MUS 3710 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This ensemble provides musical experience for pop music, jazz, jazz / rock, dance, and stage band music, with performances for school functions, concerts and music festivals. Students will learn and perform various styles of jazz performance. Improvisation is a major focus of the course. Students who register for this course may also be required to enroll in one of the other performance ensembles. Audition required.

*Offered at GHS and NHS*

## ORCHESTRA

ORCHESTRA  
MUS 3010 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This is an entry-level performing group that meets as a daily class. Students learn basic skills and explore string literature of various styles through rehearsal, analysis and performance. The curriculum provides opportunities for string students (violin, viola, cello and bass) to perform music for solo, small group and ensemble. Graded criteria

include public performances beyond the school day. A student-owned instrument may be required.

*Offered at CHS, GHS and NHS*

## INTERMEDIATE ORCHESTRA

MUS 3210 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This intermediate performing group meets as a daily class. Students explore string literature of various styles through rehearsal, analysis, skill development and performance. The curriculum provides opportunities for string students (violin, viola, cello, bass) to perform music for solo, small group and ensemble. Graded criteria includes public performances beyond the school day. A student-owned instrument may be required. Audition required: Students must demonstrate the ability to perform grade level 2 repertoire.

*Offered at GHS and NHS*

## ADVANCED ORCHESTRA

MUS 3410 (RC)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This advanced performing ensemble meets as a daily class. Students explore orchestral literature of various styles and periods through rehearsal, analysis, research, skill development and performance. There will be opportunities for string students (violin, viola, cello and bass) to perform music for solo, small group and ensemble. Graded criteria includes public performances beyond the school day. A student-owned instrument may be required. Audition required: Students must demonstrate ability to tune their own instruments and perform grade level 3

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# PERFORMING & DESIGN ARTS: INSTRUMENTAL MUSIC

repertoire.

*Offered at GHS and NHS*

## OTHER

### GIUITAR

MUS 4110  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This course teaches the basics of guitar playing. Students learn to play a variety of music by studying music reading, good practice habits, ensemble skills and improvisation. Students will increase their awareness of different musical styles, cultures and historical periods. Students must provide their own guitar.

*Offered at CHS, GHS and NHS*

### PIANO

MUS 4410  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This is an introductory course for students with no prior piano instruction. Students will learn basic keyboard fundamentals and techniques such as reading and locating notes, hand positions, chord structures, scales and fingering patterns.

*Offered at CHS, GHS and NHS*

### ADVANCED PIANO

MUS 4610  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This performance-based course is intended for students who are interested in gaining a mastery of playing the piano. Topics include

advanced piano techniques, repertoire and music theory. There will be individual practice and group performances.

*Offered at CHS*

### MUSIC EXPLORATION

MUS 9110  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

In this course students explore the National Standards as listeners, creators and performers, with technology enhancing the interactive experience when possible. No previous musical experience is required; however, students will be actively engaged in the creative process, requiring open-ended problem-solving while exploring multiple solutions to a given problem. In order to foster independent musicianship, students must be able to think abstractly and work independently.

*Offered at GHS and NHS*

### MUSIC THEORY

MUS 9210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This course provides the serious music student with the skills needed for thorough analysis of music. Topics include ear training, melodic dictation and keyboard harmony, part writing techniques, form and analysis. Students will also be involved in creative writing, transposing, arranging and conducting. Students must be proficient at reading music.

*Offered at CHS, GHS and NHS*

### MUS 101 MUSIC APPRECIATION

WILMINGTON UNIVERSITY

DUA 7030

1 SEMESTER

1 CREDIT

GRADES 11-12

This course increases the student's comprehension and perception of music. Each developmental period will be discussed (i.e. Middle Ages, Renaissance, Baroque, etc.) in terms of the historical background, social influences, characteristics, styles, composers, representative compositions, and performance media. Prerequisite: Completed Performing and Design Arts Pathway.

*Offered at CHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# PERFORMING & DESIGN ARTS: THEATER

This section includes courses in the Performing Arts Pathway and Theater Pathway.

## INTRODUCTION TO THEATER

PAR 1110  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This course introduces a wide variety of experiences in the world of theater and provides a look at modern trends. Students experiment with writing and performing their own plays along with previously written works, with the goal of improving their ease with performance and public speaking. Some play reading is required but public performances are not.

*Offered at GHS and NHS*

## ADVANCED THEATER

PAR 1210  
1 SEMESTER  
1 CREDIT  
GRADES 10-12

This course offers a closer study of the world of theater and modern trends. Students experiment with writing and performing their own plays along with previously written works, with the goal of improving their ease with performance and public speaking. Play reading and public performances are required. Prerequisite: Theater I: Introduction to Performance.

*Offered at NHS*

**ACTING II**  
PAR 1310  
2 SEMESTERS  
1 CREDIT  
GRADES 10-12

This course explores voice and movement techniques for the stage. Through yoga practice, partner stretches, trust-building exercises, visualization and mindfulness practices, students learn a variety of movement practices, techniques and forms to enhance their vocal and physical strength and flexibility. Topics include kinesthetic awareness, movement and sound storytelling, diction and articulation, physical self-awareness and flexibility, movement techniques used throughout theater history, and physical improvisational exercises. Prerequisite: Introduction to Theater.

*Offered at NHS*

**ACTING III**  
PAR 1410  
2 SEMESTERS  
1 CREDIT  
GRADES 10-12

In this course students explore methods of character development and experiment with character roles. Topics include long-form improvisation, commedia dell'arte, spontaneous playing and the art of being in the moment. This course introduces the purpose, scope and history of theater experiences for children.

*Offered at NHS*

## MODERN AND CONTEMPORARY AMERICAN THEATER SCENE STUDY

PAR 1510  
2 SEMESTERS  
1 CREDIT  
GRADES 9-12

This course offers an intensive study of contemporary drama. Students learn how to read plays, how to discuss plays in groups and individually, how to see plays in performance and finally, how to write about plays. Students examine how plot, character, aural and visual elements of production combine to form a unified work across genre, styles and periods.

*Offered at NHS*

## TECHNICAL THEATER I

PAR 4110  
2 SEMESTERS  
1 CREDIT  
GRADES 9-12

In this course students learn the basics of set design and construction, lighting design, sound design, costume design, prop design, stage management, and the day-to-day operation and maintenance of a theater.

*Offered at NHS*

## TECHNICAL THEATER II

PAR 4210  
2 SEMESTERS  
1 CREDIT  
GRADES 10-12

This course continues the study of technical theater with exploration of costuming, props, make-up, scenic design, stage management, sound design and basic lighting design.

*Offered at NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# PERFORMING & DESIGN ARTS: VISUAL ARTS

This section includes courses in the Visual Arts Pathway.

## ART FUNDAMENTALS

ART 1010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-12

This course covers a wide variety of media and techniques in drawing, painting, sculpture, ceramics and printmaking, with an emphasis on the elements of art and principles of design. This class provides the necessary foundation of art concepts and skills and is a prerequisite for all other art classes.

*Offered at CHS, GHS and NHS*

## ART FUNDAMENTAL HONORS

ART 1510 (HON)  
1 SEMESTERS  
1 CREDIT  
GRADES 9-11

This course covers a wide variety of materials, and processes from sculpture and ceramics, to paint and print media. Students in Art Fundamentals have demonstrated an interest in art as a course of study and work to develop the concepts of the Elements of Art and the Principles of Design through deeper exploration and more challenging projects.

*Offered at GHS*

## 2-D DESIGN I

ART 2110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course introduces students to different media, techniques and processes to create predominantly 2-D works of art as they

pertain to the elements and principles of design. In this course students explore techniques such as drawing, painting, printmaking, collage and mixed media, while studying historical works of art. Prerequisite: Art Fundamentals.

*Offered at CHS, GHS and NHS*

## 2-D DESIGN II

ART 2210 (CP)  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course continues the study of elements and principles of design as students advance in their technique and develop their personal style through experimentation of drawing, painting, printmaking, collage and mixed media. Students also continue their study of art history. Prerequisite: 2-D Design I.

*Offered at CHS and GHS*

## 2D ART AND DESIGN

ART 2430 (AP)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course is for highly motivated students who have a strong interest in the study of art. Design involves purposeful decision making about how to use the elements and principles of art in an integrative way. For this portfolio, students must demonstrate mastery of 2-D design through any 2-D medium or process, including graphic design, digital imaging, photography, collage, fabric design, weaving, fashion, fashion illustration, painting and printmaking. Fees may apply. Prerequisites: 2-D Design I and Portfolio. Recommended additional courses: Advanced Drawing or Advanced Painting / Printmaking.

*Offered at NHS*

## HONORS PORTFOLIO

ART 2520 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course is designed to prepare talented juniors for the 2-D and 3-D Studio Art-AP courses in their senior year. Students will create projects based on a series of assignments that are planned to enhance their skill and understanding of composition, technique, and the design elements and principles. Students will work in several different media to improve their ability and talent. Working side by side with senior AP students, they will be engaged in discussing and reflecting on their projects to gather insight into the AP course process of higher standards and added rigor. Prerequisite: 2-D Design I (NHS), completed art pathway (CHS).

*Offered at CHS and NHS*

## ADVANCED DRAWING

ART 2610 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students build upon what they learned in 2-D Design I to develop skillfully rendered drawings in different media. Student will develop their personal style while analyzing the techniques of famous artists. Prerequisite: 2-D Design I.

*Offered at GHS and NHS*

## ADVANCED PAINTING / PRINTMAKING

ART 2710 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course explores painting and printmaking techniques and processes, helping students broaden their knowledge and improve their

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*



# PERFORMING & DESIGN ARTS: VISUAL ARTS

painting and printmaking skills. Students will develop their personal style while analyzing the techniques of famous artists. Prerequisite: 2-D Design I or Art Fundamentals.

*Offered at CHS, GHS and NHS*

**AP DRAWING**  
ART 2830 (AP)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course is designed for students who are seriously interested in the practical experience of art. The Drawing Portfolio is intended to address a very broad interpretation of drawing issues and media. Line quality, light and shade, rendering of form, composition, surface manipulation, the illusion of depth and mark-making are drawing issues that can be addressed through a variety of means. Fees may apply. Prerequisites: Portfolio and Advanced Drawing.

*Offered at NHS*

**3-D DESIGN I**  
ART 3110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

In this course students will create 3-D pieces of art using various materials and techniques including additive, subtractive and constructive methods from relief to full round. Materials include clay, plaster, cardboard, found objects, balsa wood, wire and paper mache. This course uses elements of art and principles of design of traditional and contemporary methods throughout history. Prerequisite: Art Fundamentals.

*Offered at CHS, GHS and NHS*

**3-D DESIGN II**  
ART 3210 (CP)  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

In this advanced course, students continue to explore the complex techniques introduced in 3-D Design I. Students use their own elements and principles of design as they develop their personal style, explore advanced materials, and study classical to contemporary sculpture. Prerequisite: 3-D Design I.

*Offered at CHS and GHS*

**3D ART AND DESIGN**  
ART 3430 (AP)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course is for very serious, talented and committed students who plan to pursue an art-related field after graduation. This course requires each student to compile a strong collection of original art projects that demonstrate their personal talent and ability. Students submit a portfolio demonstrating quality, concentration and breadth of work in 3-D art. Portfolios are judged at the national level on a scale of 1 to 6. Students achieving a score of 3 or better may earn college credits. The course is intended to address a broad interpretation of sculptural issues in depth and space using additive, subtractive and fabrication processes. Approaches include traditional sculpture, architectural models, ceramics, 3-D fiber arts and metal work. There is more flexibility in both interpretation of assignments and deadlines; however, because of the demands of this course, each student should plan on a minimum of 4 hours of work per week outside of class in order

to complete the portfolio. Fees may apply. Prerequisite: 3-D Design I or Advanced Ceramics.

*Offered at NHS*

**ADVANCED CERAMICS I**  
ART 3510 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students build skills using the potter's wheel and experiment with more complex forms and techniques. Students will also continue to explore various hand-building techniques and mold-making processes. Prerequisite: 3-D Design I.

*Offered at CHS, GHS and NHS*

**DIGITAL PHOTOGRAPHY I**  
ART 4110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course offers an introduction to photography. Students develop a general knowledge and appreciation of photography from an historical perspective and learn to use professional Digital SLR cameras. Students will explore the elements and principles of Photography as well as photographic composition and creative use of light and focus. Students will develop rudimentary skills in Adobe Photoshop. Students are encouraged to but are not required to own their own Digital SLR camera. Prerequisite: Art Fundamentals or Art Fundamentals Honors.

*Offered at CHS, GHS and NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# PERFORMING & DESIGN ARTS: VISUAL ARTS

## DIGITAL PHOTOGRAPHY II

ART 4210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course continues the exploration of digital photography with students developing skills in photography, and photo manipulation working in Adobe Illustrator. Projects in this class will be more challenging and expect students to have a working knowledge of digital SLR cameras, lighting, and Adobe Photoshop. Students are encouraged to but are not required to own their own Digital SLR camera. Prerequisite: Digital Photography I

*Offered at CHS, GHS and NHS*

## PHOTOGRAPHY III

ART 4310 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This lecture-laboratory course in black-and-white photography coordinates a photographic visual discipline with a comprehensive digital workflow experience. Students must have access to a digital point and shoot camera or DSLR that is 8 megapixels or larger. Prerequisite: Photography II.

*Offered at GHS and NHS*

## ART 230 / HIS 230 HISTORY OF ART AND DESIGN

WILMINGTON UNIVERSITY  
DUA 4030  
1 SEMESTER  
1 CREDIT  
GRADE 11-12

This course studies the artistic trends and developing technologies that have influenced creative work throughout Europe

and America. This course focuses on the relationship between design and art, as well as the artist's role and influence on Western Culture and Society. Prerequisite: Completed Art Pathway.

*Offered at CHS*

## DRAWING AND PAINTING WILMINGTON UNIVERSITY

DUA 4130  
1 SEMESTER  
1 CREDIT  
GRADE 11-12

In this hands-on studio course for non-art majors, students will explore the use of both drawing and painting media. Learn to create works of art refined by a variety of skills and techniques to develop and express your individual artistic style. Prerequisite: Completed Art Pathway.

*Offered at CHS*

## BASIC PHOTOGRAPHIC TECHNIQUES

WILMINGTON UNIVERSITY  
DUA 7130  
1 CREDIT  
GRADES 11-12

Students will develop basic photographic skill sets in composition, lighting and angles to create compelling images. This class will concentrate on the exposure matrix to demonstrate how ISO, shutter speed and aperture effect exposure, motion and depth of field. Composition will be studied through the analysis of historic and contemporary photographs so that the students will be able to create compelling imagery. Adobe Bridge and Photoshop will be used for basic editing and image adjustments. Prerequisite: Completion of three (3) Performing & Design Arts: Visual Arts pathway courses.

*Offered at CHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# SCIENCE

## EARTH / PHYSICAL SCIENCE

### EARTH / PHYSICAL SCIENCE

SCI 1010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course exposes students to three major branches of science: chemistry, physics, and Earth / physical science. During the chemistry portion of the course, students will learn the foundations of chemistry that they will build on throughout high school. The physics part of the course builds on the 8th-grade energy unit and integrates into the Earth / physical science curriculum through plate tectonics and rocks and minerals.

*Offered at CHS, GHS and NHS*

### EARTH / PHYSICAL SCIENCE HONORS

SCI 1020 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course exposes students to three major branches of science: chemistry, physics, and Earth / physical science. During the chemistry portion of the course, students will learn the foundations of chemistry that they will build on throughout high school. The physics part of the course builds on the 8th-grade energy unit and integrates into the Earth / physical science curriculum through plate tectonics and rocks and minerals.

*Offered at CHS, GHS and NHS*

### CAMBRIDGE SCIENCE 9: EARTH & SPACE

SCI 1540 (CM)  
2 SEMESTERS  
1 CREDIT  
GRADE 9

This course covers much of the Cambridge Physical Science curriculum. Topics include acids bases, chemical reactions, statics and radioactive decay. Also included is a unit

introducing the theory of plate tectonics. This course covers the Delaware Science Standards for grade 9.

*Offered at NHS*

## BIOLOGY

### BIOLOGY

SCI 2010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This course explores the nature of science and the theory of evolution by natural selection. Students learn the chemical basis of many life processes and investigate the storage of genetic information in DNA, its transmission and its expression during protein synthesis. Students also investigate the application of these topics to biotechnology.

*Offered at CHS, GHS and NHS*

### BIOLOGY HONORS

SCI 2020 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This rigorous course is for highly motivated students with strong inquiry skills and an interest in careers in science, medicine or engineering. Students will explore the nature of science, the theory of evolution by natural selection, the chemical and cellular basis of many life processes, and the storage of genetic information in DNA, its transmission and its expression during protein synthesis. Students will also investigate the application of these topics to biotechnology. Prerequisite: Earth / Physical Science.

*Offered at CHS, GHS and NHS*

### AP BIOLOGY

SCI 2030 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course aims to help students develop a conceptual framework for modern biology and gain an appreciation of science as a process. Prerequisites: Biology and Chemistry.

*Offered at CHS, GHS and NHS*

### CAMBRIDGE BIOLOGY

SCI 2040 (CM)  
2 SEMESTERS  
1 CREDIT  
GRADE 10

This laboratory course includes a curriculum that provides a foundation in biological concepts plus the opportunity to utilize principles of experimental design in laboratory inquiry. The course covers characteristics and classification of living organisms, organization and maintenance of organisms, reproduction, inheritance, continuity of life, and the relationships of organisms to one another and to their environment. Delaware content standards are in addition of an evolution unit from the Cambridge Curriculum. Note: This course may utilize animal dissection techniques. Recommended: Cambridge Science 9: Earth & Space.

*Offered at NHS*

### MICROBIOLOGY

SCI 2210 (CP)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course engages students in a rigorous curriculum about the microscopic world. This course is intended as an addition to courses such as Biology Honors, Cambridge Biology and AP Biology. Students explore the mechanics of microscopy, the different

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# SCIENCE

forms and methods of microscopy, and the amazing microscopic world visible through a microscope. Various living organisms such as bacteria, fungi and protozoa will be examined and discussed, and microscopic examination of animal and plant tissues will be explored. Topics include the clinical and environmental aspects of microscopic organisms, and the structure, metabolism, growth and genetics of prokaryotes and microscopic eukaryotes. This course is designed for students who plan to pursue a career in biology, healthcare, forensic science or veterinary medicine.

*Offered at NHS*

## CHEMISTRY

**CHEMISTRY**  
SCI 3010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course is designed for college-bound students who may not be planning to pursue a career or course of study in the sciences. Topics include the nature of matter, atomic theory, bonding, chemical reactions, stoichiometry, solutions and gas laws. This course will be less theoretical and more descriptive than Chemistry Honors with practical applications stressed in both lecture and laboratory.

*Offered at CHS, GHS and NHS*

**CHEMISTRY HONORS**  
SCI 3020 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 11

This course is designed for college-bound students who plan to pursue a degree in a science-related field such as medicine or engineering. Students will learn the basic theoretical concepts of chemistry in

a quantitative fashion, with an emphasis on problem-solving and the application of mathematics to chemical theory. Through laboratory work students will explore fundamental chemical relationships and become more familiar with basic chemical laboratory techniques and procedures. Prerequisite: Biology.

*Offered at CHS, GHS and NHS*

**AP CHEMISTRY**  
SCI 3030 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course is designed to be the equivalent of the general chemistry course usually taken during the first year of college. Students will gain an understanding of chemistry fundamentals and develop competence in solving chemical problems. In this highly rigorous, fast-paced course, students develop higher order thinking skills and communication skills. Laboratory work focuses on quantitative studies of chemical systems with analysis and interpretation of student-generated data. Students should check with the AP Chemistry teacher for summer readings and work prior to the start of the course. Prerequisite: Chemistry or Cambridge Science.

*Offered at GHS and NHS*

## PHYSICS

**PHYSICS**  
SCI 4010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This survey course is designed for students who plan to enter careers other than science or engineering. Topics include Newtonian mechanics, waves, fluid mechanics, sound,

energy, heat, light, optics, electricity, magnetism and modern physics. Students perform extensive laboratory work using computers with the latest probe technology and using traditional equipment. This course explains the concepts of trigonometry and uses them extensively. Prerequisites: Chemistry and Integrated Mathematics III.

*Offered at CHS, GHS and NHS*

**PHYSICS HONORS**  
SCI 4020 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This survey course is designed for students who may not plan to pursue a career in science, but who will need a non-calculus based physics course in college. Topics include Newtonian mechanics, waves, fluid mechanics, sound, energy, heat, thermodynamics, light, optics, electricity, magnetism and modern physics. Students perform extensive laboratory work using computers with the latest probe technology and using traditional equipment. Prerequisites: Chemistry and Pre-Calculus.

*Offered at CHS, GHS and NHS*

**AP PHYSICS C: MECHANICS**  
SCI 4030 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course prepares students for the AP Physics C exam on Newtonian mechanics. This course is designed for students in grades 11 or 12 who are interested in a career in science (e.g., medicine, engineering, chemistry, physics). Students use algebra, trigonometry and calculus to formulate principles and solve problems. Students are expected to review notes, work on homework problems, and complete review problems outside of the school day. Prerequisites:

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# SCIENCE

Biology and Pre-Calculus.

*Offered at NHS*

## AP PHYSICS C: ELECTRICITY AND MAGNETISM

SCI 4130 (AP)

2 SEMESTERS

1 CREDIT

GRADE 12

This course prepares students for the AP Physics C exam on electricity and magnetism. Students use algebra, trigonometry and calculus to formulate principles and solve problems. This course is designed for students in grade 12 who are interested in a career in science (e.g., medicine, engineering, chemistry, physics). Students are expected to review notes, work on homework problems, and complete review problems outside of the school day. Prerequisites: AP Physics C: Mechanics, Chemistry and AP Calculus.

*Offered at NHS*

## OTHER

## ANATOMY AND PHYSIOLOGY

SCI 5010 (CP)

1-2 SEMESTERS\*

1 CREDIT

GRADES 11-12

This course is designed for students who plan to pursue a career in healthcare, forensic, veterinary or sports medicine. Using biology, chemistry and physics, students learn the parts of the body and their function in the human body. Students are required to perform actual dissection (no virtual dissection) in order to prepare them for laboratory experience in college. Student are also challenged to think critically, learn medical terms, and discuss actual clinical cases.

*Offered at CHS and GHS*

## INTRODUCTION TO FORENSICS

SCI 5810 (CP)

1 SEMESTER

1 CREDIT

GRADES 11-12

This course is designed for students who have a strong interest in science-related fields and careers in forensics. This course presents the basic theoretical concepts and investigations of simulated and historical crime scenes, with case studies used to supplement laboratory exercises that cover a number of forensic topics such as crime science mapping, fingerprints, tire tracks, fibers, blood serum, splatter trajectories, trace evidence, insect larva, DNA analysis, ballistics, dental records, autopsy reports, physical anthropology, and handwriting analysis.

*Offered at CHS and GHS*

## NATURAL DISASTERS

SCI 6510 (CP)

2 SEMESTERS

1 CREDIT

GRADE 12

This course introduces the different natural disasters that affect humans and other living organisms on the earth. Topics include hurricanes, tornadoes, earthquakes, volcanoes, floods and asteroid impacts. This course features readings on current events, discussions, videos and lab activities. A research presentation is required. Approval from counselor required.

*Offered at NHS*

## AP ENVIRONMENTAL SCIENCE

AGR 7430 (AP)

1-2 SEMESTERS\*

1 CREDIT

GRADE 12

This course teaches the scientific principles, concepts and methodologies required to understand the interrelationships of the natural world, to identify and analyze

environmental problems both natural and human-made, to evaluate the relative risks associated with these problems and to examine alternative solutions for resolving or preventing them. Prerequisite: Chemistry.

*Offered at CHS and NHS*

## ASTRONOMY

WILMINGTON UNIVERSITY

DUA 6630

1 SEMESTER

1 CREDIT

GRADES 11-12

Students in this course will gain an understanding of the sun and other stars, planets, comets, asteroids, and galaxies in the universe. Emphasis is placed on discovering how happenings in the universe affect everyday life. Stargazing field trips will take place when skies are clear. Prerequisite: Completion of three (3) Science pathway courses.

*Offered at CHS*

## ENVIRONMENTAL SCIENCE

WILMINGTON UNIVERSITY

DUA 6730

1 SEMESTER

1 CREDIT

GRADE 12

This course identifies the causes of environmental degradation and examines current efforts toward correcting a variety of complex environmental situations. Emphasis is placed on the role of humans using science and technology to find solutions to the problems facing earth.

*Offered at CHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# SCIENCE, TECHNOLOGY, ENGINEERING & MATHEMATICS

This section includes courses in the Biomedical Sciences Pathway, Computer Science Pathway, Drafting & Design Pathway and Engineering Pathway.

## BIOMEDICAL SCIENCES

### PRINCIPLES OF BIOMEDICAL SCIENCE

STS 2110  
1 SEMESTER  
1 CREDIT  
GRADES 9-10

In this course students explore concepts of biology and medicine to determine the factors that led to the death of a fictitious person by examining autopsy reports, investigating medical histories, and exploring medical treatments that might have prolonged the person's life.

*Offered at GHS*

### HUMAN BODY SYSTEMS

STS 2210  
1 SEMESTER  
1 CREDIT  
GRADES 10-11

This course examines the interactions of the human body system, identity, power, movement, protection and homeostasis. Students use data acquisition software to monitor body functions such as muscle movement, reflex and voluntary action, and respiration. Prerequisite: Principles of Biomedical Science.

*Offered at GHS*

### MEDICAL INTERVENTIONS

STS 2310  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

In this course students follow the life of a fictitious family as they investigate how to prevent, diagnose and treat disease. Students explore how to detect and fight infection; screen and evaluate the code in human DNA; evaluate cancer treatment options; and prevail when the organs of the body begin to fail. Prerequisite: Human Body Systems.

*Offered at GHS*

## COMPUTER SCIENCE

### EXPLORING COMPUTER SCIENCE

TEC 4110 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 9-10

This course introduces students to the field of computer science through an exploration of engaging and accessible topics. This course focuses on conceptual ideas of computing that will help students understand why certain tools or languages might be utilized to solve problems that relate to everyday life. Students learn to create websites using HTML, develop apps using the block-based programming language Scratch, and learn the principles of robotics. The course has an overall theme of collaboration, creativity and problem solving.

*Offered at NHS*

### AP COMPUTER SCIENCE PRINCIPLES

TEC 4210 (AP - CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 10-11

Students will learn how technology has impacted today's society and people. Topics include the internet, digital information, algorithms & programming, big data & privacy, and building apps. At the end of the course, students will be required to complete a portfolio of their learning and have the opportunity to take a 75-question AP Examination. Prerequisite: Exploring Computer Science.

*Offered at NHS*

### AP COMPUTER SCIENCE A

TEC 4310 (AP - CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course emphasizes object-oriented programming methodology with a concentration on problem solving and algorithm development. This course includes the study of data structures, design and abstraction. A large part of the course is built around the development of computer programs that correctly solve a given problem, while developing the use of logic and formal methods of programming. Prerequisite: AP Computer Science Principles.

*Offered at NHS*

# SCIENCE, TECHNOLOGY, ENGINEERING & MATHEMATICS

## DRAFTING & DESIGN

### DRAFTING AND DESIGN I - CAD I

TEC 3110 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 9-10

This course is an introduction to the basic language and art of technical drawing used by engineers, technicians and draftsmen. It provides a foundation for students to build on at a technical college, university, or vocational program to seek jobs in technical fields. Students are introduced to other academic opportunities to pursue these skills through competitive events in the Technology Student Association (TSA). Students will develop manual and computer aided drafting skills.

*Offered at NHS*

### DRAFTING AND DESIGN II - CAD I

TEC 3210 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 10-12

This course emphasizes the study of design principles, construction practices and building materials for building a residential dwelling. Students will also get more advanced instruction in CAD fundamentals and see many examples of how other studies (i.e. Math, science, etc.) are applied to practical problems in the architectural design field. Students are shown opportunities to pursue these skills through competitive events in the Technology Student Association (TSA).

*Offered at NHS*

### DRAFTING & DESIGN III: CAD III

TEC 3310 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

This course teaches advanced drafting problems and techniques, allowing students to use their skills in new and varied situations. Students learn how to create working drawings and other specialized drafting practices while receiving further instruction in Computer Aided Drafting (CAD) and an introduction to 3-D Solid Modeling. Students will see examples of how other studies such as mathematics and science can be applied to practical problems in the engineering and product design fields. This course emphasizes portfolio development and exploration of pre-engineering technologies. Prerequisite: Drafting & Design II: CAD II.

*Offered at NHS*

## ENGINEERING

### INTRODUCTION TO ENGINEERING DESIGN

STM 1110 (CP)  
2 SEMESTERS  
1 CREDIT  
GRADES 9-10

This course emphasizes design and product development. Students use computer software to produce, analyze and evaluate mathematical models and project solutions. Students study design concepts, such as form and function, then use state-of-the-art technology to translate conceptual design into reproducible products. They will have the opportunity to apply the engineering design process as well as mathematics, science, and engineering standards to hands-on projects. Students work both individually and in teams

to design solutions to a variety of problems using 3D modeling software, and use an engineering notebook to document their work.

*Offered at CHS and NHS*

### PRINCIPLES OF ENGINEERING

STM 1210 (CTE)  
1 SEMESTER  
1 CREDIT  
GRADES 10-11

Through problems that engage and challenge, students explore a broad range of engineering topics, including mechanisms, the strength of structures and materials, and automation. Students develop skills in problem solving, research, and design while learning strategies for design process documentation, collaboration, and presentation. Prerequisite: Introduction to Engineering Design.

*Offered at CHS and NHS*

### ENGINEERING DESIGN AND DEVELOPMENT

STM 1310 (CTE)  
2 SEMESTERS  
1 CREDIT  
GRADES 11-12

The knowledge and skills students acquire throughout PLTW Engineering come together in Engineering Design and Development as they identify an issue and then research, design, and test a solution, ultimately presenting their solution to a panel of engineers. Students apply the professional skills they have developed to document a design process to standards, completing Engineering Design and Development ready to take on any post-secondary program or career. Prerequisite: Principles of Engineering.

*Offered at CHS and NHS*

# SOCIAL STUDIES

## CIVICS / ECONOMICS / GOVERNMENT

### AP U.S. GOVERNMENT AND POLITICS

SOC 5030 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course provides a college-level, nonpartisan introduction to key political concepts, ideas, institution, policies, interactions, roles and behaviors that characterize the U.S. constitutional system and political culture. Students will examine U.S. foundational documents, Supreme Court decisions and other texts and visuals to gain an understanding of the relationships and interactions among political institutions, processes and behaviors. Students will also engage in disciplinary practices that require them to read and interpret data, make comparisons and applications, and develop evidence-based arguments. This course includes a political science research or applied civics project.

*Offered at GHS and NHS*

### CIVICS / ECONOMICS

SOC 9810 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This survey course helps students become more informed, active and responsible citizens by familiarizing them with the foundations of the American political system at the local, state and national levels. This course combines information about our government system with an examination of how people deal with the issue of unlimited wants and scarce resources. Topics include constitutional and legal aspects of government, the decision-making process used in our political system. This course also focuses on the basic economic principles

of the American market system and how it compares with other economies of the world, with an emphasis on different market and economic systems, supply and demand, and macroeconomic subjects of taxes, inflation, and unemployment.

*Offered at CHS, GHS and NHS*

### CIVICS / ECONOMICS HONORS

SOC 9820 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 10

This survey course helps students become more informed, active and responsible citizens by familiarizing them with the foundations of the American political system at the local, state and national levels. This course combines information about our government system with an examination of how people deal with the issue of unlimited wants and scarce resources. Topics include constitutional and legal aspects of government, the decision-making process used in our political system. This course also focuses on the basic economic principles of the American market system and how it compares with other economies of the world, with an emphasis on different market and economic systems, supply and demand, and macroeconomic subjects of taxes, inflation, and unemployment.

*Offered at CHS, GHS and NHS*

## HUMAN GEOGRAPHY

### HUMAN GEOGRAPHY

SOC 8510  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course analyzes the relationship between society, place and space, with a focus on social, economic, political, cultural and human-environment processes and patterns and how they change over space and time. This course aims to engender a critical geographical perspective on the past, present and future development of the social world, a viewpoint of crucial importance in the generation of a broad and informed understanding of the world.

*Offered at CHS, GHS and NHS*

### HUMAN GEOGRAPHY HONORS

SOC 8520  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 9

This course analyzes the relationship between society, place and space, with a focus on social, economic, political, cultural and human-environment processes and patterns and how they change over space and time. This course aims to engender a critical geographical perspective on the past, present and future development of the social world, a viewpoint of crucial importance in the generation of a broad and informed understanding of the world.

*Offered at CHS, GHS and NHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*



# SOCIAL STUDIES

## AP HUMAN GEOGRAPHY SOC 8530 1-2 SEMESTERS\* 1 CREDIT GRADE 9

This course introduces students to the systematic study of patterns and processes that have shaped human understanding, use and alteration of earth's surface. Students learn to employ spatial concepts and landscape analysis to examine human socioeconomic organization and its environmental consequences. Students also learn about the methods and tools that geographers use in their research and applications.

*Offered at CHS, GHS and NHS*

## HISTORY

## CAMBRIDGE HISTORY 9 SOC 2540 (CM) 2 SEMESTERS 1 CREDIT GRADE 9

This course offers students the opportunity to study world history from the 19th century to the beginning of the 21st century. Students will explore history from a diversity of perspectives, including social, economic, cultural and political.

*Offered at NHS*

## U.S. HISTORY SOC 4010 (CP) 1-2 SEMESTERS\* 1 CREDIT GRADE 11

This course focuses on the interaction of key events, persons and groups with political, economic, social and cultural influences on state and national development from the Reconstruction Era to present day. Students

will trace and analyze chronological periods, examine the relationship of significant themes and concepts in U.S. History, and develop skills and processes of historical thinking and inquiry that involve chronological thinking, comprehension, analysis interpretation, and research using primary and secondary sources.

*Offered at CHS, GHS and NHS*

## U.S. HISTORY HONORS SOC 4020 (HON) 1-2 SEMESTERS\* 1 CREDIT GRADE 11

This course focuses on the interaction of key events, persons and groups with political, economic, social and cultural influences on state and national development from the Reconstruction Era to present day. Students will trace and analyze chronological periods, examine the relationship of significant themes and concepts in U.S. History, and develop skills and processes of historical thinking and inquiry that involve chronological thinking, comprehension, analysis interpretation, and research using primary and secondary sources.

*Offered at CHS, GHS and NHS*

## AP U.S. HISTORY SOC 4030 (AP) 1-2 SEMESTERS\* 1 CREDIT GRADES 11-12

This course is designed to be the equivalent of a two-semester introductory college or university U.S. history course. Students investigate significant events, individuals, developments and processes in nine historical periods from approximately 1491 to the present. Students develop and use the same skills, practices and methods employed by historians: analyzing primary and secondary

sources; developing historical arguments; making historical comparisons; and utilizing reasoning about contextualization, causation and continuity and change over time. Students will also explore seven themes in order to make connections among historical developments in different times and places: American and national identity; migration and settlement; politics and power; work, exchange and technology; America in the world; geography and the environment; and culture and society.

*Offered at CHS, GHS and NHS*

## WORLD HISTORY SOC 8410 (CP) 1-2 SEMESTERS\* 1 CREDIT GRADES 11-12

This course explores the key events and global historical developments that have shaped the world since 1350, with a focus on the contributions of Europe, Africa, Asia and the Americas to world civilizations. This course includes aspects of the human experience such as economics, science, religion, philosophy, politics and law, military conflict, literature and the arts. This course illuminates connections between our lives and those of our ancestors around the world. Students planning to attend a four-year college (notably the University of Delaware) may need this class for admission.

*Offered at GHS and NHS*

## AP WORLD HISTORY SOC 8430 (AP) 1-2 SEMESTERS\* 1 CREDIT GRADES 11-12

In this course, students investigate significant events, individuals, developments and processes in six historical periods from approximately 8000 BCE to the present.

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# SOCIAL STUDIES

Students develop and use the same skills, practices and methods employed by historians: analyzing primary and secondary sources; developing historical arguments; making historical comparisons; and utilizing reasoning about contextualization, causation and continuity and change over time. Students explore five themes in order to make connections among historical developments in different times and places: interactions between humans and the environment; development and interaction of cultures; state building, expansion and conflict; creation, expansion and interaction of economic systems; and development and transformation of social structures.

*Offered at CHS, GHS and NHS*

## HIS 204 WORLD HISTORY WILMINGTON UNIVERSITY

DUA 6130  
1 SEMESTER  
1 CREDIT  
GRADE 12

This course is a study of the major cultural, economic, military, political, religious and social events from Antiquity to the Scientific Revolution. The emphasis for this world history course is centered on Western Europe and its contacts and inter-relationships with the rest of the world including, but not limited to, the peoples of Eastern Europe, the Middle East, Africa, Asia and the Americas.

*Offered at CHS*

## PSYCHOLOGY

**PSYCHOLOGY**  
SOC 6010 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course is a survey of the major psychological topics, theories and approaches to the scientific study of behavior and mental processes. Topics include the brain and neuroscience, behavioral genetics, cognitive and social development, perception, learning, memory, decision making, language, consciousness, emotions, motivation, psychological disorders, social identity, interpersonal interactions, and group and cultural processes.

*Offered at CHS, GHS and NHS*

**AP PSYCHOLOGY**  
SOC 6030 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This course introduces the systematic and scientific study of the behavior and mental processes of human beings and other animals. This course considers the psychological facts, principles and phenomena associated with each of the major subfields within psychology. Students also learn about the ethics and methods psychologists use in their science and practice.

*Offered at CHS, GHS and NHS*

## INTRODUCTION TO PSYCHOLOGY WILMINGTON UNIVERSITY

DUA 6230  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course offers an overview of the principles of human behavior. Developmental

theories, psychophysiology, thinking, learning, personality theories, abnormal, and deviant psychology are introduced. Methods of assessment and research principles are discussed. Prerequisite: Completion of three (3) Social Studies pathway courses.

*Offered at CHS*

## OTHER

**LEADERSHIP / FRESHMAN SEMINAR**  
SEM 9010  
1 SEMESTER  
1 CREDIT  
GRADE 9

This course is designed to help students develop the academic skills necessary to achieve their goals in high school, college and the workforce. Students participate in hands-on leadership activities that reinforce self-awareness, interpersonal relationships and professional communication skills. This course also focuses on goal setting, teamwork, planning and communication, with a freshman seminar that helps students transition from middle school to high school and build skills for success in dual enrollment college classes.

*Offered at CHS*

**LAW IN AMERICAN SOCIETY**  
SOC 7210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

This survey course gives students a basic understanding of our legal system and its terminology and procedures, with an emphasis on real-world issues and court cases that relate to our rights as citizens. Students examine landmark Supreme Court decisions and criminal cases. Designed to encourage thoughtful debate, this course

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# SOCIAL STUDIES

relies heavily on class discussion, group projects and mock trial. Topics include civil law, criminal law and juvenile justice, family law, torts and consumer law, court structure and procedure, and constitutional law.

*Offered at CHS, GHS and NHS*

## **HUMAN BEHAVIOR**

**SOC 7410 (CP)**  
**1 SEMESTER**  
**1 CREDIT**  
**GRADES 10-12**

This course introduces the systematic and scientific study of the behavior and mental processes of human beings and other animals. This course considers the psychological facts, principles and phenomena associated with each of the major subfields within psychology. Students also learn about the ethics and methods psychologists use in their science and practice.

*Offered at CHS, GHS and NHS*

## **AFRICAN-AMERICAN STUDIES**

**SOC 7810 (CP)**  
**1-2 SEMESTERS\***  
**1 CREDIT**  
**GRADES 11-12**

In this course, students study the principle of human behaviors as they relate to groups and individuals. Students will also engage in interactive projects as they relate to the behaviors of humans.

*Offered at CHS and GHS*

## **CRJ 101 SURVEY OF CRIMINAL JUSTICE**

**WILMINGTON UNIVERSITY**  
**DUA 6030**  
**1 SEMESTER**  
**1 CREDIT**  
**GRADES 11-12**

This course is a survey of agencies and processes involved in the administration of criminal justice. The survey reviews the functions of the legislature, police,

prosecutor, courts, and the correctional system. Problems of law enforcement in a democratic society are discussed. This course ties together all components of criminal justice and includes issues of both the juvenile and adult offender. Prerequisite: Completion of three (3) Social Studies pathway courses.

*Offered at CHS*

## **SOC 101 INTRODUCTION TO SOCIOLOGY**

**WILMINGTON UNIVERSITY**  
**DUA 6330**  
**1 SEMESTER**  
**1 CREDIT**  
**GRADES 11-12**

This course introduces students to the fundamental concepts and methods of the scientific study of group behavior in terms of social interactions and processes. An introduction to social psychology, socialization, personal development, culture, and personality is also offered. Prerequisite: Completion of three (3) Social Studies pathway courses.

*Offered at CHS*

## **PHI 100 INTRODUCTION TO CRITICAL THINKING**

**WILMINGTON UNIVERSITY**  
**DUA 9030**  
**1 SEMESTER**  
**1 CREDIT**  
**GRADES 9-12**

This introductory course challenges students with the question: "Why do you think the way you do?" It gives practical consideration to overcoming thinking errors, developing ethical thought, and applying career-specific principles of effective critical thinking to real-life situations.

*Offered at CHS and GHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# WORLD LANGUAGES

## SPANISH

### FUNCTIONAL SPANISH I

WLD 1110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course is the first of a two-year curriculum, designed for students who need to complete the two-year World Language graduation requirement but who do not plan to continue studying at levels 3, 4 or 5. This course teaches basic Spanish skills using the three modes of communication: interpretive, interpersonal and presentational. This course may not meet world language requirements for college admissions. Approval from counselor required.

*Offered at CHS and NHS*

### FUNCTIONAL SPANISH II

WLD 1210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course is the second of a two-year curriculum, designed for students who need to complete the two-year World Language graduation requirement but who do not plan to continue studying at levels 3, 4 or 5. This course allows students to further their basic Spanish skills. This course may not meet world language requirements for college admissions. Approval from counselor required. Prerequisite: Functional Spanish I.

*Offered at CHS and NHS*

### SPANISH I

WLD 3110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course introduces students to the Spanish language, geography and culture.

Students will develop a basic ability to understand, speak, read and write Spanish using the three modes of communication: interpretive, interpersonal and presentational.

*Offered at CHS, GHS and NHS*

### SPANISH II

WLD 3210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course helps students further their understanding of Spanish communication skills with an emphasis on advanced grammatical study, readings and conversations designed to increase familiarity with the history and cultures of the Spanish-speaking world. Prerequisite: Spanish I.

*Offered at CHS, GHS and NHS*

### SPANISH II HONORS

WLD 3220 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

This course is designed for students who have performed above average in Spanish I and who are planning on studying Spanish through the upper levels. Prerequisite: Spanish I.

*Offered at CHS, GHS and NHS*

### SPANISH III HONORS

WLD 3320 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students are expected to speak Spanish and use their knowledge of the language to read short stories and literary, historical, cultural and informational texts. Students will also write essays and compositions and deliver oral presentations. Prerequisite: Spanish II.

*Offered at CHS, GHS and NHS*

### SPANISH IV HONORS

WLD 3420 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students practice the skills gained in earlier study and further their understanding of Spanish-speaking countries and cultures through intensive literature, cultural and historical study. Prerequisite: Spanish III.

*Offered at CHS, GHS and NHS*

### AP SPANISH LANGUAGE

WLD 3630 (AP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADE 12

This course focuses on strengthening communication skills and sharpening awareness of the diversity of Spain and Latin America. This course includes extensive exploration of literature, history and culture. Prerequisite: Spanish IV.

*Offered at GHS and NHS*

### SPANISH I HONORS

WLD 4320 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course is designed for students who have previously studied Spanish or are concurrently enrolled in Cambridge Academy, Honors or AP courses.

*Offered at CHS, GHS and NHS*

*\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.*

# WORLD LANGUAGES

**SPA 301 DUAL ENROLLMENT SPANISH**  
WILMINGTON UNIVERSITY  
DUA 8530  
1 SEMESTER  
1 CREDIT  
GRADES 11-12

This course is an introduction to the Spanish language with emphasis on developing listening and speaking skills commonly used in conversation. Students will develop vocabulary and communication skills by practicing speaking skills individually and conversationally as well as reading simple texts to assist in speaking skills. Students will be assessed through individual speaking and reading as well as conversational activities.

*Offered at CHS*

## FRENCH

**FRENCH I**  
WLD 2110 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 9-11

This course introduces students to the French language, geography and culture. Students will develop a basic ability to understand, speak, read and write French using the three modes of communication: interpretive, interpersonal and presentational.

*Offered at CHS, GHS and NHS*

**FRENCH II**  
WLD 2210 (CP)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

In this course students further their understanding of French communication skills with an emphasis on advanced grammatical study, readings and conversations designed to increase familiarity with the history and

cultures of France and Francophone areas of the world. Prerequisite: French I.

*Offered at CHS, GHS and NHS*

**FRENCH II HONORS**  
WLD 2220 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 10-12

In this course students further their understanding of French communication skills with an emphasis on advanced grammatical study, readings and conversations designed to increase familiarity with the history and cultures of France and Francophone areas of the world. Prerequisite: French I.

*Offered at NHS*

**FRENCH III HONORS**  
WLD 2320 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students are expected to speak French and use their knowledge of the language to read short stories and literary, historical, cultural and informational texts. Students will also write essays and compositions and deliver oral presentations. Prerequisite: French II.

*Offered at CHS and NHS*

**FRENCH IV HONORS**  
WLD 2420 (HON)  
1-2 SEMESTERS\*  
1 CREDIT  
GRADES 11-12

In this course students practice the skills gained in earlier study and further their understanding of French-speaking countries and cultures through intensive literature, cultural and historical study. Prerequisite: French III.

*Offered at CHS and NHS*

**AP FRENCH LANGUAGE**  
WLD 2630 (AP)  
2 SEMESTERS  
1 CREDIT  
GRADE 12

This course focuses on strengthening communication skills and sharpening awareness of the diversity of la Francophonie. Extensive exploration of literature, history, and culture is central to this course. Prerequisite: French IV.

*Offered at NHS*

\*Course is offered in 1 or 2 semester format depending on the scheduling model offered by the school.

# COURSE SELECTION PLANNING WORKSHEET

STUDENT NAME: \_\_\_\_\_

GRADE: \_\_\_\_\_

PATHWAY: \_\_\_\_\_

*Use this worksheet along with the Education Plan section of your Student Success Plan to map out your high school courses. Bring the completed worksheet to your scheduling appointment with your school counselor.*

GRADUATION REQUIREMENTS		GRADE 9 COURSES	GRADE 10 COURSES	GRADE 11 COURSES	GRADE 12 COURSES	TOTAL
<b>English (4 Credits)</b> English 9, English 10, English 11, English 12						
<b>Mathematics (4 Credits)</b>					(Required)	
<b>Science (3 Credits)</b> Earth / Physical Science, Biology, Chemistry						
<b>Social Studies (3 Credits)</b> Human Geography, Civics / Economics, U.S. History						
<b>Additional Science or Social Studies (1 Credit)</b>						
<b>Physical Education (1 Credit)</b>						
<b>Health (0.5 Credit)</b>						
<b>World Language (2 Credits)</b> 2 Credits in the Same World Language						
<b>Pathway Requirement (3 Credits)</b> 3 Planned and Sequential Career Pathway Courses						
<b>Additional Electives (4.5 Credits)</b>						
<b>Total Credits Earned</b>						

Use the spaces below to write down the courses you want to take in the next school year. Look at the courses you mapped out above (the ones you have taken and the ones you still need to take) to be sure you have everything you need to succeed.

Core Courses	Course #	Credits	Other Requirements & Elective Courses	Course #	Credits
English:					
Mathematics:					
Science:					
Social Studies:					
Alternate 1:			Alternate 2:		

STUDENT SIGNATURE: \_\_\_\_\_

DATE: \_\_\_\_\_

PARENT SIGNATURE: \_\_\_\_\_

DATE: \_\_\_\_\_

**CHRISTINA**  
SCHOOL DISTRICT

Christina School District  
600 North Lombard Street  
Wilmington, DE 19801

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