9th Grade Course Catalog Hardin Valley Academy 2022-2023 School Year



# NOTE:

The courses listed in this catalog are from Knox County School's progression plan for the 2021-2022 school year and only list courses available for selection through Hardin Valley Academy. Final course availability will be developed based on course requests from course selection sheets by students in the spring of 2023.

CORE SUBJECTS	TOTAL CREDITS			
English: English I, II, III, IV	4			
Mathematics: Algebra I, Geometry, Algebra II, one high level math	4			
Science: Biology, Chemistry or Physics, one additional Lab science	3			
Social Studies: World History and Geography or AP Human Geography	1			
Social Studies: US History and Geography	1			
Social Studies: US Government and Civics	1/2			
Social Studies: Economics	1⁄2			
Physical Education	1⁄2			
Lifetime Wellness	1			
Personal Finance	1/2			
Elective Focus (Pathway)	3			
University Admissions Students must complete two units of the same world language and one unit of fine/performing arts in order to meet college/university admission requirements	3			
Additional Elective Credits	6			
TOTAL	28			
All students are required to take the ACT or SAT to meet graduation requirements	S			
Successful completion of the Tennessee Civics Assessment (minimum 70%) is required.				

## **Graduation Credit Requirements:**

Students shall fulfill all state requirements as set by the State Board of Education and earn the prescribed 28 credits required by the Knox County Schools. In instances where a student does not have the opportunity to earn the 32 credits that are available with the schedule of 8 classes each year, the required number of credits required for graduation from the Knox County Schools will be four less than the total available, but in any event, a student must earn the state minimum requirement of 22 credits. The pattern of courses which shall be required of all students in grades nine (9) through twelve (12) shall be in accordance with the Rules and Regulations of the State Board of Education and the Knox County Board of Education.

To earn a regular high school diploma, students must:

• Earn the prescribed number of credits;

• Complete the ACT or SAT. (This requirement is waived if the student did not attend a Tennessee public school during his/her junior year.)

• Have satisfactory records of attendance and discipline;

• Complete the Tennessee Civics Assessment with a minimum score of 70%.

TDOE - UNIFORM GRADING POLICY The KCS grading legend is aligned with the State Board of Education

Tennessee Uniform Grading Scale.						
А	=	100 - 93				
В	=	92 - 85				
С	=	84 - 75				
D	=	74 - 70				
F	=	69 - 00				

<u>Calculation of the Student's Grade Point Average (GPA)</u>: All high school course work, with the exception of pass/fail courses, will be calculated in the GPA according to the KCS scale. When a course is repeated, the higher of the grades shall be computed as part of the accumulated grade point average. (BOE I-350)

#### **Courses That May Substitute for Required Courses:**

COURSES	MAY SUBSTITUTE FOR		
Physics	Fourth Mathematics credit provided it was not used as a third lab science		
AP Capstone	English 4		
DE English 1010 or 1020	English 4		
JROTC – 2 credits	<sup>1</sup> ⁄ <sub>2</sub> credit of Physical Education 1 credit Lifetime Wellness		
JROTC – 3 credits	½ credit Personal Finance If teacher is HQ ½ credit of US Government		

#### ATHLETICS

**Interscholastic Athletics:** (BOE #I-171 Revised 8/2017) Interscholastic athletics shall be administered as a part of the regular school program and shall be the principal's responsibility. The principal or his designee must accompany an athletic team on trips. The Bylaws of the Tennessee Secondary School Athletic Association (TSSAA) shall regulate the operation and control of secondary athletics. School athletics shall be coached only by persons on contract to the Board of Education and approved by the Tennessee Secondary School Athletic Association. There shall be an annual physical examination of every student prior to his participation in interscholastic athletic practice. Cost of the examination shall be borne by the parent or guardian of the student. These records shall be on file in the principal's office.

Every participant in athletics shall participate in the Knox County Schools Athletic Insurance Program. There shall be no practice of organized school athletics schedules within the school day without approval of the Superintendent. Each school may play two home athletic events during the school day without requesting permission from the Board of Education. The conduct of players, spectators, or school personnel reflects directly upon the school system as a whole. Therefore, conduct of players, spectators, or school personnel that does not exemplify the best sportsmanship may result in that school's program, players, spectators, or school personnel that does not exemplify the best sportsmanship may result in the sport concerned with the infraction. The Board of Education will determine the duration of the suspension.

Maximum admission prices to all athletic events shall be approved by the Board of Education, upon the recommendation of the Superintendent.

Scheduling of Athletic Contests: District/regional games shall be scheduled first. No contract shall be signed until the following process is complete:

• Complete the schedule and submit to the principal for approval.

• Upon approval by the principal, submit to the Superintendent's office for final approval. If an adequate schedule is not obtained by each school, a rescheduling meeting shall be designated by the Superintendent's office to resolve existing problems. No contracts are to be signed prior to the Superintendent's approval of the schedule. Middle School basketball and track are sanctioned sports of the Knox County Schools and will be regulated by administrative procedures.

#### NCAA Requirements for College Scholarships in Athletics:

Refer to NCAA GUIDE FOR THE COLLEGE-BOUND STUDENT ATHLETE for information on Division I, II, and III colleges and universities. For additional information, visit NCAA ELIGIBILITY CENTER. NOTE: There is a fee to register with the eligibility center. For fee waiver information, click here

#### **Division I:**

To be eligible to compete in NCAA sports during a student's first year at a **DIVISION I** school, that student-athlete must graduate high school and meet ALL the following requirements:

#### Complete 16 core courses:

- Four credits of English;
- Three credits of math (Algebra I or higher);
- Two credits of natural/physical science, including one credit of a lab science if offered at the student's high school;

- One additional credit of English, math, or natural/physical science;
- Two credits of social science;
- Four additional credits of English, math, natural/physical science, social science, foreign language, comparative religion or philosophy;
- Complete ten core courses, including seven in English, math or natural/physical science before the student's seventh semester. Once the seventh semester has started, a student must have more than ten core courses completed to be able to repeat or replace any of the ten courses used to meet the 10/7 requirement;
- Earn at least a 2.3 GPA in the core courses;
- Earn an **SAT combined score or ACT sum score** matching the core-course GPA on the Division I sliding scale, which balances the test score and core-course GPA. If a student- athlete has a low test score, a higher core-course GPA is needed to be eligible. If the student-athlete has a low core-course GPA, a higher test score is needed to be eligible.

## **Division II:**

To be eligible to compete in NCAA sports during a student's first year at a **DIVISION II** school, the student-athlete must meet academic requirements for the core courses, grade point average (GPA) and test scores and meet the following requirements:

## Complete 16 core courses:

- Three credits of English;
- Two credits of math (Algebra I or higher);
- Two credits of natural/physical science, including one credit of a lab science if offered at the student's high school;
- Three additional credits of English, math, or natural/physical science;
- Two credits of social science;
- Four additional credits of English, math, natural/physical science, social science, foreign language, comparative religion or philosophy;
- Earn at least a 2.2 GPA in the core courses;
- Earn an **SAT combined score or ACT sum score** matching the core-course GPA on the Division II sliding scale, which balances the test score and core-course GPA. If a student- athlete has a low test score, a higher core-course GPA is needed to be eligible. If the student-athlete has a low core-course GPA, a higher test score is needed to be eligible.

## **Division III:**

**DIVISION III** schools provide an integrated environment focusing on academic success while offering a competitive athletics environment. Division III rules minimize potential conflicts between athletics and academics and focus on regional in-season and conference play.

While Division III schools do not offer athletics scholarships, 80 percent of Division III student-athletes receive some form of merit or need-based financial aid.

A student who plans to attend a Division III school does not need to register with the NCAA Eligibility Center. Division III schools set their own admission and eligibility standards.

Please be advised that NCAA eligibility requirements are not likely to allow credit for a course taken through recovery credit, even if it is an approved course.

For additional information, visit NCAA ELIGIBILITY CENTER. This site will provide information regarding initial-eligibility at NCAA Division I and II member colleges and universities. The NCAA Eligibility Center serves three main constituent groups: prospective student-athletes, high school administrators, and NCAA m

## HVA 9th GRADE COURSE DESCRIPTIONS

## English I CP- College Preparatory:

In English 1, students will build upon the skills developed in the middle school English Language Arts. The focus is on close reading of informational and literary texts of appropriate grade level complexity. Based upon their reading, the students will engage in class discussion and written assignments to present analysis to develop an argument, or to write real or imagined narrative. While reading and writing, students will analyze the author's point of view, evidence, assumptions, and style. Within their own writing, students will develop focus, organization, style, and grammatical fluency. Vocabulary study will focus on morphology, etymology, and context, and the words will come from the texts that the students read. Assessment will focus on the students' ability to read appropriately complex text and to cite evidence to support analysis or claims from that text. Language skills will be assessed in the context of their writing, as well as through authentic workplace tasks, such as editing a draft.

## English I Honors:

English I Honors consists of the English I standards. However, the curriculum modules reflect the Tennessee Department of Education framework for extension.

## Freshman Seminar:

(Elective paired with English) Skills for Post Secondary Readiness, or Freshman Seminar, is a required course for every freshman upon entering high school. It is a course built & designed around three main concepts. (1) Establish and cultivate necessary study habits and skills needed to be successful throughout the duration of a student's high school tenure.

(2) Support the STEM, Health Science, Business & Law, and Liberal Arts "Academy Focus" that Hardin Valley is founded upon by introducing the 36 Pathway opportunities HVA offers followed by implementing the Pathway Selection Process. A 'Pathway' is a three-course 'elective focus' every HVA student must partake in during their years as an HVA student.

(3) Research various postsecondary (which means after high school), college and career opportunities available through HVA Pathway specific career choice exploration.

## **English Electives:**

## **Creative Writing:**

In Creative Writing, students will be given the opportunity to develop a creative outlet through additional writing experiences in fiction and nonfiction. Creative writing allows students to promote self-expression, to explore various writing styles, and to strive for variety in diction, sentence structure, and format.

#### **Science Fiction:**

In Genre Literature, students will be given the opportunity to develop deeper thematic critical reading skills through additional reading experiences of two or more literary genres. Students will explore the thematic elements and various styles and plot elements of various literary genres, including Ancient Literature, Appalachian and Southern Literature, Modern Literature, Mystery and Suspense Literature, Mythology, Science Fiction and Shakespeare

#### **Genre Literature:**

In Young Adult Literature, students will be given the opportunity to develop deeper thematic critical reading skills through additional reading experiences of two or more literary genres. Students will explore the thematic elements and various styles and plot elements of the genre. Students will be expected to read, write, and share

their thoughts and opinions on the text being examined. For this Young Adult Literature class, we will be learning about traditional and non-traditional format young adult literature, its history, and its current impact. Every book covered in this class is an award-winning young adult book.

## **Introduction to Journalism:**

Students will have the opportunity to improve the skills necessary in journalistic writing for both print and broadcast media. Curriculum includes the history and elements of journalistic style and the application of journalistic techniques to the development of a publication. Students who wish to take this course must be highly motivated, work well with peers, and be responsible in following through with assignments as the work culminates in a publication. Prerequisites: Students may have to demonstrate ability to write well; may be required to apply for this course; and may be required to receive teacher recommendation.

<u>Advanced Journalism (Yearbook or Multimedia)</u>: In Advanced Journalism, students continue to explore and refine the skills necessary for journalistic writing and digital publishing. In addition to being actively engaged in communication skills, students explore the topics of ethics in journalism particularly paying close attention to plagiarism. Prerequisites: Successful completion of Journalism 1. Additionally, students may have to demonstrate ability to write well; may be required to apply for this course; and may be required to receive teacher recommendation. *Can be taken for multiple credits*.

## Algebra IA and Algebra IB:

Algebra IA is the first term of a two-term sequence in the study of Algebra I and is designed for students in the 9th grade who enter high school not ready to start Algebra 1. Time during this semester long course is spent integrating pre-algebra and introductory algebra skills. Students will receive an elective mathematics credit for successfully completing Algebra IA.

Algebra IB is the second course of the required two-term sequence. The combination of Algebra IA and Algebra IB will explore and apply concepts, processes, and skills that are essential to successfully completing the high school graduation requirement. More time is devoted to skill development than is possible in the one-term Algebra 1 class. Students who successfully complete Algebra IA and Algebra IB will receive credit for Algebra I.

## Algebra I CP:

The fundamental purpose of Algebra I is to formalize and extend the mathematics that students learned in the middle grades. Because it is built on the middle grades' standards, this is a more ambitious version of Algebra 1 than has generally been offered. The critical areas deepen and extend understanding of linear and exponential relationships by contrasting them with each other and by applying linear models to data that exhibit a linear trend, and students engage in methods for analyzing, solving, and using quadratic functions. The Mathematical Practice Standards apply throughout each course and, together with the content standards, prescribe that students experience mathematics as a coherent, useful, and logical subject that makes use of their ability to make sense of problem situations. Successful completion of this sequence prepares students for Geometry. The "Pass" credit is ignored in attempted credits and is not counted in the GPA.

**Honors Algebra I:** Honors Algebra is designed for students who did exceptionally well in the 8th grade mathematics. Course content covers the topics of Algebra 1 in greater depth and at a faster pace, thus providing time for enrichment through the study of additional performance objectives.

## **Honors Geometry:**

In Honors Geometry, standards found in Geometry are covered more in-depth with emphasis placed on problem solving, writing skills (especially in writing of proofs) and algebraic applications. Additional enrichment objectives are covered as time permits. Successful completion of this Honors Geometry prepares a student for further work in algebra, usually Honors Algebra 2. Prerequisite: Algebra 1 in the 8th grade or Honors Algebra 1 in the 9th grade and Departmental Recommendation.

Knox County Schools Mathematics High School Progression									
8 <sup>th</sup> Grade	9 <sup>th</sup> G	irade	10 <sup>th</sup> Grade		11 <sup>th</sup> Grade	12 <sup>th</sup> Grade			
Honors Algebra I		Geometry	Honors Algebra II		Honors Pre-				
		nors ebra I	Honors Geometry (Fall)	Honors Algebra II (Spring)	Calculus	AP Calculus AB	AP Calculus BC		
Pre- Algebra		nors ebra I	Honors Geometry (Fall)	Honors Algebra II (Spring)	Honors Pre- Calculus	AP Calculus AB	AP Calculus BC		
		Geometry		Algebra II	Pre-Calculus	CP Calculus			
	Alge	ebra I	Geometry		Algebra II	Pre-Calculus, CP Statistics, Applied Mathematical Concepts, OR AP Statistics			
	Algebra IA (Fall)	Algebra IB (Spring)	Geometry		Algebra II	Bridge Math, Pre-Calculus, CP Statistics, Applied Mathematical Concepts, OR AP Statistics			

#### **Physical Science:**

The primary theme for Physical Science is the study of matter and energy. The course is designed to introduce students to the concepts of forces and motion, chemical and physical properties of matter, the ways in which matter and energy interact, the forms and properties of energy, and other basic concepts in chemistry and physics. Prerequisites: The fundamental level of this course is based upon a combination of standardized test scores, past performance in science, teacher recommendations, and established enrollment limits.

#### **Honors Chemistry I:**

Honors Chemistry I takes the standards of Chemistry I to a much deeper level. The course is fast paced and includes time for some enrichment topics. Prerequisites: Algebra I, a combination of standardized test scores, past performance in science, and teacher recommendation.

## World History and Geography:

In World History and Geography, students will study the rise of the nation-state in Europe, the origins and consequences of the Industrial Revolution, political reform in Western Europe, imperialism across the world, and the economic and political roots of the modern world. Students will explain the causes and consequences of the great military and economic events of the past century, including the World Wars, Great Depression, Cold War, and Russian and Chinese Revolutions. Students will study the rise of nationalism and the continuing persistence of political, ethnic, and religious conflict in many parts of the world. Students will explore geographic influences on history, with attention to political boundaries that developed with the evolution of nations from 1750 to the present and the subsequent human geographic issues that dominate the global

community. Additionally, students will examine aspects of technical geography and how these innovations continuously impact geopolitics in the contemporary world. This course is a continuation of the 6th and 7th grade survey courses of world history and geography and is designed to help students think like historians, focusing on historical concepts in order to build a foundational understanding of the world. Appropriate primary sources have been embedded in the standards in order to deepen the understanding of world history and geography. Special emphasis will be placed on the contemporary world and its impact on students today. This course may be combined with English I.

## Honors World History and Geography:

This course description for Honors World History and Geography is the same as the CP World History and Geography course and follows the same state standards and local curriculum but with increased rigor. Students will study the rise of the nation-state in Europe, the origins and consequences of the Industrial Revolution, political reform in Western Europe, imperialism across the world, and the economic and political roots of the modern world. Students will explain the causes and consequences of the great military and economic events of the past century, including the World Wars, Great Depression, Cold War, and Russian and Chinese Revolutions. Students will study the rise of nationalism and the continuing persistence of political, ethnic, and religious conflict in many parts of the world. Students will explore geographic influences on history, with attention to political boundaries that developed with the evolution of nations from 1750 to the present and the subsequent human geographic issues that dominate the global community. Additionally, students will examine aspects of technical geography and how these innovations continuously impact geopolitics in the contemporary world. The course is designed to prepare students for Advanced Placement coursework. This course is a continuation of the 6th and 7th grade survey courses of world history and geography and is designed to help students think like historians, focusing on historical concepts in order to build a foundational understanding of the world. Appropriate primary sources have been embedded in the standards in order to deepen the understanding of world history and geography. Special emphasis will be placed on the contemporary world and its impact on students today.

## Advanced Placement (AP) Human Geography:

The purpose of the AP Human Geography course is to introduce students to the systemic 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. They also learn about the methods and tools geographers use in their research and applications.

## Lifetime Wellness:

Lifetime Wellness is a one-unit course required for graduation. The goal of Lifetime Wellness is for students to learn a lifelong process of positive lifestyle management that seeks to integrate the emotional, social, intellectual, and physical dimensions of self for a longer, more productive and higher quality of life. The course consists of the following state standards: Disease Prevention and Control; Mental Health; Nutrition; Physical Fitness and Related Skills; Safety and First Aid; Sexuality and Family Life; and Substance Use/Abuse.

## Level 1: French, German, Spanish:

Level 1 Modern Languages are recommended for students in the ninth grade. The goal for Level 1 students is to perform at the Novice High proficiency level across the three modes of communication. Level 1 students demonstrate cultural and intercultural competency in the Novice range. Students must earn two sequential credits in the same language to meet graduation requirements.

## Level 1 Honors: French, German, Spanish:

Students enrolled in a Level 1 Honors class perform at the Intermediate Low proficiency level. Enrolling in a Level 1 Honors world language class is the first step toward future success in upper level courses and the pursuit of the Seal of Biliteracy. Students must earn two sequential credits in the same language to meet graduation requirements. Prerequisite: Teacher recommendation.

#### Honors Chinese 1:

In addition to Level 1 requirements, more emphasis is placed on character recognition and spontaneous responses rather than prepared responses in Chinese 1 Honors. Enrolling in a Level 1 Honors world language class is the first step toward future success in upper level courses and the pursuit of the Seal of Biliteracy. Students must earn two sequential credits in the same language to meet graduation requirements. Prerequisite: Teacher recommendation.

#### Visual Art I (General):

Art I is a one-unit survey course designed for students in grades 9-12 who are enrolling in a high school art course for the first time. Provides a variety of experiences that build on the concepts, techniques, and use of media introduced in the middle school program. Generally laboratory in nature, Art I explores and gives experience in two-dimensional (drawing, painting, printmaking) and three-dimensional (sculpture, ceramics, textiles) formats and integrates art history, design principles, and aesthetic criticism and response. *This course is a prerequisite for all other advanced art coursework*.

#### **Theatre Arts I:**

Theatre Arts I is a one-unit course for students who have an interest in drama and wish to learn the history of theatre and improve their abilities in communicating and appearing before a group. The curriculum includes exercises in pantomime, improvisation, basic stage direction, play reading, theatre history, stagecraft, basic acting skills, and oral interpretation. (Elective credit)

#### Musical Theatre: (audition only)

Musical Theatre offers students the opportunity to study and perform in this genre. This is a production-based course designed to provide students with opportunities to participate in the varied aspects of a musical theatre production. The course combines practical vocal training including diction and tone quality as well as the development of students as actors by instilling work ethic, time management and the importance of teamwork. Students will study the evolution of musical theatre and develop an appreciation for this uniquely American art form. (Elective credit) *Can be taken for multiple credits* 

#### **Female Chorus:**

Female Chorus is for female choral students to study and perform a wide variety of sacred and secular choral literature of easy to medium difficulty from all historical and performance styles. Emphasis is placed on the development of individual and ensemble skills in vocal production, tone quality, diction, intonation, balance and blend, sight-reading and music reading, and ensemble esprit de corps. Previous choral experience is not a prerequisite but would be beneficial. Performances and after-school rehearsals are required. *Can be taken for multiple credits*.

## Male Chorus:

Male Chorus is for male choral students to study and perform a wide variety of sacred and secular choral literature of easy to medium difficulty from all historical and performance styles. Emphasis is on vocal production and basic choral techniques, intonation, phrasing, sight-reading and ear training, general musicianship skills, understanding and attitude and the responsibility of individuals to the group. There are no prerequisites, although some minimum requirements may be recommended by the teacher. Performances and after-school rehearsals are required. *Can be taken for multiple credits*.

## **Advanced Mix Chorus:**

Advanced Mixed Chorus is for students who wish to study and perform a wide variety of medium to difficult sacred and secular choral literature in a variety of styles and historical periods. Emphasis will be placed on an advanced degree of musicianship and increased performance skills individually and in ensemble. The mixed chorus is for students who elect and are selected **by audition** to be in the group. Previous choral music experience is usually beneficial but not a prerequisite. Performances and after- school rehearsals are required. *Can be taken for multiple credits. Prerequisite: teacher recommendation.* 

## Marching Band: Concert, Symphonic or Wind Ensemble:

The Concert Band, Symphonic Band, and Wind Ensemble are musical groups concentrating their skills on musical performance for advanced woodwind, brass, and percussion performance. These bands play a variety of styles and types of music selected from the standard high school band repertoire. The goal of these courses is to develop proficiency on a chosen instrument through rehearsals, lessons and various performances. These bands will have several performance opportunities throughout the semester. Through these classes the students will improve instrumental skills, elevate performance skills as well as develop an understanding of the performance process. All National Music Standards are addressed and the highest expectations of musicianship and behavior are expected. Rehearsals and performances during the school day, before and after the regular school day, as well as on non-school days, may be required. (Prerequisite: Previous study of a band instrument and teacher recommendation) *Can be taken for multiple credits*.

## Percussion Ensemble:

Instrument Ensemble provides students with the opportunity to continue the study and performance of music literature relative to a specific ensemble, such as Jazz, Percussion, Brass, or Woodwind. The course focuses on advanced individual and group performance skills relative to the selected medium. Individual practice, after-school practice and rehearsal sessions, and performances are required. (Prerequisite: Teacher recommendation) *Can be taken for multiple credits*.

<u>Color Guard (Mandatory 2 block)</u>: Provides students with the opportunity of continuing the study and performance of music. The course focuses on the study of the elements of music and the development of individual and group performance skills. Individual practice, after-school practice and rehearsal sessions, and performances are required. Performance opportunities include invitational and audition clinics, festivals, and contests. Can be taken for multiple credits. Prerequisites: Previous experience and teacher approval; instructor's signature.

## Orchestra:

Orchestra provides students with the opportunity to continue the study and performance of music emphasizing styles from several historical periods. The course focuses on the study of the elements of music and the development of performance skills for individuals and ensembles. Individual practice, after-school practice and

rehearsal sessions, and performances are required. Performance opportunities include string orchestra, full orchestra, invitational and audition clinics, festivals, and contests. (Prerequisites: Previous experience and teacher recommendation) The <u>Freshman Orchestra</u> class will focus on preparing the students for high school level music.

**Festival Orchestra:** Festival Orchestra is available to grades 10-12 and to Freshman who have taken Freshman Orchestra in the Fall. Festival Orchestra is the class that will be going on trips and competing in Orchestra Festivals around the country.

Orchestra Ensemble: (requires teacher recommendation)

**Guitar (General Music):** Guitar Ensemble is a class that is open to students of all skill levels on the guitar. In Guitar Ensemble, we develop performance skills including strumming patterns, chord shapes, scales, arpeggios, sight-reading skills, and improvisation so that we can maximize the musical influence we have in performing ensembles. We perform classical, rock, funk, blues, jazz, country, and bluegrass music throughout the class.

## Air Force JROTC:

Air Force Junior Reserve Officer Training Corps (AFJROTC) is a program designed to develop citizens of character dedicated to serving their nation and community. Each AFJROTC class contains three components: aerospace science, leadership education, and a wellness program. Aerospace Science courses develop a sense of service, while focusing on science and technology. Leadership education courses emphasize citizenship and character education. Wellness is an official and integral part of the Air Force Junior ROTC program. It motivates cadets to pursue healthy, active lifestyles throughout their adult lives. Each semester of study contains an aerospace science, leadership and wellness component in a 40/40/20% ratio respectively.

The course titles JROTC I – IX refer to a cadet's current semester in the program with associated curriculum selected from the following AFJROTC course offerings.

## **CAREER TECHNICAL EDUCATION COURSES:**

#### Agriscience (NIC):

Level 1 Course for Environmental and Natural Resources Management Pathway at Byington. This is an introductory laboratory science course that prepares students for biology, subsequent science and agriculture courses, and postsecondary study. This course helps students understand the important role that agricultural science and technology plays in the twenty-first century. In addition, it serves as the first course for all programs of study in the Agriculture, Food, & Natural Resources cluster. Upon completion of this course, proficient students will be prepared for success in more advanced agriculture and science coursework. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects, Tennessee State Standards in Mathematics, and Tennessee state standards in Anatomy and Physiology, Biology I, Biology II, Chemistry I, Chemistry II, Environmental Science, Physical Science, Physics, and Physical World Concepts, as well as the National Agriculture, Food, & Natural Resources Career Cluster Content Standards. This course counts as a lab science credit toward graduation requirements. *Credit: 1 - Grade Level 9* 

## Architecture & Engineering Design I:

(Architecture Pathway (course at HVA campus))Architectural & Engineering Design I is a foundational course in the Architecture & Construction cluster for students interested in a variety of engineering and design professions. Upon completion of this course, proficient students will be able to create technical drawings of increasing complexity, and utilize these skills to complete the design process and communicate project outcomes. Students will Page 2 build foundational skills in freehand sketching, fundamental technical drawing, and related measurement and math. Standards in this course also include career exploration within the technical design industry, as well as an overview of the history and impact of architecture and engineering. In addition, students will begin compiling artifacts for inclusion in a portfolio, which they will carry with them throughout the full sequence of courses in this program of study.

## Audio/Visual Production (TV) I:

*(Level I course for Audio/Visual Production at Karns/Byington)* A/V Production I is a foundational course in the Arts, A/V Technology, & Communications cluster for students interested in A/V (audio/visual) production occupations. Upon completion of this course, proficient students will be able to explain and complete the phases of the production process including pre-production, production, and post-production. Students will establish basic skills in operating cameras, basic audio equipment, and other production equipment. Standards in this course include career exploration, an overview of the history and evolution of A/V production, and legal issues affecting A/V production. In addition, students will begin compiling artifacts for inclusion in a portfolio, which they will carry with them throughout the full sequence of courses in this program of study. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects, Tennessee State Standards in Mathematics, Tennessee State Standards for Physical World Concepts, Physical Science, Physics, and Visual Art.

Credit: 1 - Grade Level 9

## **Computer Science Foundations (NIC):**

(*First course for Coding and Cybersecurity Pathways at HVA*) It is a course intended to provide students with exposure to various information technology occupations and pathways such as Networking Systems, Coding, Web Design, and Cybersecurity. As a result, students will complete all core standards, as well as standards in two of four focus areas. Upon completion of this course, proficient students will be able to describe various information technology (IT) occupations and professional organizations. Moreover, they will be able to demonstrate logical thought processes and discuss the social, legal, and ethical issues encountered in the IT profession. Depending on the focus area, proficient students will also demonstrate an understanding of electronics and basic digital theory; project management and teamwork; client relations; causes and prevention of Internet security breaches; and writing styles appropriate for web publication. Upon completion of the CSF course, students will be prepared to make an informed decision about which Information Technology program of study to pursue.

Credit: 1 - Grade Level 9

## Cosmetology I:

*(Cosmetology Pathway at Byington)* Cosmetology I is the first level of cosmetology. It prepares students with work-related skills for advancement into the Design Principles of Cosmetology course. Content provides students the opportunity to acquire basic fundamental skills in both theory and practical applications of leadership and interpersonal skill development. Content stresses safety, environmental issues, and protection of the public and designers as integrated with principles of hair design, nail structure, and cosmetic procedures. Laboratory facilities and experiences simulate those found in the cosmetology industry. *Credit: 1 - Grade Level 9 - 10* 

## Criminal Justice I:

(*First course for Criminal Justice Pathway at HVA*) Criminal Justice I is the first course of study and serves as a comprehensive survey of how the law enforcement, legal, and correctional systems interact with each other in the United States. Upon completion of this course, proficient students will understand the context of local, state, and federal laws, have investigative skills pertaining to basic crime scenes and incident documentation, and understand the importance of communications and professionalism in law enforcement. *Credit: 1 - Grade Level 9 - 10* 

## Early Childhood Education Careers (ECEC) I:

(*Pathway at Byington*) ECEC I is a foundational course in the Education and Training career cluster intended to prepare students for careers as childcare providers, nannies, preschool teachers, and more. Course content covers the foundation of childhood development services, careers, provider responsibilities and aptitudes, and fundamentals of child development. Upon completion of this course, students will have created artifacts for inclusion in a course portfolio, which will continue with them throughout the program of study. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects and Tennessee State Standards for Psychology and Sociology, as well as the National Standards for Family and Consumer Sciences Education, Second Edition. *Credit: 1 – Grade Level 9* 

## Fundamentals of Construction (NIC):

*Level 1 Course for Pathways at Byington: Architecture; Structural Systems; and MEP Systems)* This course is a foundational course in the Architecture & Construction cluster covering essential knowledge, skills, and concepts required for careers in construction. Upon completion of this course, proficient students will be able to describe various construction fields and outline the steps necessary to advance in specific construction careers. Students will be able to employ tools safely and interpret construction drawings to complete projects demonstrating proper measurement and application of mathematical concepts. Standards in this course also include an overview of the construction industry and an introduction to building systems and materials. Students will begin compiling artifacts for inclusion in their portfolios, which they will carry with them throughout the full sequence of courses in their selected program of study. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects, Tennessee State Standards in Mathematics, and the National Center for Construction Education and Research (NCCER) Curriculum. *Credit: 1 - Grade Level 9* 

## Health Science Education:

Health Science Education is the Level 1 Course for all programs of study within the Health Science Career Cluster: Pharmacology, Sport and Human Performance, Cardiovascular Services, and Nursing Services. Health Science Education is an introductory course designed to prepare students to pursue careers in the fields of biotechnology research, therapeutics, health informatics, diagnostics, and support services. Upon completion of this course, a proficient student will be able to identify careers in these fields, compare and contrast the features of healthcare systems, explain the legal and ethical ramifications of the healthcare setting, and begin to perform foundational healthcare skills. This course will serve as a strong foundation for all of the Health Science programs of study.

Credit: 1 - Grade Level 9

## Hospitality & Tourism Management 1:

(Level 1 Course for Hospitality & Tourism Pathway at HVA). A foundational course for students interested in careers within the hospitality industry. The course allows students to explore the career opportunities and

fundamental principles that guide the organization and management of hospitality and tourism services. Upon completion of this course, students will be proficient in the foundations of hospitality and tourism, the segments of the industry, business concepts and operations, careers, and customer relations.

## Introduction to Business and Marketing:

(Business Management, Finance Pathway, Marketing and Supply Chain Management Pathway at HVA) Introduction to Business & Marketing is an introductory course designed to give students an overview of the Business Management and Administration, Marketing, and Finance career clusters. The course helps students prepare for the growing complexities of the business world by examining basic principles of business, marketing, and finance in addition to exploring key aspects of leadership, ethical and social responsibilities, and careers. Students' academic skills in communications, mathematics, and economics are reinforced with activities modeled in the context of business topics. Upon completion of this course, proficient students will be equipped with the foundational skills to succeed in any of the Business, Marketing, or Finance programs of study and will be prepared to make an informed decision regarding which pathways they would like to pursue in high school. Prerequisite(s): None. Credit: 1 - Grade Level 9 - 10

## **Introduction to Teaching as a Profession:**

(*Teaching as a Profession K-12 Pathway at HVA*) A foundational course in the Education and Training career cluster for students interested in learning more about becoming a school counselor, teacher, librarian, or speechlanguage pathologist. Upon completion of this course, proficient students will gain knowledge in the history of education in the United States, careers in education, and the influence of human development on learning. Artifacts will be created for inclusion in a portfolio, which will continue throughout the full sequence of courses. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects and Tennessee state standards in Biology I, Psychology, Sociology, U.S. Government and Civics, and U.S. History and Geography, as well as National Standards for Family and Consumer Sciences Education, Second Edition. *Credit: 1 - Grade Level 9* 

## <u> Maintenance & Light Repair I</u>

*(Level One course for Auto Maintenance & Light Repair at Byington)* This course prepares students for entry into Maintenance and Light Repair II. Students explore career opportunities and requirements of a professional service technician. Content emphasizes beginning transportation service skills and workplace success skills. Students study safety, tools, equipment, shop operations, basic engine fundamentals, and basic technician skills. Upon completing all of the Maintenance and Light Repair courses, students may enter the automotive service industry as an ASE Certified MLR Technician. Hours earned in the Maintenance and Light Repair courses may be used toward meeting National Automotive Technicians Education Foundation (NATEF) standards and Tennessee Department of Education standards. NATEF requires that 95% of the P-1 tasks, 80% of the P-2 tasks, and 50% of the P-3 tasks will be accomplished. These tasks are notated in these standards. Credit 1 - Grade Level 9

## Pre-Law I:

(*First Course for Pre-Law pathway at HVA*) Pre-Law I is the first course designed to prepare students to pursue careers in the field of law. Upon completion of this course, a proficient student will be able to describe career planning and compliance, foundations of the legal system, organization of the law and public safety system, basic constitutional protections, and types of law. In addition, students will model the professional, moral, and ethical standards required of professionals in the field of law.

## Principles of Engineering and Technology (NIC):

(Level 1 Course for the Engineering Pathway at HVA) It is a foundational course in the STEM cluster for students interested in learning more about careers in engineering and technology. This course covers basic skills required for engineering and technology fields of study. Upon completion of this course, proficient students are able to identify and explain the steps in the engineering design process. They can evaluate an existing engineering design, use fundamental sketching and engineering drawing techniques, complete simple design projects using the engineering design process, and effectively communicate design solutions to others. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects and Tennessee State Standards in Mathematics. *Credit: 1 - Grade Level 9* 

## **Principles of Fire and Emergency Services:**

(*First course for Fire Management Services Pathway at Byington*) Principles of Fire and Emergency Services is the introductory course in the Fire Management Services program of study. Students will be introduced to the challenging work of emergency responders in fire management services by learning regulations, health and safety protocol, communications, and operations. Upon completion of this course, if the teacher is a member of the local volunteer fire department, proficient students who are at least 16 years of age will have met the state requirements (T.C.A. 4-24-112) for minimum training of firefighters. Standards in this course are aligned with the National Fire Academy Fire and Emergency Services (FESHE) model. *Credit: 1 - Grade Level 9 - 10* 

## **Principles of Manufacturing (NIC):**

*Level I Course for Electromechanical Technology and Welding Pathways at Byington*. Designed to provide students with exposure to various occupations and pathways in the Advanced Manufacturing career cluster, such as Machining Technology, Electromechanical Technology, Mechatronics, and Welding. In order to gain a holistic view of the advanced manufacturing industry, students will complete all core standards, as well as standards in two focus areas. Throughout the course, students will develop an understanding of the general steps involved in the manufacturing process and master the essential skills to be an effective team member in a manufacturing production setting. Course content covers basic quality principles and processes, blueprints and schematics, and systems. Upon completion of this course, proficient students will advance from this course with a nuanced understanding of how manufacturing combines design and engineering, materials science, process technology, and quality. Upon completion of the Principles of Manufacturing course, students will be prepared to make an informed decision regarding which Advanced Manufacturing program of study to pursue. Standards in this course are aligned with Tennessee State Standards for English Language Arts & Literacy in Technical Subjects and Tennessee State Standards in Mathematics. Prerequisite(s)/corequisites: Algebra I and Physical Science strongly recommended *Credit 1- Grade 9*