

Course Guide



USD 232
2024-2025



De Soto High School
Home of the Wildcats
35000 W. 91st Street
De Soto, Kansas 66018
913-667-6250



Mill Valley High School
Home of the Jaguars
5900 Monticello Road
Shawnee, Kansas 66226
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Course Graduation Categories

Class of 2025-2027

Courses may only count toward 1 category. See course guide for more information. Courses marked with CT are only offer at Cedar Trails Exploration Center; courses marked with D are only offered at De Soto High School; and courses marked with MV are only offered at Mill Valley High School. Courses are a yearlong (1 credit) unless otherwise noted.

English Language Arts 4 Total Credits	Mathematics 4 Total Credits	Social Science 3.5 Total Credits
English 9 or Honors English 9 English 10 or Honors English 10 English 10: AP Seminar (D) English 11 AP Language & Composition English 12 AP Literature & Composition	Pre-Algebra (MV) Integrated Math I or Honors Integrated Math I Integrated Math II or Honors Integrated Math II Integrated Math III AP Calculus AB AP Calculus BC AP Precalculus AP Statistics College Algebra Intermediate Algebra Applications of Math (MV)	World Geography (.5)/Civics (.5) AP Human Geography World History AP World History (D) AP European History US History AP US History Political Participation (.5) Constitutional Law (.5) AP US Government & Politics (.5)
Communications .5 Total Credit	Physical Education / Health 1.5 Total Credits	Science 3 Total Credits
Communication (.5) Debate (.5) Advanced Debate (.5) Forensics (.5) Advanced Forensics (.5) Drama (.5) Advanced Drama (.5) Repertory Theatre AV Production Fundamentals (.5) Business Communications (MV) (.5) Teaching as a Career Teacher Internship Advanced Communication Studies (.5) (D) 21st Century Journalism (.5) Digital Media Design: Broadcast (1) Digital Media Design: Yearbook (1) Digital Media Project Management	Boys / Girls Physical Education Health (.5)	Biology or Honors Biology AP Biology Chemistry or Honors Chemistry AP Chemistry Introduction to Organic Chemistry (MV)(.5) Physical Science Physics AP Physics 1 AP Physics 2 AP Physics C: Mechanics (MV) (.5) AP Physics C: Electricity & Magnetism (MV) (.5) Human Anatomy & Physiology Environmental Science (MV) (.5) AP Environmental Science Plants & the Environment (MV)(.5) Kansas Natural History (D) Marine Science (MV) Zoology (MV) Environmental Resources & Wildlife Science Biochemistry Workplace Experience (CT) Biotechnical Engineering (CT) Biomedical Innovation (CT) Biomedical Research/Workplace Experience (CT) Medical Interventions (CT)
Fine Arts 1 Total Credit		
Art I (.5) Art II (.5) Survey of Fine Crafts (MV)(.5) Drawing (.5) Painting (.5) Ceramics (MV)(.5) Sculpture (.5) Advanced Sculpture (.5) Advanced Ceramics (MV)(.5) Advanced Drawing (.5) Advanced Painting (.5) AP Art & Design Principles of Illustration (CT) (.5)	Graphic Design Fundamentals (CT & MV)(.5) Graphic Design (CT & MV) CAPS Makerspace Project Management (CT) Graphic Design Workplace Exper. (CT & MV) Forensics (.5) Advanced Forensics (.5) Drama (.5) Advanced Drama (.5) Stagecraft (.5) Repertory Theatre Elements of Theatre (.5) (DHS) Choir Foundations Wildcat Chorale (D) Treble Choir Chamber Choir Jag Chorale (MV) Piano for Beginners (.5) Piano II (.5)	Symphonic Band (.5) Fall Concert Band (.5)(D) Concert Band (.5) Jazz Band Freshman Band (D) Marching Band (.5) Wind Ensemble (.5) Music Appreciation (MV)(.5) Percussion Ensemble (.5)(D) History of Rock and Roll (.5) Multi-Media Music (.5) Music Theory (.5) Music Composition (.5) AP Music Theory Applied Instrumental Music (.5)

Technology 2 Total Credits		
Multi-Media Music (.5) Music Theory (.5) AP Music Theory Music Composition (.5) Business Essentials (.5) Financial Literacy (.5) Accounting Advanced Accounting Investing (MV)(.5) Finance Workplace Experience Emerging Technologies (CT) Drafting/CAD Architectural Design Interior Architectural Design (.5) Research & Design in Building Trades (MV) Research & Design for Pre-Construction 21st Century Journalism (.5) AV Production Fundamentals (.5) Photo Imaging (.5) Graphic Design Fundamentals (CT & MV)(.5) Principles of Illustration (CT) (.5) Graphic Design (CT & MV) Graphic Design Workplace Exper. (CT & MV) Business Communications (MV) (.5) Biomedical Innovation (CT) Medical Interventions (CT) Biochemistry Workplace Experience Biomedical Research / Wrkpl. Exper. (CT)	Video Production I Video Production II Video Production III (MVHS) Digital Media Design: Newspaper Digital Media Design: Yearbook Digital Media Design Broadcast I Digital Media Design Broadcast II Digital Media Design Broadcast III (MV) Digital Media Project Management Engineering Design Principles of Applied Engineering Computer Integrated Manufacturing (CT) Engineering Design & Development (CT) Digital Electronics (CT) Robotics I (CT) Robotics Capstone (CT) Engineering Workplace Experience Biotechnical Engineering (CT) Interactive Media Animation (CT) Game Design (CT) Marketing Sports & Entertainment Marketing (D) (.5) Marketing Applications Marketing Workplace Experience Web Page Design Graphic Design Fundamentals (CT & MV)(.5) Entrepreneurship (MV) (.5)	AP Computer Science Principles (D & CT) AP Computer Science A (CT) Cybersecurity (CT) WBL in Programming & Software Dev. (CT) Web & Digital Comm Project Mngmt. Internship Student Technology Internship EDTEC Classes (Credit varies by program) JCCC TEC Classes (Credit varies by program) KCKCC TEC Classes (Credit varies by program) Introduction to Welding (CT)(.5) Production Blueprint Reading (CT)(.5) Production Methods I (CT) Production Methods II (CT) Work Experience in Manufacturing (CT)
Electives 5.5 Total Credits		
Creative Writing I (.5) Creative Writing II (.5) Sports Literature (MV) (.5) Current Social Issues (MV)(.5) Psychology (.5) AP Psychology Sociology of Community Service (MV)(.5) AP African American Studies (MV) History of the Holocaust (MV) Team Sports (.5) Lifetime Sports (.5) Strength & Conditioning (.5) Cheer (MV) (.5) Advanced Strength & Conditioning (.5) Cardio Fitness (.5) Dance (MV) French I French II French III French IV French V (MV) Spanish I Spanish II Spanish III Spanish IV AP Spanish Language and Culture AP Spanish Literature and Culture Heritage Spanish	ACT Prep (.5) Peers in Learning (.5) Teacher's Aide (.25) AVID 9 (D) AVID 10 (D) AVID 11 (D) AVID 12 (D) AP Research (D) AP Seminar (D) Career and Life Planning (.5) Human Growth and Development (.5) Family Studies (.5) Nutrition and Wellness (.5) Culinary Essentials (.5) Culinary Essentials II (.5) Leadership Service in Action (.5) Career Connections (.5) Community Connections (.5) Residential Carpentry I Woodworking Residential Carpentry II Construction & Design Workplace Exper. Individual & Collaborative Studies (.0) (D) Essentials of Fashion, Apparel, and Interior Design (.5)	

Course Graduation Categories

Class of 2028

USD232's curriculum provides the academic foundation all students need to succeed in college and the workforce.
Earn the USD232 diploma by earning 25 credits and completing the following requirements:

Communications: 4.5 Credits	<p><u>4 CREDITS ENGLISH</u> (1 Credit Each)</p> <ul style="list-style-type: none"> • (9th) English 9, or Honors English 9 • (10th) English 10, Honors English 10, or English 10: AP Seminar • (11th) English 11, AP Language and Composition • (12th) English 12, AP Literature and Composition, or AP Lang and Composition (D) <p><u>0.5 CREDIT Communication</u> A minimum of one semester (0.5 credit) of:</p> <ul style="list-style-type: none"> • Communication (0.5) • Debate or Advance Debate (0.5) • Forensics or Advance Forensics (0.5) • Drama or Advanced Drama (0.5) • 21st Century Journalism (0.5) • Newspaper (1.0) • Teaching as a Career (1.0) • Repertory Theatre (1.0) • Digital Media Design: Broadcast (1.0) • Digital Media Design: Yearbook (1.0) • Digital Media Project Management (1.0) • Business Communications (0.5) • Advanced Communications (1.0) • AV Production Fundamentals (1.0)
STEM: 8.0 Credits	<p><u>4 CREDITS MATH</u> (1 Credit Each)</p> <ul style="list-style-type: none"> • (9th) Integrated Math 1, Honors Integrated Math 1, or Honors Integrated Math 2 • (10th) Integrated Math 2, Honors Integrated Math 2, or AP Precalculus • (11th) Integrated Math 3, Intermediate Algebra, College Algebra, AP Precalculus, or AP Calc AB, AP Statistics • (12th) Integrated Math 3, Intermediate Algebra, College Algebra, AP Precalculus, AP Statistics, AP Calc AB, AP Calc BC, or Quantitative Reasoning Credit <p><u>3 CREDITS SCIENCE</u> (1 Credit Each)</p> <ul style="list-style-type: none"> • (9th) Biology, or Honors Biology • (10th) Chemistry, Honors Chemistry, or Physical Science • (11th/12th) Additional Science <p><u>1 CREDIT STEM ELECTIVE</u> (Courses taken 10th - 12th grade)</p> <ul style="list-style-type: none"> • Additional Advanced Science Course (not included as part of the science credit requirement), or Additional Advanced Math (not included as part of the math credit requirement), or Computer Science, Advanced CTE, or Technology Course • A complete list can be found in the Course Guide on next page

College Admissions Requirements



Qualified Admissions

The six state universities in Kansas--Emporia State University, Fort Hays State University, Kansas State University, Pittsburg State University, The University of Kansas, and Wichita State University--use the standards below, set by the Kansas Board of Regents, to review applicants for undergraduate admission.

ACCREDITED HIGH SCHOOL

Freshman applicants, aged 21 & younger, who graduate from an accredited high school, will be guaranteed admission to six state universities by meeting the Qualified Admissions requirements designated by each university, as follows:

ESU, PSU, FHSU, & WSU:

- Cumulative High School GPA 2.25+ or ACT 21+ (SAT 1060)*

K-State:

- Cumulative High School GPA 3.25+ or ACT 21+ (SAT 1060)*

KU:





- Cumulative High School GPA 3.25+
OR Cumulative GPA 2.0+ and ACT 21+ (SAT 1060)*

ALL Institutions Require:

- Cumulative GPA 2.0+ for College Credits earned in High School

KANSAS SCHOLARS CURRICULUM IS RECOMMENDED BUT NOT REQUIRED: To best prepare for the rigor of college-level courses, the Kansas Scholars curriculum is recommended.

One unit is equivalent to one year, or two semesters:

				
English 4 units	Math 4 units 1 unit of each: Algebra I, Geometry, Algebra II 1 unit: Advanced Math See KS Scholars page For Math course list	Social Science 3 units 1 unit U.S. History .5 unit U.S. Gov .5 unit World History 1 unit: Social Science course See KS Scholars Page for Social Science course list	Science 3 units 1 unit of each: Biology, Chemistry, & Physics	Foreign Language 2 units of the same language

KANSAS SCHOLARS Program: More information about the Kansas Scholars Scholarship & Curriculum can be found [here](#) (pdf).

HOMESCHOOL & UNACCREDITED HIGH SCHOOL

Freshman applicants, aged 21 and younger, who are homeschooled or graduate from an unaccredited high school will be guaranteed admission to the six state universities by achieving an ACT score equivalent to those outlined above, per each university. If you enroll in college courses while in high school, it is also required that you achieve a 2.0 GPA or higher in those courses.

**If you do not meet the qualified admission requirements, you are still encouraged to apply. Your application will be reviewed individually. Contact the university admissions office for more information.*

This document provides a summary overview of admission requirements at state universities and is not a substitute for or to be used in lieu of the actual detailed admissions requirements, which can be found at: www.kansasregents.org/qualified_admissions_rules_regulations.

February 2022

NCAA Eligibility Requirements



ONE OPPORTUNITY. LIMITLESS POSSIBILITIES.

If you want to play sports at an NCAA Division I or II school, start by registering for a Certification Account with the NCAA Eligibility Center at eligibilitycenter.org. If you want to play Division III sports or you aren't sure where you want to compete, start by creating a Profile Page at eligibilitycenter.org.

ACADEMIC REQUIREMENTS

To play sports at a Division I or II school, you must graduate from high school, complete 16 NCAA-approved core courses, earn a minimum GPA and earn an ACT or SAT score that matches your core-course GPA.

CORE COURSES

Only courses that appear on your high school's list of NCAA core courses will count toward the 16 core-course requirement; visit eligibilitycenter.org/courselist for a full list of your high school's approved core courses. Complete 16 core courses in the following areas:

DIVISION I

Complete 10 NCAA core courses, including seven in English, math or natural/physical science, before your seventh semester.

ENGLISH	MATH (Algebra I or higher)	NATURAL/ PHYSICAL SCIENCE (Including one year of lab, if offered)	ADDITIONAL (English, math or natural/physical science)	SOCIAL SCIENCE	ADDITIONAL COURSES (Any area listed to the left, foreign language or comparative religion/philosophy)
4 years	3 years	2 years	1 year	2 years	4 years

DIVISION II

ENGLISH	MATH (Algebra I or higher)	NATURAL/ PHYSICAL SCIENCE (Including one year of lab, if offered)	ADDITIONAL (English, math or natural/physical science)	SOCIAL SCIENCE	ADDITIONAL COURSES (Any area listed to the left, foreign language or comparative religion/philosophy)
3 years	2 years	2 years	3 years	2 years	4 years

GRADE-POINT AVERAGE

The NCAA Eligibility Center calculates your grade-point average based only on the grades you earn in NCAA-approved core courses.

- DI requires a minimum 2.3 GPA.
- DII requires a minimum 2.2 GPA.

SLIDING SCALE

Divisions I and II use sliding scales to match test scores and GPAs to determine eligibility. The sliding scale balances your test score with your GPA. If you have a low test score, you need a higher GPA to be eligible. Find more information about test scores at ncaa.org/test-scores.

TEST SCORES

You may take the SAT or ACT an unlimited number of times before you enroll full time in college. Every time you register for the SAT or ACT, use the NCAA Eligibility Center code 9999 to send your scores directly to us from the testing agency. We accept official scores only from the ACT or SAT, and won't use scores shown on your high school transcript. If you take either test more than once, the best subscore from different tests are used to give you the best possible score.

Ways to Earn College Credit While Still in High School

Advanced Placement (AP)

Certain advanced courses in the high school program are designated Advanced Placement (AP). The AP examinations given each May, on a standardized national test day, are scored by the Education Testing Service. Each examination receives an overall score on a five-point scale:

- 5 points = extremely well qualified
- 4 points = well qualified
- 3 points = qualified
- 2 points = possibly qualified
- 1 point = no recommendation

Each college decides which AP examination scores it will accept. Some colleges accept scores of 3 or better and give the student credit as if that person had taken one or more basic courses in the subject tested. In some cases, credit is not given, but the necessity of taking basic courses is waived. Students can check individual college AP credit policies by using the College Search on the College Board website.

It is recommended that college bound students consider taking one or more AP courses. Research shows students completing one or more AP courses, regardless of their grade, do better in college than those never taking AP courses. The current cost for most AP exams is \$98.

Dual Credit Enrollment

JCCC: The College Now program for high school sophomores, juniors, and seniors is offered in cooperation with Johnson County Community College. A student must complete a JCCC application, placement tests or qualifying ACT/GPA and provide payment for tuition. A high school transcript may be required for placement purposes at the time of enrollment. College Now classes are aligned with the curriculum at JCCC, but are taught in the high school classroom. For more information, go to www.jccc.edu/collegenow.

Baker University: Baker Concurrent Credit Classes are college classes taken by qualified high school students that concurrently count toward high school graduation and college degree courses. Partner high schools work with Baker to seek approval for particular instructors and courses within the school. Baker and the high school both transcript the students' grades. Students from a partner high school district who are in an approved Concurrent Credit Class and have a cumulative high school GPA of 3.0 or higher are eligible to earn Baker credit. Eligible students must be recommended by their high school counselor. www.bakeru.edu/concurrent-credit/

Wichita State: Courses are offered in the area of engineering through Wichita State for course-by-exam credit. Students who are in the engineering pathway will be provided information from their instructors to earn college credit. <https://www.wichita.edu/admissions/undergraduate/concurrent.php>

KCKCC TEC: Course are offered in the area of technical education. Students can earn college credits and certifications upon completion of the program. <https://www.kckcc.edu/academics/divisions/technology-workforce-development/index.html>. Many of these programs qualify for Excel in CTE (free tuition).

JCCC Excel in CTE: Johnson County Community College and USD 232 have a CTE partnership that provides students with the opportunity to earn credits towards various certifications. Excel in CTE provides free college tuition. <https://www.jccc.edu/admissions/early-college/career-pathways/>

Quick Step

Quick Step is for high school students who want to enroll in classes on the Johnson County Community College campus. 10th - 12th graders may enroll in JCCC courses. Students interested in the Quick Step program should contact their counselor for procedures.

Advanced Placement Credit/Dual Credit

Dual credit enrollment course offerings are dependent upon current staffing qualifications as required by the educational institution and can change after the publication of this course guide.

	Advanced Placement	JCCC	Baker	KCKCC TEC
AP Biology	X	X (MVHS)		
AP Physics 1	X		X (MVHS)	
AP Physics 2	X		X (MVHS)	
AP Physics C	X (MVHS)			
AP Chemistry	X	X (MVHS & CTEC)		
Introduction to Organic Chemistry			X (MVHS)	
AP Environmental Science	X			
Anatomy and Physiology			X (MVHS)	
AP Statistics	X	X (DHS)	X (MVHS)	
AP Precalculus	X	X		
AP Calculus AB	X	X		
AP Calculus BC	X	X		
College Algebra		X		
AP Computer Science Principles	X (DHS & CTEC)	X (DHS & CTEC)		
AP Computer Science A	X (CTEC)	X (CTEC)		
AP Language & Composition	X	X		
AP Literature & Composition	X	X		
English 10: AP Seminar	X (DHS)			
AP Music Theory	X	X		
AP Psychology	X			
AP European History	X			
AP US History	X		X (MVHS)	
AP World History	X (DHS)			
AP Government & Politics	X		X (MVHS)	
AP Human Geography	X			
AP African American Studies	X (MVHS)			
AP Art & Design	X			
French III		X		
French IV		X		
French V		X (MVHS)		
Spanish IV		X		
AP Spanish Language & Culture	X	X		
AP Spanish Literature & Culture	X	X		
Advanced Communication		X (DHS)		
AP Seminar	X (DHS)			
AP Research	X (DHS)			
Teaching as a Career			X	
Teaching Internship			X	
Marketing Workplace Experience		X (MVHS)		
Certified Nurse Asst. Certificate		X		X
Auto Collision I & II				X
Auto Technology I & II		X		X
Welding I & II		X		X

Construction Technology				X
Machine Technology				X
Multimedia Video Production				X
Automation Engineer Technology		X		
Construction Management		X		
Electronics Technology		X		
Culinary Arts		X		X
Electrical Technology		X		X
HVAC Technology		X		X
Plumbing Technology		X		
Cybersecurity		X		X
Drafting		X		
Emergency Medical Responder		X		
Fashion Merchandising and Design		X		

Advanced Placement vs. Dual Enrollment Credit			
	Advanced Placement Credit	JCCC College Now Credit	Baker University
Cost	\$98 per exam	\$97 per credit hour	\$118 per credit hour
Transferring Credit	Accepted by almost all US colleges & universities including highly selective schools. The way the credit reflects on the transcript varies by institution. Can earn a letter grade, credit only or advancement to the next level.	Transfers to most state schools in and outside of Kansas.	Check transfer credit policy of the institutions you are interested in.
How Credit is Earned	Achieving a score of 3, 4, or 5 on the AP exam in May. Check individual courses credit policy at www.collegeboard.org/ap/creditpolicy	Check transfer credit policy of the institutions you are interested in.	Check transfer credit policy of the institutions you are interested in.
Amount of Credit Earned	Can depend on the score. Higher scores can earn more credit.	The credit hours assigned to the course. Usually 3 or 5 credit hours.	The credit hours assigned to the course. Usually 3 or 5 credits.
*Important – Students should check individual college credit policies for the institutions in which they are interested.			

GPA Calculation and Weighted Grades

USD 232 implements a weighted grading system to recognize and reward academic work in selected Honors, AP, and approved Dual Credit courses. To compute grade point average, the total number of points earned is divided by the total number of credits attempted (not the total credits earned). Averages are figured cumulatively, that is, the total points for all semesters of school work are divided by the total number of credits attempted for all semesters.

Students transferring into USD232 will receive weighted grade credit only for courses designated as weighted courses by USD 232.

The weighted grading system will be used to determine USD232 student honors and distinctions, including class rank. Transcripts will reflect both weighted and unweighted grade point averages.

Note: the weight of each course is identified in the course description heading and course information table.

Letter Grade	Standard GPA	Honor Courses: Partial Weight (PW)	AP & Dual Credit Courses: Full Weight (FW)
A	4.0	4.5	5.0
B	3.0	3.5	4.0
C	2.0	2.5	3.0
D	1.0	1.0	1.0
F	0	0	0

Core Courses

English Language Arts										
Course Title	Credit	Weight	KS Regents	College Credit	NCAA	9	10	11	12	Prerequisite
English 9	1		X		X	X				None
Honors English 9	1	PW	X		X	X				None
English 10	1		X		X		X			None
Honors English 10	1	PW	X		X		X			None
English 10: AP Seminar	1	FW	X		X		X			None
English 11	1		X		X			X		None
AP Language & Composition	1	FW	X	X	X			X		None
English 12	1		X		X				X	None
AP Literature & Composition	1	FW	X	X	X				X	None
Creative Writing I	0.5				X	X	X	X	X	None
Creative Writing II	0.5				X	X	X	X	X	Creative Writing
Sports Literature	0.5					X	X	X	X	None

English 9 Grade 9

CAG10A/B

Credit: 1

This course includes a balance of reading, writing, listening, and speaking skills. Students read novels, plays, short stories, poetry and non-fiction. Students will compose Narrative, Expository, Persuasive, and Technical writings. The class includes the study of literary terms, vocabulary and conventions, as well as the application of research skills.

English 10: AP Seminar DHS Grade 10

CAH21A/B

Credit: 1

The College Board states, "An English course taught in the AP Seminar style, English 10: AP Seminar helps students build foundational writing, collaboration, research, and presentation skills for future success in high school, college, and career." Students will focus on analyzing a variety of texts, including both fiction and informational texts, as well as writing in response to readings.

Honors English 9 Grade 9

CAH10A/B

Credit: 1

This rigorous course is intended to introduce and prepare students for Advanced Placement courses and exams. This course contains a balance of reading, writing, listening, and speaking skills. Students read novels, plays, short stories, poetry and non-fiction. Students will compose Narrative, Expository, Persuasive, and Technical writings. The class includes the application of research skills and the study of literary terms, vocabulary and conventions.

Honors English 10 Grade 10

CAH20A/B

Credit: 1

This rigorous course is intended to introduce and prepare students for Advanced Placement courses and exams. This course covers a multitude of genres including literature (poetry, drama, short stories, non-fiction, and novels), writing (narrative, persuasive, technical, and expository), and grammar and vocabulary usage. Students will be analyzing various writings that will enhance student's critical thinking skills, as well as write critical writing pieces.

English 10 Grade 10

CAG20A/B

This course covers a multitude of genres including literature (poetry, drama, short stories, non-fiction, and novels), writing (narrative, persuasive, technical, and expository), and grammar and vocabulary usage.

English 11 Grade 11

CAG30A/B

Credit: 1

This course studies grammar, vocabulary, expository, persuasive, technical and narrative writing, and American literature. The literature includes short stories, speeches, plays, novels, letters, and poetry by American authors. Each quarter, students explore the literature through reading, writing, discussion and projects. Students also practice speaking skills, researching skills and reading independently.

AP Language and Composition	Grade 11
CAP30A/B	Credit: 1
This rigorous course is intended to prepare students to take the AP English Language and Composition exam. AP English Language and Composition engages students in becoming skilled readers of prose written in a variety of rhetorical contexts, and in becoming skilled writers who compose for a variety of purposes. Both their writing and their reading should make students aware of the interactions among a writer's purposes, audience expectations, and subjects as well as the way generic conventions and the resources of language contribute to effectiveness in writing. The course requires that students be able to think, read, and write critically and creatively at an advanced level.	

English 12	Grade 12
CAG40A/B	Credit: 1
This class studies British literature from Anglo Saxon times to the present. Grammar and mechanics are reviewed. Formal composition skills are highly emphasized and focus on expository, persuasive, narrative and technical writing. Projects, portfolios, and class presentations encourage both written and oral communication. A research paper will be required for this course.	

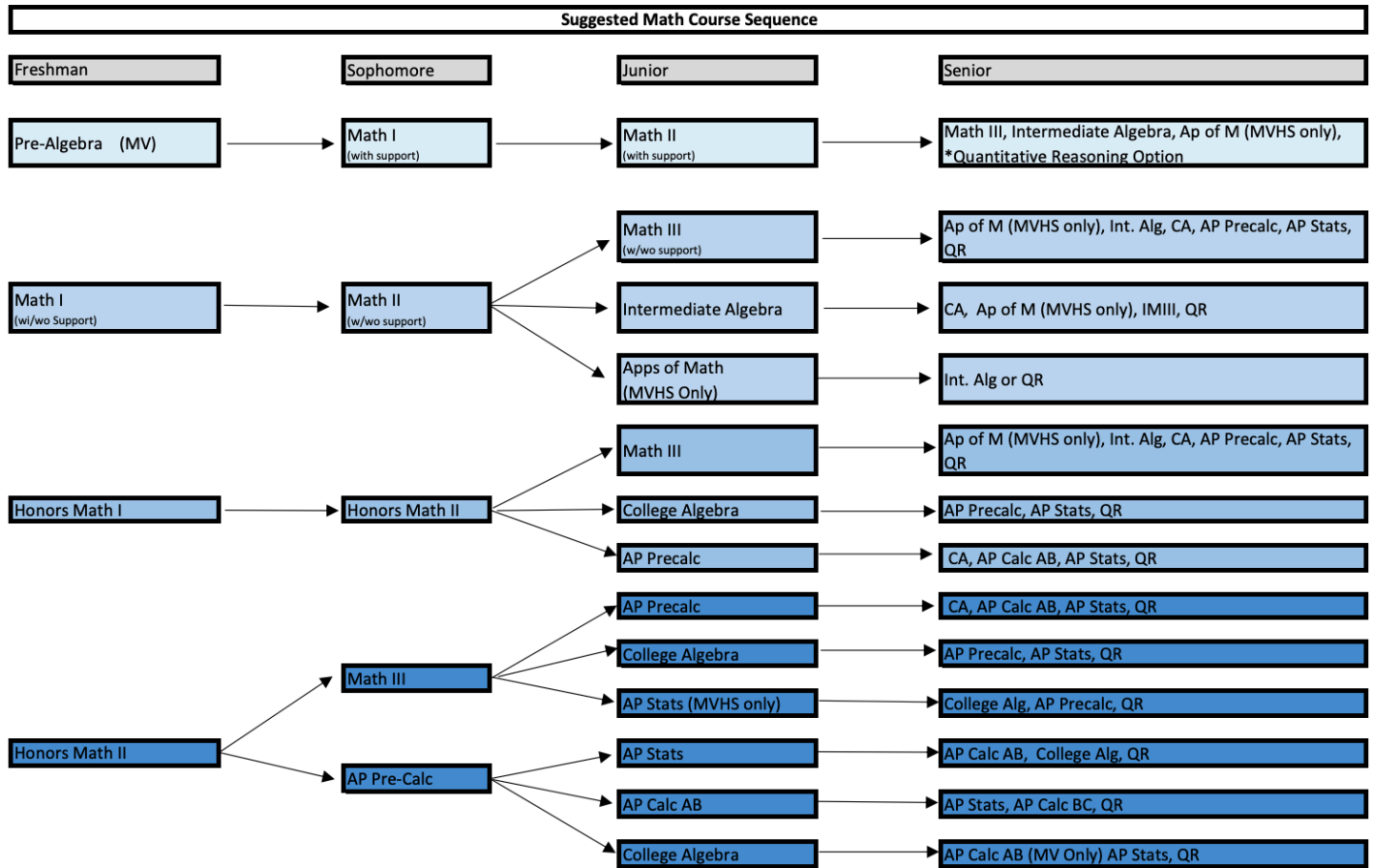
AP Literature & Composition	Grade 12
CAP40A/B	Credit: 1
This rigorous course is intended to prepare students to take the AP Literature and Composition exam. AP Literature and Composition course engages students in the careful reading and critical analysis of imaginative literature. Through close reading of selected texts, students deepen their understanding of the ways writers use language to provide both meaning and pleasure for their readers. As they read, students consider a works structure, style, and themes as well as such smaller scale elements as use of figurative language, imagery, symbolism, and tone. Student writings include impromptu essays, extended essays, and reader responses with an emphasis on literary analysis.	

Creative Writing I	Grades 9-12
CAG61	Credit: .5
This introductory course offers student writers the opportunity to create written ideas in a number of different areas. Types of work created throughout the semester vary from poetry to short stories. Student writers receive instructor and peer feedback while expressing individual creative thoughts.	

Creative Writing II	Grades 9-12
CAG62	Credit: .5
This course expands upon the skills learning in Creative Writing. Topics will include genre writing, play writing, and advanced composition of poetry and short fiction. Student writers receive feedback from peers and the instructor while learning to improve their creative writing through the revision process.	

Sports Literature (MVHS)	Grades 9-12
CAG60	Credit: .5
This course focuses on exploring universal themes found in the literature of sports such as gender equity, adversity, perseverance, determination, defeat, integrity, and values. Students will be required to respond to literature as well as to films and music studied in class connecting themes discussed. The genres of literature read will be poetry, short story, essay, editorial, and novel. Students will write within the following areas: editorial, persuasive, and narrative.	

Mathematics



Math Graduation Credit - Quantitative Reasoning Option (Seniors Only)

The current district requirement is that USD 232 high school students earn four credits of math for graduation.

If a student successfully completes Integrated Math III, or an equivalent-level course, by the conclusion of Grade 11, the student, as a senior, may substitute one unit of Mathematics with one unit of “Quantitative Reasoning” taken during their senior year if it aligns with the student’s Individual Plan of Study.

An application for this is available upon request from Student Services.

Courses that can be recognized as “Quantitative Reasoning” are listed in the following table:

Technology	Electives	Science
Accounting	AP Music Theory	AP Biology
Advanced Accounting	Auto Collision (EDTEC, KCKCC TEC)	AP Chemistry
AP Computer Science A (CT)	Auto Refinishing (EDTEC)	AP Physics C (MV)
Architectural Design	Automotive Technology (JCCC, KCKCC TEC)	AP Physics I
Automation Engineer (JCCC)	Biomedical Innovation (CT)	AP Physics II
Biotechnical Engineering (CT)	Construction & Design Workplace Experience	Biochemistry Workplace Experience
Computer Integrated Manufacturing (CT)	Construction Technology (KCKCC TEC)	Biomedical Innovation (CT)
Financial Literacy (.5)	Culinary Applications (EDTEC)	Biomedical Research/Workplace Experience (CT)
Cybersecurity (CT, JCCC, KCKCC TEC)	Culinary Arts (EDTEC, JCCC, KCKCC TEC)	Biotechnical Engineering (CT)
Digital Electronics (CT)	Culinary Essentials (EDTEC)	Chemistry
Electrical Technology (JCCC, KCKCC TEC)	Drafting/CAD (JCCC)	CNA (EDTEC, JCCC, KCKCC TEC)
Electronics Technology (JCCC)	HVAC (JCCC, KCKCC TEC)	Environmental Resources and Wildlife Science
Engineering Workplace Experience (CT)	Introduction to Welding (CT)(.5)	Health Careers OJT (EDTEC)
Engineering Design and Development (CT)	Marketing	Intro to Organic Chemistry (MV) (.5)
Finance Workplace Experience	Marketing Applications	Medical Interventions (CT)
Interior Architectural Design	Music Composition (.5)	Physical Science
Investing (MV)(.5)	Plumbing Technology (JCCC)	Physics
Machine Technology (KCKCC TEC)	Production Blueprint Reading (CT)(.5)	
Principles of Engineering	Production Methods I (CT)	
Research and Design for Pre-Construction	Production Methods II (CT)	
Research and Design in Building Trades (MV)	Residential Carpentry I	
Robotics (CT)	Residential Carpentry II	
Robotics Capstone (CT)	Woodworking	
WBL in Programming & Software Devel. (CT)	Work Experience in Manufacturing (CT)	

Mathematics

Course Title	Credit	Weight	KS Regents	College Credit	NCAA	9	10	11	12	Prerequisite
Pre-Algebra	1					X				Teacher placement
Integrated Math I	1		X		X	X				None
Honors Integrated Math I	1	PW	X		X	X				None
Integrated Math II	1		X		X		X			Integrated Math I OR Honors Integrated Math I
Honors Integrated Math II	1	PW	X		X	X	X			Integrated Math I OR Honors Integrated Math I
Integrated Math III	1		X		X		X	X		Integrated Math II OR Honors Integrated Math II
AP Precalculus	1	FW	X	X	X		X	X	X	Honors Integrated Math II or Integrated Math III
AP Calculus AB	1	FW	X	X	X			X	X	AP Precalculus
AP Calculus BC	1	FW	X	X	X				X	AP Calculus AB
AP Statistics	1	FW	X	X	X			X	X	Integrated Math III, College Alg. OR AP Precalculus
College Algebra	1	FW	X	X	X			X	X	Integrated Math III, Honors Integrated Math II or AP Precalculus
Intermediate Algebra	1				X			X	X	Integrated Math II and/or teacher placement
Applications of Math	1							X	X	Teacher placement

Pre-Algebra MVHS Grade 9

MAG03A/B

Credit: 1

This course is designed for students who are continuing to build their mathematic foundational skills in the areas of number sense, algebraic thinking, graphing, order of operations involving integers and fractions. Students will also strengthen skills in solving 1 and 2 step equations. Student who successfully complete this course would be ready for IM1.

Honors Integrated Mathematics I Grade 9

MAH10A/B

Credit: 1

The intent of the honors curriculum is to prepare students to take Advanced Placement and dual-credit courses. Students who enroll in honors courses are expected to take the subsequent honors classes. Honors Integrated Math I students cover all of the Integrated Math I concepts at a deeper level of understanding and/or complexity, and they cover some additional content such as: exponential functions, exponential regression, geometric sequences and matrices. The pace is slightly faster and additional content is covered in most units.

Honors Integrated Mathematics II Grades 9-10

MAH11A/B

Credit: 1

Prerequisite: Integrated Math I or Honors Integrated Math I

The intent of the honors curriculum is to prepare students to take the Advanced Placement and dual-credit courses. Students who enroll in honors courses are expected to take the subsequent honors classes. Honors Integrated Math II students cover all of the Integrated Math II concepts at a deeper level of understanding and complexity. Additional content is covered including concepts such as higher degree polynomials, rational equations and expressions, and matrices.

Integrated Mathematics I Grade 9

MAG10A/B

Credit: 1

The fundamental purpose of Integrated Math I is to build on algebra concepts. Students will expand on skills they learned in Middle School to increase their algebra knowledge to form a strong algebra foundation. Basic concepts of statistics and geometry are also introduced. Topics include: function families, solving complex equations, transformations of functions and graphs, graphing and solving linear functions, inequalities, and absolute value functions, systems of equations and inequalities, simplifying radicals and applying to geometry, basic concepts involving circles, basic statistics concepts and graphs/charts, exponent rules, and introduction to factoring. Students focusing on these concepts while also learning, reading, and applying information from their graphing calculator.

Integrated Mathematics II Grade 10

MAG11A/B

Credit: 1

The focus of Integrated Math II is on quadratic expressions, equations and functions. Students will compare quadratic characteristics and behaviors to those of linear relationships from Integrated Math I. First semester students will explore the basics of geometry including terminology, angle relationships, similarity and congruence of polygons, right triangle trigonometry and properties and theorems of triangles, quadrilaterals, and circles. Second semester, students will focus is on quadratic expressions, equations, and functions and applications of these concepts to physics. Extension of the set of rational numbers to real and complex numbers are introduced for the solving of quadratic equations.

Integrated Mathematics III	Grades 10-12
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MAG12A/B	Credit: 1
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Prerequisite: Integrated Math II or Honors Integrated Math II

Integrated Mathematics III provides students an opportunity to pull together and apply the accumulation of learning that they have gained from previous courses. Content in this course is grouped into four critical areas, organized into units. They apply methods from probability and statistics to draw inferences and conclusions from data. Students expand their repertoire of functions to include polynomial, rational, and radical functions. Students expand their study of right triangle trigonometry to include general triangles. And, finally, students bring together all of their experience with functions and geometry to create models and solve contextual problems. 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.

AP Precalculus	Grade 10-12
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MAP32A/B	Credit: 1
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Prerequisite: Integrated Math III or HIMII

This course will be replacing Honors Precalculus, prepares students for college-level math and science courses, and contains topics relevant for careers in mathematics, physics, biology, health science, social science, and data science. During this course, they will use mathematical tools and lenses in everyday situations, develop an understanding of modeling and functions, and examine scenarios through multiple representations.

AP Calculus AB	Grades 11-12
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MAP30A/B	Credit: 1
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Prerequisite: Precalculus

This rigorous course is intended to prepare students for the AP Calculus exam. AP Calculus is primarily concerned with developing the students' understanding of the concepts of calculus and providing experience with its methods and applications. This course emphasizes a multi-representational approach to calculus, with concepts, results and problems being expressed graphically, numerically, analytically and verbally.

College Algebra	Grades 11-12
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MAG20A/B	Credit: 1
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Prerequisite: Integrated Math III, HIMII, AP Precalc

This course focuses on the study of functions and their graphs, techniques of solving equations and the recognition and creation of patterns. Students will analyze and graph basic algebraic relations and exponential and logarithmic functions; solve equations and inequalities, including polynomial equations, exponential equations, logarithmic equations, systems of linear equations and systems of linear inequalities; and analyze and create algebraic and numerical patterns.

AP Calculus BC	Grade 12
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MAP31A/B	Credit: 1
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Prerequisite: AP Calculus AB

This rigorous course is intended to prepare students for the AP Calculus exam. AP Calculus BC is primarily concerned with extending the student's ability to solve integrals, apply integration to more advanced problems and to employ numerical techniques when The Fundamental Theorem of Calculus cannot be applied. This course emphasizes a multi-representational approach to calculus, with concepts, results and problems being expressed graphically, numerically, analytically and verbally.

AP Statistics	Grade 11-12
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MAP40A/B	Credit: 1
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Prerequisite: Integrated Math III, Precalculus, College Algebra

This rigorous course is intended to prepare students for the AP Statistics exam. AP Statistics includes collecting, analyzing, and drawing conclusions from data. The student will describe data patterns and departure from patterns, use sampling and experimentation to plan and conduct studies, explore random phenomena using probability and simulations, estimate population parameters and test hypotheses. TI-84 calculator required.

Intermediate Algebra	Grades 11-12
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MAG04A/B	Credit: 1
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Prerequisite: Integrated Math II and/or teacher placement

In this course, students continue to develop and strengthen their foundational algebra skills to prepare for College Algebra. This course focuses on arithmetic and algebraic manipulation, equations and inequalities, and analysis of equations and graphs. Students will simplify arithmetic and algebraic expressions including those containing rational expressions, rational exponents, radicals and complex numbers. Students will solve equations and inequalities including linear, quadratic, quadratic in form, and those containing rational expressions, radicals or absolute value. In addition, students will graph linear equations and inequalities and analyze functions and non-functions.

Applications of Math (MVHS)	Grade 11-12
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MAG62A/B	Credit: 1
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Prerequisite: Teacher placement

This course places an emphasis on problem solving techniques and practical real life math applications and is designed to help students strengthen their basic math skills. It does not prepare students for a college level math course. **This course does not fulfill Kansas Scholars Curriculum.**

Science

Course Title	Credit	Weight	KS Regents	College Credit	NCAA	9	10	11	12	Prerequisite
Biology	1		X		X	X				None
Honors Biology	1	PW	X		X	X				None
AP Biology	1	FW	X	X (MVHS)	X			X	X	Biology and Chemistry
Applied Biochemistry (CTEC)	1		X					X	X	Biology and Chemistry or Concurrent Enrollment
Chemistry	1		X		X		X	X	X	Biology and Concurrent enrollment in Math II
Honors Chemistry	1	PW	X		X		X	X	X	Biology or Concurrent enrollment in Integrated Math II
AP Chemistry	1	FW	X	X (MVHS)	X			X	X	Honors Chemistry
Introduction to Organic Chemistry	0.5	FW	X	X (MVHS)	X			X	X	AP Chemistry
Physical Science	1		X		X		X	X	X	None
Environmental Science	0.5		X		X		X	X	X	Biology
AP Environmental Science	1	FW	X		X			X	X	None
Plants & the Environment	0.5		X		X		X	X	X	Biology
Kansas Natural History	1		X		X			X	X	Biology
Marine Science	1		X		X		X	X	X	Biology
Zoology	1		X		X		X	X	X	Biology
*Environmental Resources & Wildlife Science	1		X		X			X	X	Chemistry
*Biochemistry Workplace Experience	1		X		X			X	X	Application Only
Medical Interventions	1		X		X			X	X	Chemistry
*Biotechnical Engineering	1		X		X			X	X	Biology and Chemistry or Concurrent Enrollment
*Biomedical Innovation	1		X		X			X	X	Medical Interventions
*Biomedical Research/ Workplace Experience	1		X		X			X	X	Application Only
Human Anatomy & Physiology	1		X	X (MVHS)	X			X	X	Biology & Chemistry
Physics	1		X		X		X	X	X	Biology and Integrated Math II
AP Physics 1	1	FW	X	X (MVHS)	X			X	X	Integrated Math III or concurrent enrollment
AP Physics 2	1	FW	X	X (MVHS)	X			X	X	Precalculus and AP Physics 1
AP Physics C: Mechanics	0.5	FW	X		X			X	X	AP Physics 1, AP Physics 2, AP Calculus AB (concurrent enrollment)
AP Physics C: Electricity and Magnetism	0.5	FW	X		X			X	X	AP Physics 1, AP Physics 2, AP Calculus AB (concurrent enrollment)
*Application Level CTE Course										

Biology

Grade 9

SCG10A/B

Fee \$10 Per Year

Credit: 1

Biology is the study of living things and how they interact with their environment. This introductory course is designed for students who desire an overview of biology. Laboratory experiences include microscopic work, technology applications and basic laboratory skills.

Honors Biology

Grade 9

SCG10A/B

Fee \$10 Per Year

Credit: 1

This rigorous course is intended to introduce and prepare students for Advanced Placement courses and exams. This course is designed for students who desire a comprehensive survey of Biology, the study of living things and how they interact with their environment. The class is designed to provide students with a solid foundation needed for success in future life science courses. Laboratory experiences include microscopic work, technology applications, dissection and basic laboratory skills.

AP Biology

Grades 11-12

SCP10A/B

Fee \$10 Per Year

Credit: 1

Prerequisite: Biology and Chemistry

This rigorous course is intended to prepare students for the AP Biology exam. This course will provide students with the conceptual framework, factual knowledge and analytical skills necessary to deal critically with the rapidly changing science of Biology. The goals of the course are to help students develop a conceptual framework for modern Biology and gain an appreciation of science as a process through lab experiences.

Chemistry

Grades 10-12

SCG20A/B

Fee \$10 Per Year

Credit: 1

Prerequisite: Biology and concurrent enrollment in Integrated Math II (Not recommended for students taking Integrated Math II Support)

The class is designed to provide students with a solid foundation in chemical knowledge and principles needed for success in college chemistry. Topics covered include atomic structure, periodic properties of elements, chemical bonding, molecular structure, chemical equations, stoichiometry, gas laws, and acid/base chemistry.

Honors Chemistry		Grades 10-12
SCH20A/B	Fee \$10 Per Year	Credit: 1
This rigorous course is intended to introduce and prepare students for Advanced Placement courses and exams. The class is designed to provide students with a solid foundation in chemical knowledge and principles needed for success in college chemistry. Topics covered include atomic structure, periodic properties of elements, chemical bonding, molecular structure, chemical equations, stoichiometry, gas laws, and acid/base chemistry. This course covers more topics, in greater depth, than chemistry. Lab work is more involved, and independent learning are emphasized.		

AP Chemistry		Grades 11-12
SCP20A/B	Fee \$10 Per Year	Credit: 1
Prerequisite: Honors Chemistry This rigorous course is intended to prepare students for the AP Chemistry Exam. AP Chemistry topics covered include atomic theory and structure and chemical bonding, kinetics, equilibrium, and thermodynamics. AP Chemistry labs are equivalent to those typically found in college level chemistry courses. The class is designed to provide students with a solid foundation in chemical knowledge and principles.		

Introduction to Organic Chemistry	MVHS ONLY	Grades 11-12
SCG21	Fee \$10 Per Year	Credit: .5
Prerequisite: AP Chemistry This course is a one-semester introduction to organic chemistry designed to be taken after successful completion of AP Chemistry. It focuses on structure and bonding, reaction mechanisms, stereochemistry, and chemical reactivity. Many of the major classes of organic compounds will be covered including but not limited to alkanes, alkenes, alkyl halides, and alcohols. Students who are successful in this course are well prepared for more advanced organic chemistry classes taken in college.		

Physical Science		Grades 10-12
SCG00A/B	Fee \$10 Per Year	Credit: 1
Physical Science is a laboratory-based class that introduces basic chemistry and physics principles and allows the student to apply those principles to their environment. Classroom activities serve as a basis for developing math, science and inquiry skills needed for further study in science. The student will become familiar with laboratory equipment, techniques and procedures, as well as gathering and interpreting data. This course is not intended for students who have successfully completed Chemistry.		

Environmental Science	MVHS ONLY	Grades 10-12
SCG50	Fee \$10 Per Year	Credit: .5
Prerequisite: Biology This introductory course will provide an overview of environmental science with emphasis on ecology, populations, and human impact on the environment. Students will explore the interactions between organisms and their environment through projects and activities indoors and outdoors, as well as through in class work. Students will be required to participate in outdoor activities.		

AP Environmental Science		Grades 11-12
SCP50A/B	Fee \$10 Per Year	Credit: 1
Prerequisite: Biology Equivalent to a one semester, introductory college course in environmental science, through which students engage with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world. Environmental Science is interdisciplinary, embracing topics from geology, biology, environmental studies, environmental science, chemistry and geography.		

Plants and the Environment	MVHS ONLY	Grades 10-12
SCG12	Fee \$10 Per Year	Credit: .5
Prerequisite: Biology This course is designed as a field and lab course where students will gain knowledge of the niche that plants fill in the natural balance of the biological spectrum. Course content deals with plant anatomy, identification, classification, and propagation. In addition, students will explore the relationship plants have with insects as well as an introduction into weather (time permitting). There will be two large projects consisting of an insect collection and leaf collection to provide a better opportunity to study and learn these topics in detail. Students will be required to participate in outdoor activities which include handling of insects		

Kansas Natural History	DHS ONLY	Grades 11-12
SCG51A/B	Fee \$10 Per Year	Credit: 1
Prerequisite: Biology This is a field course that should attract students who desire to gain a better appreciation for the plants and animals native to the area in which we live. Included in the curriculum are studies of both terrestrial and aquatic habitats, identification of various groups of organisms and population survey.		

Marine Science	MVHS ONLY	Grades 10-12
SCG15A/B	Fee \$10 Per Year	Credit: 1
Prerequisite: Biology This course is designed to enlighten students as to the potential they may hold for a career in Marine Science. Emphasis will be placed upon the physical aspects of the oceans, as well as the living. The marine inhabitants will be studied at great length. Course content will include physical characteristics of the ocean, human impact and an overview of the marine inhabitants. Students will conduct and present several small research projects and conclude with a larger, in-depth project on a topic of their		

Zoology	MVHS ONLY	Grades 10-12
SCG13A/B	Fee \$10 Per Year	Credit: 1
Prerequisite: Biology Zoology offers curricular diversity to students. This course includes selected topics in animal biology such as taxonomy and evolution, animal physiology, and ecology. Laboratory research skills are developed in the classroom and outdoors.		

Environmental Resources & Wildlife Science	Grades 11-12
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SCG14A/B	Fee \$10 Per Year	Credit: 1
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Prerequisite: Chemistry

This is an advanced level course that builds on Environmental Science and other life science classes. It is an application level course that is part of the Kansas CTE Biochemistry pathway. This course will provide strong emphasis on field and classroom research, laboratory investigations, and real-life application in the field of environmental science through partnerships with outside businesses. Students will gain a solid foundation for pursuit of a potential career in a field related to environmental science. Potential topics include: sustainability, conservation, ecology, soils, water resources, fisheries, plants, forestry, wildlife, air quality, waste, energy, and environmental careers. This course is ideal for students who are passionate about the environment and wishing to continue their education in one of the many fields of environmental science.

Medical Interventions	CTEC ONLY	Grades 11-12
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CTG77A/B	Fee \$10 Per Year	Credit: 1
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Students 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. Through real-world cases, students are exposed to a range of interventions related to immunology, surgery, genetics, pharmacology, medical devices, and diagnostics.

Biomedical Innovation	(CTEC)	Grades 11-12
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CTG74A/B	Fee \$10 Per Year	Credit: 1
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In this research course, students will apply their knowledge and skills to answer questions or solve problems related to the biosciences. Students design innovative solutions for the health challenges of the 21st century (such as the cure for Cancer, etc.) by addressing topics such as clinical medicine, biochemistry, physiology, biomedical engineering, and/or public health. They may have the opportunity to work on an independent project and may work with a mentor or advisor from industry.

Human Anatomy/Physiology	Grades 11-12
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SCG40A/B	Fee \$10 Per Year	Credit: 1
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This course involves a study into the structure and function of the human body. Eleven body systems will be investigated through a problem based learning approach. Major emphasis will be placed on learning how these systems work.

AP Physics 1	Grades 11-12
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SCP30A/B	Fee \$10 Per Year	Credit: 1
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Prerequisite: Integrated Math III or concurrent enrollment

AP Physics 1 is an algebra-based, introductory college-level physics course. Students cultivate their understanding of Physics through inquiry-based investigations as they explore topics such as Newtonian mechanics (including rotational motion); work, energy, and power; mechanical waves and sound; and introductory, simple circuits.

AP Physics C: Mechanics	MVHS ONLY	Grades 11-12
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SCP34	Fee \$5 Semester	Credit: .5
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AP Physics C: Mechanics is equivalent to a one-semester, calculus-based, college-level physics course, especially appropriate for students planning to specialize or major in physical science or engineering. The course explores topics such as kinematics; Newton's laws of motion; work; energy and power; systems of particles and linear momentum; circular motion and rotation; and oscillations and gravitation. Introductory differential and integral calculus are used throughout this course.

Biochemistry Workplace Experience	(CTEC)	Grades 11-12
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CTG73A/B		Credit: 1
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This workplace experience course is a Career & Technical Education (CTE) elective course, which can be one or two semesters depending on the length of the internship. Students will seek out this internship, which might combine onsite experiences with in-class experiences and provide students with the opportunity to work on client-based projects. Students will participate in a minimum of 60 hours of work-related experiences per semester.

Biotechnical Engineering	(CTEC)	Grades 11-12
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CTG71A/B		Credit: 1
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Prerequisite: Chemistry

Biotechnical Engineering enables students to develop and expand their knowledge and skills in biology, physics, technology and mathematics. Course content draws upon diverse fields such as biomedical engineering, biomolecular genetics, bioprocess engineering, or environmental engineering. Students may engage in project-based learning and problems related to biomechanics, cardiovascular engineering, genetic engineering, tissue engineering, biomedical devices, human interfaces, bioprocesses, forensics, and bioethics.

Biomedical Research/Workplace Experience	(CTEC)	Grades 11-12
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CTG76A/B	Fee \$10 Per Year	Credit: 1
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Advanced level application course that incorporates experienced based learning including client-based projects or Internships supported by classroom research within their area of interest/study.

Physics	Grades 10-12
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SCG30A/B	Fee \$10 Per Year	Credit: 1
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Prerequisite: Biology and Integrated Math II

This class is designed to provide students with a solid foundation in the knowledge and principles of physics. It is a valuable preparation for college physics. Topics covered include motion in one and two dimensions; forces, vectors, momentum, gravitation, work and energy changes, waves, sounds light and optics, electricity and electromagnetism.

AP Physics 2	Grades 11-12
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SCP31A/B	Fee \$10 Per Year	Credit: 1
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Prerequisite: AP Physics 1 and Precalculus/Integrated Math III

AP Physics II is an algebra-based, introductory college-level physics course. Students cultivate their understanding of Physics through inquiry-based investigations as they explore topics such as fluid statics and dynamics; thermodynamics with kinetic theory; PV diagrams and probability; electrostatics; electrical circuits with capacitors; magnetic fields; electromagnetism; physical and geometric optics; and quantum, atomic, and nuclear physics.

AP Physics C: Electricity and Magnetism	MVHS ONLY	Grades 11-12
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SCP52	Fee \$5 Semester	Credit: .5
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AP Physics C: Electricity and Magnetism is a one-semester, calculus-based, college-level physics course, especially appropriate for students planning to specialize or major in physical science or engineering. The course explores topics such as electrostatics; conductors, capacitors, and dielectrics; electric circuits; magnetic fields; and electromagnetism. Introductory differential and integral calculus are used throughout this course.

Social Science

Course Title	Credit	Weight	KS Regents	College Credit	NCAA	9	10	11	12	Prerequisite
World Geography	0.5		X		X	X				None
Civics	0.5		X		X	X				None
AP Human Geography	1	FW	X		X	X				None
World History	1		X		X		X			None
AP World History	1	FW	X		X		X			None
AP European History	1	FW	X		X		X			None
US History	1		X		X			X		None
AP US History	1	FW	X	X-MVHS	X			X		None
AP US Government & Politics	0.5	FW	X	X-MVHS	X				X	None
Political Participation	0.5		X		X				X	None
Constitutional Law	0.5		X		X				X	None
Current Social Issues	0.5		X		X		X	X	X	None
Psychology	0.5		X		X		X	X	X	None
AP Psychology	1	FW	X		X			X	X	None
Sociology of Community Service	0.5							X	X	Application
History of the Holocaust	0.5		X					X	X	None
AP African American Studies	1	FW	X		X		X	X	X	None

World Geography

Grade 9

SSG70

Credit: .5

Students will examine different regions and cultures of the world while developing skills critical to success in secondary social studies, such as historical thinking, analyzing primary sources, interpreting maps and graphs, evaluating evidence to draw conclusions, and organizing the components of an argument.

Civics

Grade 9

SSG34

Credit: .5

Students will examine the historical development of governance, with an emphasis on evaluating the functions, structure, and cultural impact of government in the United States. The development of skills critical to success in secondary social studies, such as historical thinking, analyzing primary sources, interpreting maps and graphs, evaluating evidence to draw conclusions, and organizing the components of an argument will be emphasized.

AP Human Geography

Grade 9

SSP03A/B

Credit: 1

Course Description: Students will gain an understanding of how humans have shaped the face of the planet through migration, land use, and governments. They will be able to identify patterns in data and visual sources such as maps, and understand spatial relationships using geographic scales.

World History

Grade 10

SSG00A/B

Credit: 1

With an emphasis on western civilization, students will explore the emergence of the modern world, beginning with the Renaissance era and concluding with the Cold War. Students will be expected to engage in the historical thinking process, analyze primary source documents, evaluate the consequences of past decisions and communicate ideas and arguments related to historical concepts.

AP World History

(DHS ONLY)

Grade 10

SSP00A/B

Credit: 1

AP World History is designed to be the equivalent of a two-semester introductory college or university world history course. In AP World History students investigate significant events, individuals, developments, and processes in six historical periods from 1200 CE 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. The course provides five themes that students explore throughout the course in order to make connections among historical developments in different times and places: interaction 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.

AP European History

Grade 10

SSP01A/B

Credit: 1

This rigorous course is intended to prepare students for the AP European History exam. The study of European History since 1450 introduces students to cultural, economic, political, and social development that played a fundamental role in shaping the world in which we live.

US History

Grade 11

SSG30A/B

Credit: 1

This course provides a chronological narrative of U.S. History beginning in the late 19th century through the 20th century while exploring major themes that have shaped our modern nation during that period. Students also will develop reading comprehension, critical thinking, and composition skills through student centered activities.

AP US Government & Politics	Grade 12
SSP 31	Credit: .5
This rigorous course is intended to prepare students for the AP Government exam. In this college level course students will analyze and evaluate the various components of the United States political system, including the public policy making process. Topics of study include American political culture, constitutional principles, historical origins of the U.S., inter-government relations, political parties, public opinion, interest groups, the role of media in politics, and federal bureaucracy.	

Political Participation	Grade 12
SSG33	Credit: .5
This senior level course will be divided into two main units of study. The first unit will focus on understanding "political science." Students will explore how political beliefs are formed. They will learn how each unique personal experience shapes values and how these values shape beliefs. Students will evaluate the different values of liberals, conservatives, libertarians, and moderates and how these values will shape each belief on specific topics. The second unit of study will be political application. Students will be completing hands on projects where they evaluate how political science has been applied and can be identified in almost all aspects of life (Music, Film, Literature, TV, News, etc.).	

Constitutional Law	Grade 12
SSG32	Credit: .5
This course will examine the origins of individual rights guaranteed in the U.S. Constitution and how those rights have changed over time through rulings of the Supreme Court. This course will also serve as an introduction to the study of law as students will learn how to apply legal reasoning to analyze individual cases and evaluate the Court's decisions. Topics of study will include freedom of speech, freedom of religion, the right to bear arms, search and seizure, individual rights in a criminal trial, privacy rights, and due process.	

Current Social Issues	MVHS Only	Grades 10-12
SSG73		Credit: .5
In this elective course, students will analyze issues currently confronting our nation and the world, evaluate multiple action plans to address each issue, and ultimately argue and defend their own positions on each issue. Through structured cooperative learning activities and independent research, students will analyze information from multiple sources and perspectives in print and electronic media. Throughout the course activities, students will develop critical thinking as well as written and oral communication skills.		

Psychology	Grades 10-12
SSG50	Credit: .5
An introductory survey course based on exploring and analyzing human behavior and cognition. Topics of study include psychological perspectives, research methods, biological bases of behavior, principles of learning, human development, personality theories, and social psychology.	

AP Psychology	Grades 11-12
SSP50A/B	Credit: 1
This rigorous course is intended to prepare students for the AP Psychology exam. This college level course introduces students to the systematic and scientific study of the behavior and cognition of human beings, exposes students to each major subfield within psychology, and enables students to examine the methods psychologists use in their science and practice.	

Sociology of Community Service	MVHS Only	Grade 11-12
SSG60A(fall)	SSG701 (spring)	Credit: .5
Prerequisite: Application		Using a sociological perspective, students will examine various social issues such as gender roles, aging, race and ethnic relations, family and marriage and institutional reforms. Students will focus on how these issues affect society today and their impact for the future. Students will apply this knowledge through various community service activities throughout the area while studying these issues.

History of the Holocaust	MVHS Only	Grade 11-12
SSG35		Credit: .5
Prerequisite: Application		Using a sociological perspective, students will examine various social issues such as gender roles, aging, race and ethnic relations, family and marriage and institutional reforms. Students will focus on how these issues affect society today and their impact for the future. Students will apply this knowledge through various community service activities throughout the area while studying these issues.

AP African American Studies	MVHS	Grade 10-12
SSP04A/B		Credit: 1
Course Description: "AP African American Studies is an interdisciplinary course that examines the diversity of African American experiences through direct encounters with authentic and varied sources. Students explore key topics that extend from early African kingdoms to the ongoing challenges and achievements of the contemporary moment." – College		

Physical Education / Health

Course Title	Credit	9	10	11	12	Prerequisite
Girls Physical Education	1	X				None
Boys Physical Education	1	X				None
Health	0.5		X			None
Team Sports	0.5		X	X	X	Physical Education
Lifetime Sports	0.5		X	X	X	Physical Education
Strength & Conditioning	0.5	X	X	X	X	None
Advanced Strength & Conditioning	0.5		X	X	X	Strength & Conditioning
Cardio Fitness	0.5		X	X	X	Physical Education
Dance	1	X	X	X	X	Audition
Cheer	0.5	X	X	X	X	Audition
*Students may enroll in a maximum of two P.E. courses per semester						

Boys/Girls Physical Education

Grade 9

PEG10A/B PEG11A/B Fee for CPR Credit: 1
 This activity class is directed toward core skills and strategies in team and dual sports, with an emphasis on proficiency in personal fitness. Examples of areas covered are flag football, volleyball, soccer, basketball, softball, badminton, tennis, weight training, jogging, fitness evaluation, and CPR certification. During physical education classes, all freshman students participate in an online alcohol prevention program, AlcoholEdu® for High School. Developed by prevention experts at EverFi, this interactive course delivers a science-based, interactive prevention experience about alcohol and focuses on healthy decision-making strategies for youth. This course is required for graduation and is the prerequisite for all of the electives in PE.

Team Sports

Grades 10-12

PEG20 Credit: .5
Prerequisite: Boys/Girls Physical Education
 This is a more competitive class designed to increase a student's physical fitness level and athletic skill through the following activities: flag football, soccer, softball, volleyball, team handball, basketball and other indoor and outdoor team sports. The class will consist of daily conditioning and team activities

Strength & Conditioning

Grades 9-12

PEG30A (fall) PEG 30B (spring) Credit: .5
 This class consists of physical conditioning and an introduction to weight training with an emphasis on lifting techniques and safety guidelines in the weight room. Fitness tests will be utilized throughout the school year emphasizing agility, muscular and cardiovascular endurance, strength, power, and flexibility. This class should only be taken by students who are self-motivated and wish to strive for a high level of fitness.

Health

Grade 10

PEG50 Credit: .5
 This class will cover concepts related to health promotion and disease prevention so that students are able to make appropriate life style choices. Health units covered are: nutrition; prevention and control of disease; injury prevention and safety; personal health; mental and emotional health; substance use, misuse, abuse, and addiction; environmental health; family life and sexuality; consumer health; and

Lifetime Sports

Grades 10-12

PEG13 Fee: \$20 Credit: .5
Prerequisite: Boys/Girls Physical Education
 This less-competitive class is designed to provide an opportunity for students to participate in a variety of activities that will enable them to lead active and healthy lives. Activities include: Jogging, disc golf, golf, archery, badminton, pickle ball, aerobics, bowling, social dance, softball, volleyball, tennis, and other indoor and outdoor games.

Advanced Strength & Conditioning

Grades 10-12

PEG31A (fall) PEG 31B (spring) Credit: .5
Prerequisite: Strength & Conditioning
 This course is extremely high in intensity and is designed to meet the needs of highly motivated students. Areas of physical fitness that will be stressed include: Muscular Strength, Core Strength, Flexibility, Endurance, Cardiovascular Endurance, and Body Composition. Instruction will focus on strength, flexibility and aerobic conditioning. This course will include stretching, lifting, sprinting, jogging, plyometric, anaerobic conditioning and aerobic conditioning.

Cardio Fitness	Grades 10-12
PEG32	Credit: .5
Prerequisite: Boys/Girls Physical Education	
This class provides opportunities for students to attain a healthy level of physical fitness. The class will stress health related fitness components and utilize equipment to benefit cardiovascular, strength, and flexibility. Supplemental activities may include cycling, yoga, Pilates, and dumb bell workouts.	

Cheer	(MVHS Only)	Grades
9-12		
PEG22		Credit: .5
Prerequisite: Audition		
This class provides opportunities for students to attain a healthy level of physical fitness. The class will stress health related fitness components and utilize equipment to benefit cardiovascular, strength, and flexibility. Supplemental activities may include cycling, yoga, Pilates, and dumb bell workouts.		
*Course is dependent upon staffing.		

Dance	(MVHS Only)	Grades 9-12
PEG21A/B		Credit: 1
Prerequisite: Audition		
Dance team is designed to teach and develop several types of dance techniques, music interpretation and choreography skills. Performances during the fall season include pep assemblies, home football games and local competitions. Winter and spring seasons include pep assemblies, home basketball games, dance competitions, and other special events. A spring show is scheduled as a finale for the year. Additional practices may be scheduled, as needed. One audition for the dance team is held in the spring for the following year. This course will also provide an opportunity to compete in regional and national competitions.		

Elective Courses

Art

Course Title	Credit	9	10	11	12	Prerequisite
Art I	0.5	X	X	X	X	None
Art II	0.5	X	X	X	X	Art I
Survey of Fine Crafts	0.5	X	X	X	X	None
Drawing	0.5	X	X	X	X	Art I
Painting	0.5		X	X	X	Drawing (MV) Art I (DHS)
Ceramics	0.5	X	X	X	X	Art I
Sculpture	0.5	X	X	X	X	Art I
Advanced Sculpture	0.5		X	X	X	Sculpture
Advanced Ceramics	0.5		X	X	X	Ceramics
Advanced Drawing	0.5		X	X	X	Drawing
Advanced Painting	0.5		X	X	X	Painting
AP Art & Design	1		X	X	X	Drawing and Painting (MVHS) Art II (DHS)
Graphic Design Fundamentals	0.5	X	X	X		None
Principles of Illustration	0.5			X	X	None
Graphic Design	1		X	X	X	Graphic Design Fundamentals
*Graphic Design Workplace Experience	1			X	X	Graphic Design
*Application Level CTE Course						

Art I Grades 9-12

ARG10 Fee: \$20 Per Semester Credit: .5
This introductory art course covers: Art Production, Aesthetics, Art Criticism, & Art History. An emphasis will be placed on learning and applying the Elements & Principles of art in order to create a vocabulary that allows for the creation of, connections with, and an understanding of the arts.

Survey of Fine Crafts MVHS Only Grades 9-12

ARG50 Fee: \$20 Per Semester Credit: .5
Students will explore and develop skills required for producing artisan crafts. Students will develop problem solving skills as they communicate with the world around them through various media including: jewelry making, batik, basketry, enameling, glass fusing, fiber techniques, wood carving, wood burning, mosaics, and duct tape.

Painting Grades 10-12

ARG20 Fee: \$20 Per Semester Credit: .5
Prerequisite: Drawing(MV) Art I (DHS)
This course introduces the novice and advanced painter alike to the essential concepts and techniques of painting. There will be an emphasis on perceptual work including still life, nature elements, and self-portrait. We will explore the ability to create space through expressive, symbolic and descriptive techniques. Topics covered include color mixing, paint application, and styles of painting.

Sculpture Grades 9-12

ARG30 Fee: \$20 Per Semester Credit: .5
Prerequisite: Art I
This course provides a three dimensional approach to problem-solving through a variety of media and materials, such as paper, ply board, clay, plaster, wood, wire, metal, and stone. Techniques learned include modeling, carving, assemblage, and casting. The history of sculpture is covered as well.

Art II Grades 9-12

ARG11 Fee: \$20 Per Semester Credit: .5
Prerequisite: Art I
This course serves to enhance the student's creative experience in art production, aesthetics, art criticism, and art history. An emphasis will be placed on learning and applying the elements and principles of art in order to create a vocabulary that allows for the recreation of, connections with, and an understanding of the arts.

Drawing Grades 9-12

ARG12 Fee: \$20 Per Semester Credit: .5
Prerequisite: Art I
Students will be introduced to "Drawing on the Right Side of the Brain" by Betty Edwards which will strengthen their drawing ability. Students will view and discuss the works of the great masters from art history as well as explore a variety of media, styles, and subjects as they create several original drawings.

Ceramics MVHS Only Grades 9-12

ARG40 Fee: \$20 Per Semester Credit: .5
Prerequisite: Art I
This course covers the production and history of both functional and non-functional ceramic ware. Students will learn hand-building methods, including pinch, slab, coil, and extruded forms. The elements of art and principles of design are stressed as they apply to form and surface decoration.

Advanced Sculpture Grades 10-12

ARG31 Fee: \$20 Per Semester Credit: .5
Prerequisite: Sculpture
This course is a continuation of Sculpture I. More complex technical processes are emphasized. Assignments stress independent aesthetic problem-solving and allow opportunities for unlimited personal and creative decision making.

Advanced Ceramics	MVHS Only	Grades 9-12
ARG41	Fee: \$20 Per Semester	Credit: .5
Prerequisite: Ceramics		
This course is a continuation of clay methods in Ceramics I and will introduce students to the potter's wheel. Emphasis is placed on research and experimentation in clay and glazes. Assignments provide opportunity for unlimited personal and creative decision making and will allow students to excel in the medium.		

Advanced Painting		Grades 10-12
ARG21	Fee: \$20 Per Semester	Credit: .5
Prerequisite: Painting		
Advanced Painting is an advanced course that provides students with a sequence of conceptual painting problems based upon past and contemporary artistic practices. Through studio projects that engage broad topics in painting, students will begin to define their own personal interests and develop their own style and voice. This course leads students to develop a greater level of conceptual knowledge and technical skill, which prepares them for the self-generated problems in AP Art. Studio projects will be augmented by critical readings, art slides and visits to contemporary art exhibitions.		

Graphic Design Fundamentals	MVHS & CTEC	Grades 9-11
CTG04	Fee: \$20 Per Semester	Credit: .5
Graphic Design Fundamentals is an introduction to design elements and principles in the purposeful arrangement of images and to communicate a message. The focus is on learning typography, composition and visualization in order to create art products such as posters, flyers and other print media.		

Graphic Design	MVHS & CTEC	Grades 10-12
CTG52A/B	Fee: \$40 Per Year	Credit: 1
Graphic Design will focus on creativity and the design process with an emphasis on creative thinking and problem solving. We will create art products such as compositions, branding and logo design, package design, corporate brochures and advertising. We will learn and incorporate the production processes with our projects and know the differences between spot printing and process printing.		

Advanced Drawing		Grades 10-12
ARG13	Fee: \$20 Per Semester	Credit: .5
Prerequisite: Drawing		
Students will continue to strengthen their drawing skills with strong emphasis on observational drawing, figure drawing, and drawing from the imagination. Conceptual and compositional skills will be stressed as students explore and master a variety of media. Students will develop their own final unit of study for this advanced class.		

AP Art & Design		Grades 10-12
ARP51A/B	Fee: \$40 Per Year	Credit: 1
Prerequisite: Drawing and Painting-MVHS or Art II-DHS		
This rigorous course is intended to prepare students for the AP Art & Design exam. The AP Art & Design is designed for students who are seriously interested in the practical experience of art. Students will develop an art portfolio. The AP Art & Design exam is not based on a written exam; instead, students submit either a 2-D, 3-D, or drawing portfolio at the end of the school year.		

Principles of Illustration	CTEC	Grades 11-12
CTG02	Fee: \$20 Per Semester	Credit: .5
Principles of Illustration explores a variety of media, tools and supports as a means to communicate ideas. Topics include an understanding of illustration as applicable to careers in graphic design, animation, apparel/textile design, industrial design, web design, architecture, interior design and fine arts. Techniques in traditional and digital illustration applications will be explored as directly linked to social trends.		

Graphic Design Workplace Experience	MVHS & CTEC	Grades 11-12
CTG01A/B	Fee: \$40 Per Year	Credit: 1
Prerequisite: Graphic Design		
Graphic Design Workplace Experience will take the tools and software that you used in Graphic Design and apply them to "real world" applications. We will meet with clients and gain an understanding of problem solving for real projects considering production processes and client needs. We will develop a digital portfolio of projects to prepare you for submissions to college and to prepare you for job interviews.		

Performing Arts: Communications

Course Title	Credit	9	10	11	12	Prerequisite
Communications	0.5	X	X	X	X	None
Advanced Communication Studies	0.5			X	X	None
Debate	0.5	X	X	X	X	None
Advanced Debate	0.5		X	X	X	Debate
Forensics	0.5	X	X	X	X	None
Advanced Forensics	0.5		X	X	X	Forensics
Drama	0.5	X	X	X	X	None
Advanced Drama	0.5	X	X	X	X	Drama
Elements of Theater	0.5	X	X	X	X	None
Stagecraft	0.5		X	X	X	Elements of Theatre (DHS)
Repertory Theatre	1		X	X	X	Audition

Communications

Grades 9-12

SDG 30

Credit: .5

This course emphasizes communication skills. The course will cover interpersonal and intrapersonal skills and public speaking techniques. Each student will prepare and present speeches.

Advanced Communication Studies (DHS Only)

Grades 11-12

SDG 31

Credit: .5

Course Description: This course is a dual-credit course that prepares students for collegiate communication. This course serves as an introduction to the principles of public speaking and interpersonal communication. Topics covered include models of communication, perception, listening, language, non-verbals, small groups, and relationships. Speaking performances are a central activity of the course.

Advanced Debate

Grades 10-12

SDG 11

Credit: .5

Prerequisite: Debate

Advanced Debate is a first-semester co-curricular speech course that continues the study of argumentation, persuasion, critical thinking and performance of debate started in the prerequisite Debate class. Students enrolled in this co-curricular class are considered members of their High School's Competitive Debate Team and will spend time both in and outside of class conducting research, preparing for and competing in at least four competitions at neighboring schools on Fridays and Saturdays outside of class time. Students enrolled in this course must meet KSHSAA eligibility requirements for interscholastic competition and represent themselves and the squad in a respectful manner at all times.

Debate

Grades 9-12

SDG 20

Credit: .5

Debate is a first-semester co-curricular competitive speech course that develops advanced communication and critical thinking skills. Students taking debate must have strong reading abilities, the ability to speak quickly, and be comfortable accessing and utilizing shared digital files via a laptop computer. In this course, students will conduct extensive research and prepare arguments for and against a pre-determined resolution. Debate is a co-curricular class and all students enrolled in this course are considered members of their High School's Competitive Debate Team. Students in debate must participate in at least three public speaking competitions during the semester. These competitions take place at neighboring schools on Fridays and Saturdays outside of class time. Students must meet KSHSAA eligibility requirements for interscholastic competition and represent themselves and the squad in a respectful manner at all times.

Forensics

Grades 9-12

SDG 10

Credit: .5

Forensics is a performance-based class that meets during second semester. Students enrolled in this co-curricular class are considered members of the Forensics Team and will be preparing both in and outside of class to speak, present, and/or perform in a tournament competition. This course covers the fundamentals of forensics which include oral interpretation, humorous interpretation, informative speaking, original oratory, extemporaneous speaking, Lincoln Douglas and Public Forum debate and duet acting. Students will select and perform play cuttings and performance material for at least three Forensics tournaments which are usually scheduled on Saturdays. Students must meet KSHSAA eligibility requirements for interscholastic competition and represent themselves and the squad in a respectful manner at all times.

Drama

Grades 9-12

SDG 40

Credit: .5

This course covers basic acting and improvisation skills as well as theatre appreciation. Students are expected to learn basic stage terminology, stage concepts, and fundamental skills used in acting.

Advanced Forensics	Grades 10-12
SDG 11	Credit: .5
Prerequisite: Forensics	
Advanced Forensics is a second-semester course that will take the study of Forensics to more advanced levels. This is a co-curricular class designed for those students who have already completed the Forensics prerequisite. Students in this class will contribute competitively in multiple events as well as help create performance files for the squad. Students may choose from events including oral interpretation, humorous interpretation, informative speaking, original oratory, extemporaneous speaking, Lincoln Douglas and Public Forum debate and duet acting. As members of the Forensics Team, students will select and perform play cuttings and performance material for at least four Forensics tournaments which are usually scheduled on Saturdays. Students must meet KSHSAA eligibility requirements for interscholastic competition and represent themselves and the squad in a respectful manner at all times.	

Advanced Drama	Grades 9-12
SDG 42	Credit: .5
Prerequisite: Drama	
Advanced drama is for those students who have mastered the basics of presentation and character development and who are ready to apply those skills to more demanding material and more polished performances. Advanced drama will also build on the basic techniques used in acting and increase the skill set to include the technical theatre skills necessary for the production of a play. Students who successfully pass this class will learn various monologue styles and apply techniques that will be useful as they prepare for future auditions. As part of this preparation students will also be introduced to theatre history and the various styles of theatre performance that have been prevalent in different periods. The final project of this class will be the staging of a play with all of the technical aspects performed and designed by the students.	

Elements of Theater	DHS	Grades 9-12
SDG 44		Credit: .5
In this course, students will learn the basic elements of theatre. Elements of theatre such as costume, make-up, lights, sounds, and scripts will be explored throughout the semester. Students will gain an understanding of how each element contributes to the larger production. This course will allow students to access a greater depth of knowledge on each element of theatre.		

Repertory Theatre	Grades 10-12
SDG41A/B	Credit: .5
Audition	
This class is by audition only for students in grades 10-12. This is a performance-centered course of study, which will enhance the theater arts education of the total theater student. Students will advance their knowledge of acting techniques, directing skills, scene study, analysis of dramatic literature and criticism, design, playwriting and evaluating theater performances. This will be accomplished through the production of full and one-act plays, which will be both teacher and student produced, designed and directed. In addition, students would pursue independent, required projects. There will be at least one evening performance required each semester.	

Stagecraft	Grades 10-12
SDG 43	Credit: .5
Prerequisite: Elements of Theatre (DHS)	
Stagecraft allows students to develop skills in designing and constructing theatrical related scenery. This course will help to develop student skills and understanding of planning and building structures used in theatre sets.	

Performing Arts: Music

Course Title	Credit	9	10	11	12	Prerequisite
Choir Foundations	1	X	X	X	X	None
Jag Chorale	1		X	X	X	Audition
Chamber Choir	1		X	X	X	Audition
Wildcat Chorale	1		X	X	X	Choir Foundations
Treble Choir	1		X	X	X	None
Marching Band	0.5	X	X	X	X	None
Fall Concert Band (DHS)	0.5	X	X	X	X	None
Wind Ensemble (DHS)	0.5	X	X	X	X	Audition
Symphonic Band	0.5	X	X	X	X	Audition
Concert Band	0.5	X	X	X	X	Audition
Jazz Band	1	X	X	X	X	Concurrent enrollment in band
Percussion Ensemble	0.5	X	X	X	X	None
Music Appreciation	0.5	X	X	X	X	None
Music Composition	0.5		X	X	X	Music Theory
Multi-Media Music	0.5	X	X	X	X	None
Applied Instrumental Music	0.5	X	X	X	X	Instructor Permission
Music Theory	0.5		X	X	X	None
History of Rock and Roll	0.5	X	X	X	X	None
AP Music Theory	1			X	X	Recommend Music Theory
Piano for Beginners	0.5	X	X	X	X	None
Piano II	0.5	X	X	X	X	Piano for Beginners
*Band is a yearlong commitment. Enrollment in a first and second semester course is expected.						

Choir Foundations

Grades 9-12

MUG10A/B

Credit: 1

This choir is a beginner ensemble for any student with no prior singing experience at the high school level. The primary focus of this choir will be developing music literacy skills, rehearsal skills and continuing to help the voice develop. In addition to 4 required evening performances, this group will perform at one of our KSHSAA choral festivals.

Chamber Choir

Grades 10-12

MUG12A/B

Credit: 1

Prerequisite: Audition

This choir is an advanced, auditioned ensemble of SATB (Soprano, Alto, Tenor and Bass) voices. This choir will perform various genres of music, including jazz, madrigals, multicultural and other styles as needed. Members will perform outside of class time in area concerts, KSHSAA Regional and State contests, Kansas Music Educators Association (KMEA) district auditions and will serve as ambassadors of the choir department for school sporting events and area functions.

Jag Chorale

MVHS Only

Grades 10-12

MUG11A/B

Credit: 1

Prerequisite: Audition

This choir is an advanced, auditioned ensemble for SATB (Soprano, Alto, Tenor and Bass) voice parts who have prior high school singing experience. All Jag Singer members must be enrolled in Jag Chorale. Primary focus will be on building on musicianship skills while developing the voice. In addition to 4 required evening performances, this ensemble will perform at KSHSAA Large Group Festival.

Wildcat Chorale

DHS Only

Grades 10-12

MUG13A/B

Credit: 1

Prerequisite: Choir Foundations

This choir is an intermediate ensemble for SATB (Soprano, Alto, Tenor and Bass) voice parts who have prior high school singing experience. Primary focus will be on building on musicianship skills while developing the voice. In addition to 4 required evening performances, this ensemble will perform with De Soto Voce at KSHSAA Large Group Festival.

Treble Choir	Grades 10-12
MUG14A/B	Credit: 1
This choir is an intermediate ensemble for treble voices (Soprano and Alto only) who have prior high school singing experience. Primary focus will be on building on musicianship skills while developing the voice. In addition to 4 required evening performances, this group will perform at one of our KSHSAA choral festivals.	

Fall Concert Band	(Fall Only)(DHS)	Grades 9-12
MUG21A/B	Fee: \$20	Credit: .5
Prerequisite: MVHS-Previous band experience or instructor approval		
The Fall Concert Band is a group for students that do not wish to enroll in Marching Band in the Fall. Students enrolled in this course at MVHS will participate in limited marching band and focus on preparing intermediate-level concert band literature for the rest of the semester. Students enrolled in this course at DHS will exclusively prepare concert band literature while focusing on developing music fundamentals and ensemble skills. Enrollment in a second-semester instrumental music course (Wind Ensemble, Symphonic Band, or Concert Band (DHS Only)) is required.		

Symphonic Band	(Spring Only)	Grades 9-12
MUG22		Credit: .5
Prerequisite: Audition		
This is the second performing ensemble at DHS/MVHS. The Symphonic Band will perform intermediate to advanced literature. Students in Symphonic Band are encouraged to participate in the All-District and All-State audition process and are highly encouraged to perform a solo or in a chamber group for Solo and Ensemble Festival. Many Symphonic Band students take or have taken private lessons on their instruments. The Symphonic Band performs on all major band concerts and performs at the KSHSAA State Large Group festival in the Spring.		

Jazz Band	Grades 9-12
MUG24A/B	Credit: 1
Students in the Jazz Band will learn to play music in styles including swing, bebop, Latin, funk, and rock. Students will also learn theory, history, and improvisation. The Jazz Band performs at all band concerts and in least one regional adjudicated jazz festival. Enrollment in the Jazz Band is by audition and/or by permission of the instructor. Jazz Band members must also be enrolled in Marching Band or Fall Concert Band in the Fall and Wind Ensemble, Symphonic Band, or Concert Band (DHS Only) in the Spring, with exceptions for players of certain instruments and students with scheduling conflicts.	

Music Appreciation	(MVHS Only)	Grades 10-12
MUG40		Credit: .5
This course is for students who are interested in the study of music history and how music reflects society. Students will learn to apply the fundamentals of music to the following musical eras: Renaissance, Baroque, Classical, Romantic, Music of Stage and Screen, Jazz, Pop, and Rock.		

Multi-Media Music	Grades 9-12
MUG42	Credit: .5
In this course students will learn to experience music through the use of multi-media technology. This hands-on course will include units on the elements of music: performing music, creating music, development of music, critical listening, audio recording and reinforcement, music in our world, and music in our daily lives. No previous musical experience is required, only a desire to learn more about music.	

Marching Band	(Fall Only)	Grades 9-12
MUG20	Fee: \$20	Credit: .5
Prerequisite: Previous band experience or instructor approval		
Marching Band is intended to develop students' technique for playing brass, woodwind, and percussion instruments and cover appropriate band literature styles, primarily for marching performances. Offered only in the fall semester. Enrollment in a second-semester instrumental music course is required.		

Wind Ensemble	(DHS)(Spring Only)	Grades 9-12
MUG28		Credit: .5
Prerequisite: Audition		
This is the top performing ensemble at DHS/MVHS. The Wind Ensemble will perform advanced literature. Students in the Wind Ensemble are highly encouraged to participate in the All-District and All-State audition process and are required to perform in a chamber group in the Spring for Solo and Ensemble Festival. A majority of Wind Ensemble students take or have taken private lessons on their instruments and many will perform a solo at Solo and Ensemble Festival. The Wind Ensemble performs on all major band concerts and performs at the KSHSAA State Large Group festival in the Spring.		

Concert Band	(Spring Only)	Grades 9-12
MUG23		Credit: .5
Prerequisite: Audition or Instructor Approval		
This is the third performing ensemble at DHS. The Concert Band will perform intermediate literature. Students in the Concert Band are encouraged to participate in the Solo and Ensemble process in the Spring. The Concert Band performs on all major band concerts and may perform at an adjudicated festival in the Spring.		

Percussion Ensemble	(DHS Only)	Grades 9-12
MUG26		Credit: .5
In this class students will explore the world of percussion. Students will receive both individual and group instruction on all percussion instruments. The percussion ensemble will perform with the high school band on several concerts throughout the semester. This course is co-curricular, meaning that in addition to the regular classroom activities, students will be required to perform outside of the school day. Students need not have any prior experience playing a percussion instrument to enroll in this course.		

Music Composition	Grades 10-12
MUG41	Credit: .5
Prerequisite: Music Theory or AP Music Theory	
This class is designed to give students an opportunity to create original music compositions. Students will study numerous compositional techniques from the common practice period and 20th century music. Using these techniques, they will be guided through specific assignments allowing for individual growth in each area	

Applied Instrumental Music	Grades 9-12
MUG43	Credit: .5
Prerequisite: Instructor Permission	
The intent of this course is to allow students to prepare music that is specific for their instruments. Students will explore solos, etudes and technical exercises written specifically for their instrument. his class will also serve the student wishing to learn how to play a new instrument.	

Music Theory	Grades 10-12
MUG44	Credit: .5
The intent of this course is to teach students the basic knowledge of the fundamentals of music theory. Students will be expected to learn notation; rhythm and meter, scales; intervals and keys, chords; form, and composition. Activities include developing aural skills, music analysis, historical practices, rhythmic and melodic dictation, and sight singing.	

AP Music Theory	Grades 11-12
MUP45A/B	Credit: 1
Prerequisite: Recommend Music Theory	
This rigorous course is intended to prepare students for the AP Music Theory exam. AP Music Theory is designed for the advanced music student seeking mastery of music outside the normal performance medium. This full-year course is equivalent to a college-level music theory class. The course is designed to develop a student's ability to recognize, understand and describe the basic materials and processes of music that are heard or presented in a score. Students will develop oral, sight singing, written, compositional and analytical skills in this course.	

History of Rock & Roll	Grades 9-12
MUG45	Credit: .5
A survey of the history of Rock and Roll in 20th century America, including social issues, composers, performers and listening.	

Piano for Beginners	Grades 9-12
MUG46	Credit: .5
This course is designed for beginner piano players or those seeking music literacy skills. It is comprehensive and will cover theory, technique, guided practice and performance aspects of playing the keyboard.	

Piano II	Grades 9-12
MUG47	Credit: .5
Piano II is an independent study style course for any student with piano skills beyond a beginner level. In order to enroll in Piano II, prospective students must complete the Beginner Piano course or complete an application to audition with your school piano instructor to ensure intermediate/advanced piano and theory skills.	

World Language

Course Title	Credit	Weight	KS Regents	College Credit	NCAA	9	10	11	12	Prerequisite
French I	1		X		X	X	X	X	X	None
French II	1		X		X		X	X	X	French I
French III	1	FW	X	X	X			X	X	French II
French IV	1	FW	X	X	X				X	French III
French V	1	FW	X	X	X				X	French IV
Spanish I	1		X		X	X	X	X	X	None
Spanish II	1		X		X	X	X	X	X	Spanish I
Spanish III	1		X		X		X	X	X	Spanish II
Spanish IV	1	FW	X	X	X			X	X	Spanish III
AP Spanish Language & Culture	1	FW	X	X	X			X	X	Spanish IV
AP Spanish Literature & Culture	1	FW	X	X	X				X	AP Spanish Lang & Culture
Heritage Spanish	1		X		X	X	X	X	X	Fluent Spanish Speaker

French I

Grades 9-12

WLG21A/B

Credit: 1

This course covers the basics in conversational French vocabulary, grammar, geography, and understanding of other cultures. Students will study verbs in the present and near future tenses, elementary grammar concepts, and idiomatic constructions. There will be an emphasis on all four skills of learning a foreign language: listening, speaking, reading and writing, as well as a cultural awareness.

French II

Grades 10-12

MUG46

Credit: 1

Prerequisite: French I

This course reviews basic grammar and vocabulary from French I and continues to an intermediate level of study of grammar, geography, and cultural awareness. Conversational skills will still be at a novice level. Students will study verbs in the present, past, and future tenses and idiomatic constructions. All four skills of learning a foreign language; listening, speaking, reading, and writing will be stressed.

French III

Grades 11-12

WLG23A/B

Credit: 1

Prerequisite: French II

This course reviews the basics in conversational French, vocabulary, and grammar. Students will study verbs in the present, past, future, and various compound tenses, as well as more advanced grammar and idiomatic constructions. French history, geography, and culture are studied in the target language. All four skills of listening, speaking, reading, and writing are emphasized. Students should be able to communicate at an intermediate level.

French IV

Grade 12

WLG24A/B

Credit: 1

Prerequisite: French III

This course reviews the basics in conversational French, vocabulary, and grammar. Students will study verbs in the present, past, future, and various compound tenses, as well as more advanced grammar and idiomatic constructions. French history, geography, and culture are studied in the target language. All four skills of listening, speaking, reading, and writing are emphasized. Students should be able to communicate at an intermediate level.

French V

MVHS Only

Grade 12

WLG25A/B

Credit: 1

Prerequisite: French IV

In this course, students begin a more in-depth study of French grammar and vocabulary as they improve their mastery of the four communicative skills (listening, speaking, reading and writing). Reading assignments (from literary, journalistic, and internet sources) will be more advanced and writing assignments will be more extensive at the Intermediate level. May be taken for College Now credit through Johnson County Community College.

Spanish I

Grades 9-12

WLG10A/B

Credit: 1

This course covers the basics in conversational Spanish vocabulary, grammar, geography, and understanding of other cultures. Students will study verbs in the present and near future tenses, elementary grammar concepts, and idiomatic constructions. There will be an emphasis on all four skills of learning a foreign language: listening, speaking, reading and writing, as well as a cultural awareness.

Spanish II	Grades 9-12
WLG12A/B	Credit: 1
Prerequisite: Spanish I	
This class reviews the basic vocabulary and grammar from Spanish I. The four language skills and cultural awareness will continue to be emphasized to an advanced novice level. Students will study verbs in the present, past and near future tenses. More advanced grammar and idiomatic constructions will be introduced as well as a greater volume of vocabulary.	

Spanish IV	Grades 11-12
WLG14A/B	Credit: 1
Prerequisite: Spanish III	
Students will interact at the high intermediate level in the skills of listening, reading, writing and at the low to middle intermediate level in speaking. A review of all verb tenses will be included in addition to reading short stories and poetry. Students will also continue active participation in the language while continuing to learn about the target culture.	

AP Spanish Language & Culture	Grade 11-12
WLP16A/B	Credit: 1
Prerequisite: Spanish IV	
Promotes students' proficiency in the interpersonal, interpretive, and presentational modes of communication in Spanish. This course is designed to provide students with various opportunities to further improve proficiency in listening, speaking, reading, and writing skills to be ready for the AP Spanish Language and Culture Examination. This course provides another avenue to earn college credit by completing the equivalent of Spanish V coursework and demonstrating proficiency on the AP exam.	

Spanish III	Grade 10-12
WLG13A/B	Credit: 1
Prerequisite: Spanish II	
This class begins where Spanish II ends. A variety of activities incorporate several new verb tenses with new units of vocabulary. In addition, short readings enhance reading comprehension as well as cultural awareness. Students should exhibit an acceptable degree of proficiency at the beginning intermediate level in the four basic skills of listening, speaking, reading, and writing in the target language.	

AP Spanish Literature & Culture	Grade 12
WLP17A/B	Credit: 1
Prerequisite: AP Spanish Language & Culture	
AP Spanish Literature is equivalent to a college level introductory survey course of literature written in Spanish. Students continue to develop their interpretive, interpersonal, and presentational skills in Spanish language as well as critical reading and analytical writing as they explore short stories, novels, plays, essays, and poetry from Spain, Latin America, and U.S. Hispanic authors along with other non-required texts.	

Heritage Spanish	Grades: 9-12
WLG16A/B	Credit: 1
Prerequisite: Fluent Spanish Speaker	
Spanish for Heritage Speakers offers Spanish-speaking students the opportunity to study the language formally in an academic setting in the same way that native-English-speaking study English Language Arts. A heritage speaker would take this course to build upon formal Spanish academic, grammar, and usage skills they had learned previously, and learn more about the language and its ties to cultural heritage. This course is designed specifically for students who are already able to comprehend spoken Spanish at an intermediate level or higher, and for those who have some oral language proficiency.	

Miscellaneous Courses

Course Title	Credit	9	10	11	12	Prerequisite
ACT Test and College Preparation	0.5		X	X		None
Peers in Learning	.5 or 1.0			X	X	Application
Teacher's Aide	0.25				X	Teacher Approval/Application
AP Seminar (DHS)	1			X	X	None
AP Research (DHS)	1			X	X	AP Seminar
Student Technology Internship	1		X	X	X	Application
Internship	.5 or 1			X	X	Application
AVID 9 (DHS)	1	X				Application
AVID 10 (DHS)	1		X			Application
AVID 11 (DHS)	1			X		Application
AVID 12 (DHS)	1				X	Application
Individual & Collaborative Studies (DHS)	0	X	X	X	X	Application/Referral
Financial Literacy	0.5		X	X	X	None
Essentials of Fashion, Apparel, and Interior Design	0.5	X	X	X	X	None

ACT Test and College Preparation Grades 10-11

MSG92 Fee: \$20 Per Semester Credit: .5
The ACT Test and College Prep course is an elective designed to help students, bound for a 4-year college, understand the ACT testing process, utilize testing strategies, and improve study skills necessary for success in college. The goal is to increase student levels of preparedness for being successful on the ACT test and provide an opportunity for students to utilize study skills needed for college coursework. Curriculum will be reviewed in Math, Science, English, and Reading, specific to the content covered on the test. Practice ACT tests will be required with some tests administered outside of class so that the ACT mandated testing conditions can be simulated. Students are encouraged to complete this course the semester prior to taking the actual ACT test.

Teacher's Aide Grade 12

MSG20 Credit: .25
Prerequisite: Application
Seniors wishing to be a Teacher's Aide must complete an application and submit it to the Counseling Department. In order to be eligible, students must have and maintain a 3.0 GPA, be on target for graduation, have good attendance (fewer than 10 absences by the deadline date), and be in good standing with the school. Selected students will be assigned to a department.

AP Research (DHS ONLY) Grades: 11-12

MSP11A/B Credit: .1
AP Research, the second course in the AP Capstone experience, allows students to deeply explore an academic topic, problem, issue, or idea of individual interest. Students design, plan, and implement a year-long investigation to address a research question. Through this inquiry, they further skills they acquired in the AP Seminar course by learning research methodology, employing ethical research practices, and accessing, analyzing, and synthesizing information. Students reflect on their skill development, document their processes and curate the artifacts of their scholarly work through a process and reflection portfolio. The course culminates in an academic paper of 4,000 to 5,000 words (accompanied by a performance, exhibit, or product where applicable) and a presentation with an oral defense.

Peers in Learning Grades 11-12

MSG60 (fall) MSG61 (spring) Credit: .5
Prerequisite: Application
Students in this course will work with same age students with disabilities in a classroom setting. This will benefit students who are seeking a career in the education and/or health fields.

AP Seminar (DHS ONLY) Grades: 11-12

MSP10A/B Credit: .1
AP Seminar is a foundational course that engages students in cross-curricular conversations that explore the complexities of academic and real-world topics and issues by analyzing divergent perspectives. Students learn to investigate a problem or issue, analyze arguments, compare different perspectives, synthesize information from multiple sources, and work alone and in a group to communicate their ideas. This is the first of two classes needed for students to qualify for an AP Capstone diploma. According to the College Board, some benefits of participating in the AP Capstone program are that students earn college credit, "become self-confident, independent thinkers and problem-solvers," and, "stand out to colleges in the application process."

Student Technology Internship Grades: 10-12

CTG97A/B Credit: .1
Students with technology or programming experience are encouraged to apply to this year-long K12itc internship. Students will assist with trouble shooting basic technology helpdesk issues alongside a K12itc representative. Students will be expected to take on leadership roles, assist students and faculty, and assist with MacBook user knowledge. After showing leadership skills, some students will be asked to apply to the Cerner Scholars Program during second semester.

Internship Grades: 11-12

WSA00 Credit: .5 or 1
This workplace experience course is a career elective course that must correspond with the student's Individual Plan of Study. Students will report to a Work-Based Learning Coordinator at the high school and follow all of the guidelines in the Internship Handbook for reporting to the business/industry. This course can be one or two semesters depending on the length of the internship. Students will seek out this internship and will participate in a minimum of 60 hours of work-related experiences per semester.

AVID 9	DHS ONLY	Grade 9
MSG00A/B		Credit: 1
AVID (Advancement Via Individual Determination) is an elective course that prepares students for entrance into four-year colleges. There is an emphasis on analytical writing, preparation for college entrance and placement exams, study skills, test taking, note-taking and research. Application process is utilized for selection of students.		

AVID 11	DHS ONLY	Grade 11
MSG02A/B		Credit: 1
AVID (Advancement Via Individual Determination) is an elective course that prepares students for entrance into four-year colleges. There is an emphasis on analytical writing, preparation for college entrance and placement exams, study skills, test taking, note-taking and research. Application process is utilized for selection of students.		

Individual and Collaborative Studies	DHS ONLY	Grades 9-12
MSG95A/B		Credit:0
Independent and Collaborative Studies is intended to provide opportunities and support for students to thrive in the courses they are enrolled in. Enrollment in the course is contingent upon application and/or referral for placement.		

Essentials of Fashion, Apparel, and Interior Design		Grades 9-12
MSG96	Fee: \$10	Credit:.5
Course Description: This course introduces students to the world of interior and fashion design, familiarizing them to the background and knowledge needed to develop a career in this field. Students will learn and apply how color, composition, and texture can affect great aesthetics.		

AVID 10	DHS ONLY	Grade 10
MSG01A/B		Credit: 1
AVID (Advancement Via Individual Determination) is an elective course that prepares students for entrance into four-year colleges. There is an emphasis on analytical writing, preparation for college entrance and placement exams, study skills, test taking, note-taking and research. Application process is utilized for selection of students.		

AVID 12	DHS ONLY	Grade 12
MSG03A/B		Credit: 1
AVID (Advancement Via Individual Determination) is an elective course that prepares students for entrance into four-year colleges. There is an emphasis on analytical writing, preparation for college entrance and placement exams, study skills, test taking, note-taking and research. Application process is utilized for selection of students.		

Financial Literacy		Grades 10-12
MSG97		Credit: .5
<u><i>This course is replacing Consumer Education and Personal Finance and will be required for graduation starting with the class of 2028.</i></u>		

Financial literacy provides students with an understanding of the concepts, principles and skills involved in making and applying sound financial decisions. This course emphasizes earning income, spending, saving, investing, managing credit, and managing risk.



The following pages outline the Career and Technical Education (CTE) courses offered in USD 232 or through our local college partnerships.

The chart below displays the CTE Pathway options available to our students.

Questions about the Career & Technical Education Programs? Please contact Dr. Cindy Swartz at cswartz@usd232.org

USD 232 Career & Technical Education (CTE) Pathways & Career Ready College Partnerships

CTE Pathways	USD 232	Eudora EDTEC	KCKCC TEC	JCCC
Auto Collision Repair I & II			X	
Auto Technology I & II			X	X
Automation Engineer Technology I & II				X
Biochemistry	X			
Biomedical	X			
Business Finance	X			
Comprehensive Agriculture Science		X		
Construction & Architectural Design	X			
Construction Management I & II				X
Construction Technology I & II			X	
Cybersecurity I & II				X
Digital Media	X			
Electronics Technology I & II (digital, analog, lab systems, etc.)				X
Electrical Technology I & II (lighting, appliances, security, etc.)			X	X
Engineering & Applied Mathematics	X			
Family, Community, & Consumer Services	X			
Fashion Merchandising				X
Graphic Design	X			
Health Science / Certified Nursing Assistant (CNA)		X	X	X
Health/Fire Science / Emergency Medical Responder (EMR)				X
HVAC I & II			X	X
Machine Technology I & II			X	
Manufacturing	X			
Marketing	X			
Multimedia/Video Production I & II			X	
Mobile Equipment Maintenance		X		
Plumbing Technology I & II				X
Programming & Software Development	X			
Restaurant & Event Management / Culinary I & II		X	X	X
Teaching/Training	X			
Web & Digital Communications	X			
Welding I & II			X	X

<div> <div>Bioscience Pathway</div> <div>Career Opportunities Part I & Career Opportunities Part II</div> </div>												
Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Chemistry	SCG20A/B	1			X	X	X	\$10	Biology and concurrent enrollment in Math II		X	X
Anatomy & Physiology	SCG40A	1				X	X	\$10	Biology Chemistry		X	X
AP Environmental Science	SCP50	1	FW			X	X	\$10	Biology		X	X
Medical Interventions	CTC77A/B	1				X	X	\$10	Biology and Chemistry or concurrent enrollment	X		
AP Biology	SCP10A/B	1	FW	College Credit (MVHS)		X	X	\$10	Biology & Chemistry		X	X
*Environmental Resources and Wildlife Science	SCG14A/B	1		Client Project		X	X	\$10	Chemistry		X	X
*Biotechnical Engineering	CTC71A/B	1		IRC = BCSI		X	X	\$10	Chemistry	X		
*Biomedical Innovation	CTC74A/B	1				X	X	\$10	Medical Interventions	X		
*Biochemistry Workplace Experience	CTG75A/B	1		Internship		X	X		Application	X	X	X
*Biomedical Research Workplace Experience	CTC76A/B	1		Internship		X	X		Application	X		
*Application Level CTE Courses; IRC = Industry Recognized Credential (Certification); Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Chemistry (1 credit)

The class is designed to provide students with a solid foundation in chemical knowledge and principles needed for success in college chemistry. Topics covered include atomic structure, periodic properties of elements, chemical bonding, molecular structure, chemical equations, stoichiometry, gas laws, and acid/base chemistry.

AP Environmental Science (1 credit)

Equivalent to a one semester, introductory college course in environmental science, through which students engage with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world. Environmental Science is interdisciplinary, embracing topics from geology, biology, environmental studies, environmental science, chemistry, and geography.

AP Biology (1 credit)

This rigorous course is intended to prepare students for the AP Biology exam. This course will provide students with the conceptual framework, factual knowledge, and analytical skills necessary to deal critically with the rapidly changing science of Biology. The goals of the course are to help students develop a conceptual framework for modern Biology and gain an appreciation of science as a process through lab experiences.

Environmental Resources & Wildlife Science (1 credit)

This is an advanced level course that builds on Environmental Science and other life science classes. This course will provide strong emphasis on field and classroom research, laboratory investigations, and real-life application in the field of environmental science through partnerships with outside businesses. Students will gain a solid foundation for pursuit of a potential career in a field related to environmental science. Potential topics include sustainability, conservation, ecology, soils, water resources, fisheries, plants, forestry, wildlife, air quality, waste, energy, and environmental careers.

Biomedical Research / Biochem Workplace Experience (1 credit)

Advanced level application course that incorporates experienced based learning. Students will seek out an internship within their career area of interest/study.

Anatomy & Physiology (1 credit)

This course involves a study into the structure and function of the human body. Eleven body systems will be investigated through a problem-based learning approach. Major emphasis will be placed on learning how these systems work. Students planning to go into a medical field should take this course.

Medical Interventions (1 credit)

Medical Interventions allows students to investigate the variety of interventions involved in the prevention, diagnosis, and treatment of disease. This course will explore how to prevent and fight infection, how to screen and evaluate the code in our DNA, how to prevent, diagnose, and treat cancer, and how to prevail when the organs of the body begin to fail. Through these scenarios, students will be exposed to the wide range of interventions related to immunology, surgery, genetics, pharmacology, medical devices, and diagnostics. Students practice problem solving with structured activities and progress to open-ended projects and problems that require them to develop planning, documentation, communication, and other professional skills. Students should take this course prior to taking Biomedical Innovation.

Biotechnical Engineering (1 credit)

Biotechnical Engineering enables students to develop and expand their knowledge and skills in biology, physics, technology, and mathematics. Course content draws upon diverse fields such as biomedical engineering, bimolecular genetics, bioprocess engineering, or environmental engineering. Students may engage in project-based learning and problems related to biomechanics, cardiovascular engineering, genetic engineering, tissue engineering, biomedical devices, human interfaces, bioprocesses, forensics, and bioethics. Students will earn a Bioscience Core Skills Institute (BCSI) Credential upon completion of this course.

Biomedical Innovation (1 credit)

In this research course, students will apply their knowledge and skills to answer questions or solve problems related to the biosciences. Students design innovative solutions for the health challenges of the 21st century (such as the cure for Cancer, etc.) by addressing topics such as clinical medicine, biochemistry, physiology, biomedical engineering, and/or public health. They may have the opportunity to work on an independent project and may work with a mentor or advisor from industry.

Business Finance Pathway Career Opportunities												
Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Business Essentials	CTG20	0.5		X	X				None		X	X
Accounting	CTG23A/B	1			X	X	X		Business Essentials		X	X
Business Communications	CTG32	0.5				X	X		Business Essentials			X
Entrepreneurship	CTG22	0.5	Entrepreneurship			X	X		Business Essentials			X
*Investing	CTG25	0.5			X	X	X		Business Essentials			X
*Advanced Accounting	CTG26A/B	1	Client Project			X	X		Accounting		X	X
*Finance Workplace Experience	CTG33A/B	1	Internship			X	X		Application + 2 Courses within Pathway		X	X
*Application Level CTE Courses; IRC = Industry Recognized Credential (Certification); Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Business Essentials (.5 credit)

Business Essentials is a core course for freshmen and sophomores designed to peak student interest in the fields of Business Management, Marketing, and Finance. Units covered include Management, Finance, Economics/Marketing, Accounting and Corporate Ethics. Upon completion of this course students will have the background knowledge necessary to succeed in a Management, Finance or Marketing Pathway specific course.

Business Communications (.5 credit)

Business Communications will help students to develop an understanding of and appreciation for effective communication in business situations and environments. Emphasis is placed on all phases of communication: speaking, listening, thinking, responding, reading, writing, non-verbal communication, and utilizing technology for communication. Business communication functions, processes, and applications in the context of business may be practiced through problem-based projects and real-world applications.

Entrepreneurship (.5 credit)

Start your own business!

Entrepreneurship is a course which acquaints students with the knowledge and skills necessary to own and operate their own business. Topics from several fields form the content including economics, marketing, business and labor law and business planning.

Accounting (1 credit)

This course will provide the introduction of fundamental accounting principles and procedures used in business. Students will understand the principles of debits and credits, journalizing transactions, posting to ledgers, and determining profit or loss. Students will also learn to create formal financial statements to be used for the reporting of net income or net loss.

Investing (.5 credit)

Investing emphasizes the formulation of business and individual investment decisions by comparing and contrasting the investment qualities of cash, stock, bonds, and mutual funds. Students will review annual reports, predict growth rates, and analyze trends, money market accounts, loans, investments, and negotiable instruments.

Advanced Accounting (1 credit)

This course will build upon accounting concepts previously learned during the first- year course while expanding on new topics such as accounting for a merchandising business organized as a corporation and additional accounting procedures. Strong emphasis is placed on using technology with accounting concepts.

Finance Workplace Experience (1 credit)

This course can be one or two semesters depending on the length of the internship. Students will seek out this internship, which connects to their career interest and individual plan of study.

Construction & Design Pathway [Career Opportunities Part I](#) & [Career Opportunities Part II](#)

Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Residential Carpentry I	CTG11A/B	1	IRC = OSHA 10	X	X	X	X	\$40			X	X
Woodworking	CTG13A/B	1			X	X	X	\$40			X	X
Drafting/CAD	CTG10A/B	1		X	X	X	X	\$20			X	X
Architectural Design	CTG15A/B	1			X	X	X	\$20	Drafting/CAD		X	X
*Residential Carpentry II	CTG12A/B	1	IRC = SP2		X	X	X	\$40	Residential Carpentry I		X	X
*Interior Architectural Design	CTG14	.5				X	X	\$10	Architectural Design		X	X
*Research & Design in Building Trades	CTG16A/B	1				X	X	\$20	Residential Carpentry I + Application			X
*Research & Design for Pre-Construction	CTG17A/B	1	Client Project				X	\$20	Interior Design or concurrent enrollment		X	X
*Construction & Design Workplace Experience	CTG18A/B	1	Internship			X	X		Application + 2 Courses within Pathway		X	X
*Application Level CTE Courses; IRC = Industry Recognized Credential (Certification); Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Residential Carpentry I (1 credit)

This hands-on course instructs students in the knowledge and skills to repair common household problems and plan and complete home improvement projects. Students will have the opportunity to earn OSHA 10 certification.

Drafting/CAD (1 credit)

This course is designed to build basic mechanical and computer drafting skills. Students will learn basic conventions of drafting including sketching, plate layout, measuring, scaling, orthographic drawings, dimensioning, isometric drawings, 3-D modeling, and sectional drawings. The course includes an introduction to principles of architecture.

Residential Carpentry II (1 credit)

This hands-on course will instruct students in knowledge and skills in rough construction and finish work. Students will work in teams to complete a finished construction product. Students will have the opportunity to earn an SP2 safety certification.

Research & Design for Building Trades (1 credit)

This course will focus on design and construction principles which include management and Green Building skills. Students will design and draw house plans as well as assemble a model of their home design. Students will also have the opportunity to work on independent projects, or projects requested by the instructor or the district.

Construction & Design Workplace Experience (1 credit)

This course can be one or two semesters depending on the length of the internship. Students will seek out this internship, which connects to their individual plan of study.

Woodworking (1 credit)

Woodworking courses introduce students to the various kinds of woods used in industry and offer experience in using selected woodworking tools. Students construct multiple projects and prepare a bill of materials. Correct and safe use of tools and equipment is emphasized. As students advance, they focus on learning the terminology necessary to use power tools successfully, developing skills to safely use these tools in the workshop and becoming familiar with various kinds of wood-finishing materials.

Architectural Design (1 credit)

This course focuses on the elements of architecture including historical styles of architecture, calculating/estimating building costs, producing building plans, drawing elevations, researching plots, etc. Some drawings are completed in CAD. This class culminates in a small-scale model of a residential building design.

Interior Architectural Design (.5 credit)

This class is an advanced course in the Architecture pathway. It will instruct students in skills necessary to design interior spaces that apply design elements and principles for residential, special needs, commercial, and industrial uses. Topics include client's needs, legislated codes, historic considerations, trends, and public policy.

Research & Design for Pre-Construction (1 credit)

This course will focus on advanced design and architecture principles which include working with clients, estimating and budgeting for construction, creating and managing sheet sets, new techniques and materials, and advanced 3D modeling. Students will design and model a home for a client, completing all stages in the design process and leave the course with a full home design for their portfolio.

Digital Media Pathway Career Opportunities												
Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
21st Century Journalism	CTG03	.5		X	X	X					X	X
Audio/Video Production Fundamentals	CTG85	.5		X	X	X	X	\$20			X	X
Photo Imaging	CTG00	.5		X	X	X	X	\$20			X	X
*Video Production I	CTG05A/B	1	Client Projects		X	X	X	\$20	AV Production Fundamentals + Application		X	X
*Video Production II	CTG06A/B	1	Client Projects			X	X	\$20	Video Production I + Application		X	X
*Video Production III	CTG07A/B	1	Client Projects				X	\$20	Video Production II + Application			X
*Digital Media Design & Production I: Broadcast I	CTG86A/B	1	Client Projects		X	X	X	\$20	AV Production Fundamentals + Application		X	X
*Digital Media Design & Production II: Broadcast II	CTG87A/B	1	Client Projects			X	X	\$20	Broadcast I + Application			X
*Digital Media Design & Production III: Broadcast III	CTG08A/B	1	Client Projects				X	\$20	Broadcast II + Application			X
*Digital Media Design & Production I: Yearbook I	CTG81A/B	1	Client Projects		X	X	X		21st Century Journalism/Photo Imaging + Application		X	X
*Digital Media Design & Production II: Yearbook II	CTG82A/B	1	Client Projects			X	X		Yearbook I		X	X
*Digital Media Design & Production III: Yearbook III	CTG88A/B	1	Client Projects				X		Yearbook II		X	X
*Digital Media Design & Production I: Newspaper I	CTG83A/B	1	Client Projects		X	X	X		21st Century Journalism/Photo Imaging + Application		X	X
*Digital Media Design & Production II: Newspaper II	CTG84A/B	1	Client Projects			X	X		Newspaper I		X	X
*Digital Media Design & Production III: Newspaper III	CTG89A/B	1	Client Projects				X		Newspaper II		X	X
*Digital Media Project Management	CTG57A/B	1	Internship			X	X	\$20	Application		X	X
*Application Level CTE Courses; IRC = Industry Recognized Credential (Certification); Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

21st Century Journalism (.5 credit)

Students will become better communicators in this class, which emphasizes writing, critical thinking, and technology skills. We will explore the role media and the communications industry has in society as well as the ethical and legal issues related to the field. Students will develop technical skills related to journalistic writing, editing, and interviewing. This course is a prerequisite for a position on the yearbook or newspaper staff.

Photo Imaging (.5 credit)

Students will learn about the equipment, software, and hardware necessary to master the basics in digital photography. Students will demonstrate understanding and use of camera techniques as well as photo manipulation and graphic design software. This is a project-based course. This course is a prerequisite for a position on the yearbook or newspaper staff.

Audio/Video Production Fundamentals (.5 credit)

A/V Production Fundamentals provides a basic understanding of producing video for a variety of uses. Core of study will focus on communication skills, public speaking and creating videos using Adobe Premiere Pro. Other topics include analyzing the pre-production, production, and post-production process, as well as exploring the equipment and techniques used to develop a quality video production. This course is a prerequisite for a position on the Broadcast/Video Production staff.

Video Production I (1 credit)

Video Production applies the technical skills learned in Audio Video Production Fundamentals by allowing students to orchestrate projects from setting the objectives to the post-production evaluation. The complexity of the presentation is not the focus of the course, but the experience of the entire process, including planning the presentation, setting up the studio, and acting as videographer and editor. Students must be highly motivated to complete projects outside of class time.

Video Production II (1 credit)

Video Production II applies experiences gained in Video Production I by allowing students to focus on production teams and orchestrate projects from setting the objectives to the post-production evaluation. Students will produce various videos including independent films, PSA's and commercials as well as any video requested by staff, administration and/or district. Students must be highly motivated to complete projects outside of class time.

Video Production III (1 credit)

Video Production III applies experiences gained in Video Production II by allowing students to focus on more leadership roles in class, such as working with training Video Production I & II students. They will also help with pre-, during-, and post-production of a variety of videos, training new students, and completing projects requested by staff, administration, district, and community members. Students must be highly motivated and willing to train new staff.

Digital Media Design & Production I: Broadcast I (1 credit)

Digital Media Design and Production I will provide students with the opportunity to apply the fundamental techniques learned in Audio/Video Production Fundamentals course through the production of multi-media broadcast projects for public presentation. Other topics include developing a production schedule, working as a team, utilizing composition principles and embedding audio, video or other content in digital formats.

Digital Media Design & Production II: Broadcast II (1 credit)

Digital Media Design and Production II (Broadcast II) will apply the experiences gained in Digital Media Design and Production I (Broadcast). Students will complete several major media production projects and act in leadership positions on the MVTV news team. Students must be highly motivated to complete projects outside of class time.

Digital Media Design & Production III: Broadcast III (1 credit)

Students will take on leadership roles, including producers, assistant producers, managers, etc. They will be responsible for pre-, during-, and post-production of the weekly show, managing social mediums, training staff, determining due dates, staff management, conflict/resolution, etc. Students will commit to before/during/after school hours to complete the goals of the class and assist other staff members, the school, district, and other community members.

Digital Media Design & Production I: Newspaper I (1 credit)

Students will study and apply the elements of reporting, interviewing, editing, advertising, layout, photography, and computerized desktop publishing. The class members will work cooperatively with the school district and the community to produce both the printed and online version of the student newspaper. Students must be willing to expand their knowledge level, to regularly contribute written articles, to make appropriate journalistic and artistic choices. Students will be expected to attend after school and evening work sessions and sell advertisements to businesses to help finance the publication.

Digital Media Design & Production II: Newspaper II (1 credit)

This advanced section of newspaper production is designed to provide students more experience in using technology to create a professional looking print and online student newspaper. Students will take on leadership roles on the staff, including editor in chief, photo editor, copy editor or section editor. They will be responsible for staff management, page and magazine redesign, and other administrative duties on the staff. They will also lead the staff by teaching conflict resolution, motivating new staff members to succeed and encouraging all staff to work together towards a common goal. Students will be expected to attend after school and evening work sessions and to sell advertisements to businesses to help finance the publication.

Digital Media Design & Production III: Newspaper III (1 credit)

Students will take on leadership roles on the staff, including editor in chief, photo editor, copy editor or section editor. They will be responsible for staff management, page and magazine re design, and other administrative duties on the staff. They will also lead the staff by teaching conflict resolution, motivating new staff members to succeed and encouraging all staff to work together towards a common goal. Students will be expected to attend after school and evening work sessions and to sell advertisements to businesses to help finance the publication.

Digital Media Design & Production I: Yearbook I (1 credit)

Students will study and apply the principles of magazine journalism including theme development, reporting, photography, and layout in the production of the yearbook. Students will be challenged to expand their knowledge level, to become skilled in the use of computerized desktop publishing, to make appropriate journalistic and artistic choices. Students will be expected to work on the publication after school and evenings and to sell advertisements to businesses to help finance the publication.

Digital Media Design & Production II: Yearbook II (1 credit)

This advanced section of yearbook production is designed to give students even more experience in using technology to create professional looking publications. Students will take on leadership roles on the staff, including editor in chief, photo editor, copy editor or section editor. They will be responsible for staff management, theme development and other administrative duties on the staff. Students will be expected to attend after school and evening work sessions and to sell advertisements to businesses to help finance the publication.

Digital Media Design & Production III: Yearbook III (1 credit)

Students will take on leadership roles on the staff, including editor in chief, photo editor, copy editor or section editor. They will be responsible for staff management, theme development, and other administrative duties on the staff. Students will be expected to attend after school and evening work sessions and to sell advertisements to businesses to help finance the publication.

Digital Media Project Management (1 credit)

Students who enroll in Independent Study for Broadcast, Yearbook or Newspaper would be the students who would enroll in this USD 232 internship course. Project Management will give students more formal competencies to meet as they complete their responsibilities as leaders in broadcast/video or print journalism.

Engineering and Applied Mathematics Pathway [Career Opportunities](#)

Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Engineering Design (ED)	CTG60A/B	1			X	X	X	X	\$20			X	X
Principles of Applied Engineering (POAE)	CTG61A/B	1	FW			X	X	X	\$20	Engineering Design		X	X
Robotics I	CTG66A/B	1					X	X	\$20		X		
Digital Electronics (DE)	CTG62A/B	1	FW				X	X	\$20	Engineering Design & Principles of App. Engineering	X		
Computer Integrated Manufacturing (CIM)	CTG63A/B	1	FW				X	X	\$20	Engineering Design & Principles of App. Engineering	X		
Robotics Capstone	CTC97A/B	1		Client Project			X	X	\$20	Robotics I or Instructor Approval; No concurrent enrollment	X		
*Engineering Design & Development (EDD)	CTG64A/B	1		Client Project/ Entrepreneurship				X	\$20	Engineering Design, POAE, CIM/DE or concurrent enrollment	X		
*Engineering Workplace Experience	CTG65A/B	1		Internship			X	X		Application + 2 Courses within Pathway	X		

*Application Level CTE Courses; IRC = Industry Recognized Credential (Certification); Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

Engineering Design (1 credit)

This course introduces students to the engineering design process. Working in teams they learn how to use sketching to communicate their ideas as well as the geometry that is used in parametric modeling, assembly, and motion constraints. Students will explore the production and marketing of products.

Computer Integrated Manufacturing (1 credit)

Computer Integrated Manufacturing involves the study of robotics and automation. Building on computer solid modeling skills, students may use computer numerical control (CNC) equipment to produce actual models of their three-dimensional designs. Course topics may also include fundamental concepts of robotics, automated manufacturing, and design analysis.

Engineering Design & Development (1 credit)

Engineering Design and Development (EDD) is the capstone course in the PLTW high school engineering program. It is an engineering research course in which students work in teams to design and develop an original solution to a valid open-ended technical problem by applying the engineering design process.

Engineering Workplace Experience (1 credit)

This course can be one or two semesters depending on the length of the internship. Students will seek out this internship, which should connect to their individual plan of study.

Principles of Applied Engineering (1 credit)

This course explores the wide variety of careers in engineering and technology and looks at various technology systems and manufacturing processes, including robotics. Using activities, projects and problems, students learn first-hand how engineers and technicians use math, science and technology in an engineering problem solving process to benefit people.

Digital Electronics (1 credit)

A rigorous course that uses computer simulations to learn about the logic of electronics as they design, test, and construct circuits and devices. Students design circuits to solve open-ended problems, assemble their solutions, and troubleshoot them as necessary. Students will use mathematic theorems to perform Boolean algebraic functions to design complex logic circuits.

Robotics I (1 credit)

Students will be introduced to the main types of robotics, plus, students will build, assemble, and troubleshoot robotic devices/systems while constructing and verifying circuits. This is a project-based course in which students will work on collaborative projects.

Robotics Capstone (1 credit)

This course is designed to be taken after Robotics I offered at CTEC. Students will build on the knowledge gained during the first year of Robotics by working with a team of their peers to compete in several area robotics competitions.

Family, Community & Consumer Services Pathway Career Opportunities Part I & Part II & Part III												
Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Career and Life Planning	CTG35	.5	Job Shadowing	X	X	X	X				X	X
Human Growth and Development: The Early Years	CTG36	.5		X	X	X	X				X	X
Family Studies	CTG37	.5		X	X	X	X				X	X
Nutrition and Wellness	CTG39	.5		X	X	X	X	\$20			X	X
Culinary Essentials I	CTG41	.5	IRC = ServSafe		X	X	X	\$20	Nutrition and Wellness + Application		X	X
Culinary Essentials II	CTG94	.5	Client Project		X	X	X	\$20	Culinary Essentials I		X	X
Leadership & Service in Action	CTG40	.5				X	X		Career and Life Planning and Application		X	X
*Community Connections	CTG53	.5	Shadowing/Internship			X	X		Career and Life Planning and Application		X	X
*Career Connections	CTG03	.5	Internship			X	X		Career and Life Planning and Application		X	X
*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Career & Life Planning (.5 credit)

Students will explore skills and strategies helpful in being more focused and productive individuals. This course emphasizes goal setting, career path decision, educational opportunities, employability skills, stress, and time management. Students will participate in mock interviews, educational planning, and job shadow experiences. Students will need to provide transportation to their desired job shadow.

Nutrition & Wellness (.5 credit)

Nutrition and Wellness will prepare students to explore different components of wellness which includes physical, social, and emotional health. This course will provide students with knowledge and skills related to various types of diets, nutritional information, and nutrition-related disease prevention. Students will be introduced to kitchen safety and sanitation and receive hands-on lab experiences focusing on how to meet nutritional needs and requirements for a healthy lifestyle. This course is a prerequisite for Culinary Essentials and is for those interested in a food service type of career.

Culinary Essentials I (.5 credit)

Culinary Essentials is a semester class that would introduce students to basic culinary skills, including different cooking methods and explore baking and pastry. Students will learn through lab activities and classroom instruction. Students will integrate knowledge, skills and practices required for careers in food production and services: demonstrate food safety and sanitation procedures; apply different cooking methods in a variety of labs, apply measuring techniques; follow a recipe; examine the principles of food production management service methods; and demonstrate common food production skills. Students will apply principles of nutrition to food preparation. Students will leave Culinary Essentials with the marketable skills in the food industry and have the opportunity to obtain their ServSafe Certification.

Culinary Essentials II (.5 credit)

Students will expand on their knowledge from taking Culinary Essentials I, and learn techniques to produce breads, muffins, biscuits, pies, cakes, cookies, pastries, and specialized desserts. Hands-on lab experience and client connected projects will be incorporated into the course. Students will produce industry quality pastries applying knowledge and skills of ingredient functions, pastry vocabulary, food science and mixing techniques.

Human Growth & Development: The Early Years (.5 credit)

This course provides students with knowledge about the physical, intellectual, emotional, and social growth (PIES) and development of humans from conception to the early years, with a special emphasis on birth. Students might have an opportunity to participate in a project with the "Real Care Babies."

Family Studies (.5 credit)

This course emphasizes building and maintaining healthy interpersonal relationships among family members and others in society. Topics include (but are not limited to) communication, dating, marriage, responsible parenting, and family units. Students will be introduced to the Empathy Belly during this course. Students might have an opportunity to participate in a project with the "Real Care Babies."

Leadership & Service in Action (.5 credit)

Students will evaluate their leadership skills to identify and strengthen weaknesses and enhance strengths. The students will apply mastered and developing leadership skills in a variety of situations to support the mission of the school.

Community Connections (.5 credit)

Community Connections courses provide community based/school-based learning experiences mainly within the family and consumer sciences classroom. Learning goals are set by the student, teacher, and community partners to create experiences to enhance the development of the 21st century skills.

Career Connections (.5 credit)

During this course, students would explore potential future careers in human services, research postsecondary institutions or certifications that lead to those careers and plan their high school journey based on that knowledge. Students will complete an internship in the course and are responsible for transportation.

Graphic Design Pathway [Career Opportunities](#)

Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Photo Imaging	CTG00	.5		X	X	X		\$20			X	X
Graphic Design Fundamentals	CTG04	.5		X	X	X		\$20		X		X
Principles of Illustration	CTG02	.5				X	X	\$20		X		
Graphic Design	CTG52A/B	1			X	X	X	\$40	Graphic Design Fundamentals	X		X
*Graphic Design Workplace Experience	CTG01A/B	1	Client Projects/ Internship			X	X	\$40	Graphic Design and Application	X		X
*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Photo Imaging (.5 credit)

Students will learn about the equipment, software, and hardware necessary to master the basics in digital photography. Students will demonstrate understanding and use of camera techniques as well as photo manipulation and graphic design software. This is a project-based course. This course is a prerequisite for a position on the yearbook or newspaper staff.

Graphic Design Fundamentals (.5 credit) (9-10 MVHS Only)

This class will serve as an introduction class to graphic design. Graphic Design Fundamentals provides a basic understanding of the graphic design process. Topics include analyzing the design elements and principles, exploring industry tools, software, and equipment, and learning composition techniques to develop a quality product.

Graphic Design (1 credit)

Graphic Design will focus on creativity and the design process with an emphasis on creative thinking and problem solving. We will create art products such as compositions, branding and logo design, package design, corporate brochures, and advertising. We will learn and incorporate the production processes with our projects and know the differences between spot printing and process printing.

Principles of Illustration (.5 credit)

Principles of Illustration explores a variety of media, tools, and supports to communicate ideas. Topics include an understanding of illustration as applicable to careers in graphic design, animation, apparel/textile design, industrial design, web design, architecture, interior design, and fine arts. Techniques in traditional and digital illustration applications will be explored as directly linked to social trends.

Graphic Design Workplace Experience (1 credit)

Graphic Design Workplace Experience will take the tools and software that you used in Graphic Design and apply them to “real world” applications. We will meet with clients and gain an understanding of problem solving for real projects considering production processes and client’s needs. We will develop a digital portfolio of projects to prepare you for submissions to college and to prepare you for job interviews.

Manufacturing/Automation Pathway (at CTEC) [Career Opportunities Part I](#) & [Part II](#)

Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	11	12	Course Fee	Prerequisite
Robotics I	CTC66A/B	1			X	X	\$20	None
Robotics Capstone	CTC97A/B	1		Client Project	X	X	\$20	Robotics I or Instructor Approval. No concurrent enrollment
Introduction to Welding	CTC67	.5		IRC = OSHA	X	X	\$40	None
Production Blueprint Reading	CTC68	.5			X	X		None
Production Methods I	CTC69A/B	1			X	X	\$40	Intro to Welding & Production Blueprint Reading or concurrent enrollment
*Production Methods II	CTC96A/B	1		Client Project	X	X	\$40	Production Methods I or concurrent enrollment
*Digital Electronics	CTC62A/B	1	FW		X	X	\$20	Engineering Design
*Work Experience in Manufacturing	CTC72A/B	.5 or 1		Internship	X	X		Application or Instructor Approval

*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

Manufacturing/Automation – Year One Course Block – (STEP ONE)

CTEC requires 2 full blocks per year.

Must choose both of the following:

NOTE: Course content is “merged” throughout the year; These two classes go together.

Introduction to Welding (.5 credit)

An introductory level course designed to instruct students in basic welding and metal fabrication skills. Student will complete the OSHA 10-Hour Manufacturing Certification if they do not already have this industry recognized credential.

Production Blueprint Reading (.5 credit)

A course designed to develop advanced technical communication skills used to interpret manufacturing production drawings as related to manufacturing occupations including blueprints, schematics, and other trade prints.

Manufacturing/Automation – Year One Course Block – (STEP ONE continued)

CTEC requires 2 full blocks per year.

Choose **one** of the following:

Robotics I (1 credit)

Students will be introduced to the main types of robotics, plus, students will build, assemble, and troubleshoot robotic devices/systems while constructing and verifying circuits. This is a project-based course in which students will work on collaborative projects.

Production Methods I (1 credit)

A comprehensive course designed to instruct students in the knowledge and skills common to manufacturing occupations and required for fabricating products using a variety of materials (plastic, metal, composites, etc.)

Manufacturing/Automation – Year Two Course Block – (STEP TWO)

CTEC requires 2 full blocks per year.

Choose **two** of the following:

Production Methods I (1 credit)

A comprehensive course designed to instruct students in the knowledge and skills common to manufacturing occupations and required for fabricating products using a variety of materials (plastic, metal, composites, etc.)

Production Methods II (1 credit)

An application-level course which builds on skills learned in Production Methods I where students will learn and apply advanced manufacturing and fabrication skills using current manufacturing technologies.

Robotics Capstone (1 credit)

This course is designed to be taken after Robotics I offered at CTEC. Students will build on the knowledge gained during the first year of Robotics by working with a team of their peers to compete in several area robotics competitions.

Digital Electronics (1 credit)

A rigorous course that uses computer simulations to learn about the logic of electronics as they design, test, and construct circuits and devices. Students design circuits to solve open-ended problems, assemble their solutions, and troubleshoot them as necessary. Students will use mathematic theorems to perform Boolean algebraic functions to design complex logic circuits.

Work Experience in Manufacturing (1 credit)

Advanced level application course that allows students to seek out an internship within their area of interest/study. Can be taken for .5 credit or 1 credit depending on length of internship.

Marketing Pathway [Career Opportunities](#)

Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Business Essentials	CTG20	.5		X	X	X					X	X
Web Page Design	CTG50A/B	1		X	X	X	X				X	X
Sports & Entertainment Marketing	CTG28	.5			X	X	X		Business Essentials		X	
Marketing	CTG27A/B	1	Client Projects		X	X	X		Business Essentials		X	X
Accounting	CTG23A/B	1			X	X	X		Business Essentials		X	X
Graphic Design	CTG52A/B	1			X	X	X	\$40	Graphic Design Fundamentals	X		X
Business Communications	CTG32	.5				X	X		Business Essentials			X
Entrepreneurship	CTG22	.5	Entrepreneurship			X	X		Business Essentials			X
*Marketing Applications	CTG29A/B	1	Client Projects			X	X	\$40 (MVHS)	Marketing and Application		X	X
*Marketing Workplace Experience	CTG35A/B	.5	Client Project/ Internship / (College Credit for MVHS)			X	X		Application		X	X

*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

Business Essentials (.5 credit)

Business Essentials is an introduction core course designed to peak student interest in the fields of Business Management, Marketing, and Finance. Units covered include Management, Finance, Economics/Marketing, Accounting and Corporate Ethics. Upon completion of this course students will have the background knowledge necessary to succeed in a Management, Finance or Marketing Pathway specific course.

Sports & Entertainment Marketing (.5 credit)

DHS Only

Students will learn about the business world using examples from two of the most exciting and competitive businesses in the world: sports and entertainment. They will learn all different aspects of marketing such as product design and pricing strategies, branding and licensing, advertising, and sales promotion, as well as possible careers in this area.

Web Page Design (1 credit)

Web Page Design teaches students how to create a web site and how to develop web pages. Students will use HTML, Adobe Dreamweaver, Adobe Photoshop, and other Adobe CS4 applications to design creative and attractive products. Topics include, but not limited to, using CSS, tables, links, forms, and navigations bars.

Business Communications (.5 credit)

MVHS Only

Business Communications will help students to develop an understanding of and appreciation for effective communication in business situations and environments. Emphasis is placed on all phases of communication: speaking, listening, thinking, responding, reading, writing, non-verbal communication, and utilizing technology for communication. Business communication functions, processes, and applications in the context of business may be practiced through problem-based projects and real-world applications.

Entrepreneurship (.5 credit)

Start your own business! Entrepreneurship is a course which acquaints students with the knowledge and skills necessary to own and operate their own business. Topics from several fields form the content including economics, marketing, business and labor law and business planning.

Marketing (1 credit)

Marketing focuses on the wide range of factors that influence the successful flow of goods and services from the producer to the consumer. Through a variety of projects, students will come to understand the operations of for-profit companies and will have an opportunity to run the school store (DHS) and be able to market school programs and extracurricular events (DHS). Course topics include market research, the purchasing process, distribution systems, inventory control, salesmanship, sales promotions, supply, demand and price and business management.

Marketing Applications (1 credit)

This course includes marketing school activities, and involves discussion related to advertising, branding, graphic design, packaging, promotion, publicity, sponsorship, public relations, and sales promotions. Students will be actively engaged in utilizing technology in the design, production, and implementation of marketing strategies to market school programs and extra-curricular events. Students at MVHS are required to participate in DECA (course fee).

Marketing Workplace Experience (.5 or 1 credit)

This course can be one or two semesters depending on the length of the internship. Students will seek out this internship, which might combine onsite experiences with in-class experiences and connect to the student's individual plan of study.

Accounting (1 credit)

This course will provide the introduction of fundamental accounting principles and procedures used in business. Students will understand the principles of debits and credits, journalizing transactions, posting to ledgers, and determining profit or loss. Students will also learn the creation of formal financial statements to be used for the reporting of net income or net loss.

Graphic Design (1 credit)

10th MVHS; 11-12 CTEC

Graphic Design will focus on creativity and the design process with an emphasis on creative thinking and problem solving. We will create art products such as compositions, branding and logo design, package design, corporate brochures, and advertising. We will learn and incorporate the production processes with our projects and know the differences between spot printing and process printing.

Programming & Software Development Pathway [Career Opportunities](#)

Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Web Page Design	CTG50A/B	1			X	X	X	X				X	X
AP Computer Science Principles	CTC90A/B	1	FW	College Credit			X	X			X	X	
*Cybersecurity	CTC92A/B	1					X	X	\$20	AP Comp Sci Prin.	X		
*AP Computer Science A	CTC91A/B	1	FW	College Credit			X	X		AP Comp Sci Prin.	X		
*WBL in Programming & Software Development	CTC93A/B	1		Internship			X	X		Application Only	X		

*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

Web Page Design (1 credit)

Web Page Design teaches students how to create a web site and how to develop web pages. Students will use HTML, Adobe Dreamweaver, Adobe Photoshop, and other Adobe CS4 applications to design creative and attractive products. Topics include, but not limited to, using CSS, tables, links, forms, and navigations bars.

Cybersecurity (1 credit)

Cybersecurity is a problem-based course that gives students a broad exposure to the many aspects of digital and information security, while encouraging socially responsible choices and ethical behavior. It inspires algorithmic thinking, computational thinking, and especially, “outside-the-box” thinking. Students explore the many educational and career paths available to cybersecurity experts, as well as other careers that comprise the field of information security.

Work-Based Learning in Programming & Software Development (1 credit)

Advanced level application course that incorporates experienced based learning. Student will seek out an internship within their area of interest/study.

AP Computer Science Principles (1 credit)

Students will be introduced to the central ideas of computer science, inviting students to develop their computational thinking vital for success across multiple disciplines. The course is unique in its focus on fostering students to be creative and encouraging students to apply creative processes when developing computational artifacts. Students will also develop effective communication and collaboration skills, working individually and collaboratively to solve problems while discussing and writing about the importance of these problems and their impact on the local and global society.

AP Computer Science A (1 credit)

The course introduces students to computer science with fundamental topics that include problem solving, design strategies, and methodologies, organization of data (i.e., data structures), approaches to processing data (algorithms), analysis of potential solutions and the ethical and social implications of computing. The course emphasizes both object-oriented and imperative problem solving and design using Java language. These techniques represent proven approaches for developing solutions that can scale up from small, simple problems to large, complex problems.

Teacher/Training Pathway Career Opportunities												
Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Career and Life Planning	CTG35	0.5		X	X	X	X				X	X
Human Growth and Development – Early Years	CTG36	0.5		X	X	X	X				X	X
Family Studies	CTG37	0.5		X	X	X	X				X	X
Teaching as a Career	CTG45A/B	1	College Credit		X	X	X		Career and Life Planning, or Human Growth and Development and application		X	X
*Teacher Internship	CTG46A/B	1	College Credit & Internship			X	X		Teaching as a Career		X	X
*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Career & Life Planning (.5 credit)

Students will explore skills and strategies helpful in being more focused and productive individuals. This freshmen and sophomore level course emphasizes goal setting, career path decision, educational opportunities, employability skills, stress, and time management. Students will participate in mock interviews, educational planning, and job shadow experiences. Students will need to provide transportation to their desired

Human Growth & Development – Early Years (.5 credit)

This course provides students with knowledge about the physical, mental, emotional, and social growth and development of humans from conception to old age, with a special emphasis on birth through school age. Students will participate in a project with the “Baby, Think It Over.”

Family Studies (.5 credit)

This course emphasizes building and maintaining healthy interpersonal relationships among family members and others in society. Topics include (but are not limited to) communication, dating, marriage, responsible parenting, and family units. Students will be introduced to the Empathy Belly during this course.

Teaching as a Career (1 credit)

Teaching as a Career introduces students to the principles teaching and learning by understanding the roles and responsibilities of educators. Students will observe and model techniques of imparting knowledge and information. These course exposes students to classroom management, student behavior, school leadership, and assessment strategies, by pairing students with a master teacher in the district. Students will need to provide transportation to their teaching placements.

Teacher Internship (1 credit)

Students examine and practice teaching strategies, classroom management, professionalism, and lesson development by participating in a teaching internship. Students will be paired with a master teacher at their desired grade level in the district during the duration of the course. Students will need to provide transportation to their internship.

Web & Digital Communications Pathway [Career Opportunities Part I](#) & [Part II](#)

Course Title	Course Code	Credit	College Credit, IRC, Client Project, Internship	9	10	11	12	Course Fee	Prerequisite	CTEC	DHS	MVHS
Web Page Design	CTG50A/B	1		X	X	X	X				X	X
Interactive Media	CTG49A/B	1		X	X	X	X				X	X
Graphic Design	CTG52A/B	1			X	X	X	\$40		X		X
Animation	CTG51A/B	1				X	X		Interactive Media	X		
*Game Design	CTG56A/B	1				X	X		Animation	X		
*Web & Digital Communications Project Management	CTG58A/B	1	Internship			X	X		Application	X	X	X
*CAPS Makerspace Project Management		1	Client Project			X	X		Any Intro Level Technology Course	X		
*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.												

Web Page Design (1 credit)

Web Page Design teaches students how to create a web site and how to develop web pages. Students will use HTML, Adobe Dreamweaver, Adobe Photoshop, and other Adobe CS4 applications to design creative and attractive products. Topics include, but not limited to, using CSS, tables, links, forms, and navigations bars.

Graphic Design (1 credit)

Graphic Design emphasizes design elements and principles in the purposeful arrangement of images to communicate a message. The focus is on creating art products such as advertisements, product design and identity symbols.

Web & Digital Communications Project Management (1 credit)

This course provides students with information and skills necessary for success in managing projects and operating logistical ventures in technology, business, and industry. Students will seek out an internship as a part of this work-based learning course.

CAPS Makerspace Project Management (1 credit)

The CAPS Makerspace Project Management course provides students with the information and skills necessary for success in managing projects. This course covers scheduling of resources (including personnel, budget, timelines, and equipment), utilization of Gantt charts, etc. Other possible topics include developing a business plan, finance, business law, marketing and promotion strategies, insurance employee/employer relations, problem-solving and decision-making, and building leadership skills, along with completing a client-connected project.

Interactive Media (1 credit)

Interactive Media provides students with the knowledge and skills to create, design, and produce interactive media products and services. The courses may emphasize the development of digitally generated and/or computer-enhanced media. Course topics may include 3D animation, graphic media, web development, and virtual reality. Upon completion of these courses, students may be prepared for industry certification.

Animation (1 credit)

In this project-based course, students will explore Flash's drawing, animation and audio capabilities and build interactive content that can be shared over the Internet. Students will learn how to create interesting motion graphics. They will learn about the aesthetics of design, motion, and sound. By constructing user interactive projects, students will be challenged to think in a non-linear way. Students will learn to use a combination of logical reasoning, critical thinking, and artistic creativity.

Game Design (1 credit)

A practical introduction to game design and game prototyping, design iteration, and user testing. Students will learn how to use popular game development software to create engaging, interactive games in a variety of styles. Challenging hands-on projects that teach all elements of successful game development will be provided.

Cedar Trails Exploration Center – Juniors & Seniors Only – 2 block minimum

Bioscience Strand at CTEC CAPS Career Opportunities Part I & Career Opportunities Part II								
Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	11	12	Course Fee	Prerequisite
Medical Interventions	CTC77A/B	1			X	X	\$10	Chemistry
AP Chemistry	SCP20A/B	1	FW	College Credit	X	X	\$10	Chemistry or Honors Chemistry
*Biotechnical Engineering	CTC71A/B	1		IRC = BCSI	X	X	\$10	Biology/AP Biology/Chemistry or concurrent enrollment
*Biomedical Innovation	CTC74A/B	1			X	X	\$10	Medical Interventions
*Biochemistry Workplace Experience (Capstone Course)	CTC75A/B	1		Internship		X	None	Application
*Biomedical Research / Workplace Experience (Capstone Course)	CTC76A/B	1		Internship		X	None	Application
*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.								

STEP to finding your path... CTEC requires 2 full blocks/credits per year.

Notice the left-hand side is chemical, lab and engineering focused, while the right-hand side is medical focused.

AP Chemistry (1 credit)

This rigorous course is intended to prepare students for the AP Chemistry Exam. AP Chemistry topics covered include atomic theory and structure and chemical bonding, kinetics, equilibrium, and thermodynamics. AP Chemistry labs are equivalent to those typically found in college level chemistry courses. The class is designed to provide students with a solid foundation in chemical knowledge and principles.

Biotechnical Engineering (1 credit)

Excellent course for those interested in pursuing a future career in BioTech/BioChem/BioMed. Biotechnical Engineering enables students to develop and expand their knowledge and skills in biology, physics, technology, and mathematics. Course content draws upon diverse fields such as biomedical engineering, biomolecular engineering. Students may engage in project-based learning and problems related to biomechanics, cardiovascular engineering, genetic engineering, tissue engineering, biomedical devices, human interfaces, bioprocesses, forensics, and bioethics.

Biochemistry Workplace Experience Capstone Course (1 credit) – Application Only

Excellent course for those interested in pursuing a future career in BioTech/BioChem. This is a workplace experience course in which students will seek out an internship in a field related to their individual plan of study.

Medical Interventions (1 credit)

Medical Interventions allows students to investigate the variety of interventions involved in the prevention, diagnosis, and treatment of disease. This course will explore how to prevent and fight infection, how to screen and evaluate the code in our DNA, how to prevent, diagnose, and treat cancer, and how to prevail when the organs of the body begin to fail. Through these scenarios, students will be exposed to the wide range of interventions related to immunology, surgery, genetics, pharmacology, medical devices, and diagnostics. Students practice problem solving with structured activities and progress to open-ended projects and problems that require them to develop planning, documentation, communication, and other professional skills. Students should take this course prior to taking Biomedical Innovation.

Biomedical Innovation (1 credit)

Excellent course for those interested in pursuing a future career in BioMed/BioChem/BioTech. This is a [Project Lead the Way](#) course. Please take Medical Interventions prior to taking this course. In this research course, students will apply their knowledge and skills to answer questions or solve problems related to the biosciences. Students design innovative solutions for the health challenges of the 21st century (such as the cure for Cancer, etc.) by addressing topics such as clinical medicine, biochemistry, physiology, biomedical engineering, and/or public health. They may have the opportunity to work on an independent project and may work with a mentor or advisor from industry.

Biomedical Research Workplace Experience Capstone Course (1 credit) – Application Only

Excellent course for those interested in pursuing a future career in BioMed. This is a workplace experience course in which students will seek out an internship in a field related to their individual plan of study.

Cedar Trails Exploration Center – Juniors & Seniors Only – 2 block minimum

Design Strand at CTEC CAPS [Career Opportunities](#)

Course Title	Course Code	Credit	IRC, Client Project, Internship	11	12	Course Fee	Prerequisite
Graphic Design Fundamentals	CTC04	.5		X	X	\$20	
Principles of Illustration	CTC02	.5		X	X	\$20	
Graphic Design	CTC52A/B	1		X	X	\$40	Graphic Design Fundamentals + Principles of Illustration
Animation	CTC51A/B	1		X	X	None	Interactive Media
*Game Design	CTC56A/B	1		X	X	None	Animation
*Graphic Design Workplace Experience (Capstone Course)	CTC01A/B	1 or 2	Client Project	X	X	\$40	Graphic Design + Application
*CAPS Makerspace Project Management	CTC53A/B	1	Client Project	X	X	None	
*Web & Digital Communications Project Management (Capstone Course)	CTC58A/B	1 or 2	Internship	X	X	None	Application

*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

STEP to finding your path... CTEC requires 2 full blocks/credits per year.

Choose your path from the following courses...

Graphic Design Fundamentals (.5 credit)

This course serves as an introduction class to graphic design and is paired with Principles of Illustration. Graphic Design Fundamentals provides a basic understanding of the graphic design process. Topics include analyzing the design elements and principles, exploring industry tools, software, and equipment, and learning composition techniques to develop a quality product.

Graphic Design (1 credit)

Graphic Design emphasizes design elements and principles in the purposeful arrangement of images to communicate a message. The focus is on creating art products such as advertisements, product design and identity symbols. Take Graphic Design Workplace Experience after this course.

Graphic Design Workplace Experience Capstone Course (1 credit) – Application Only

Graphic Design Workplace Experience will take the tools and software that you used in Graphic Design and apply them to “real world” applications. We will meet with clients and gain an understanding of problem solving for real projects considering production processes and client’s needs. We will develop a digital portfolio of projects to prepare you for submissions to college and to prepare you for job interviews.

CAPS Makerspace Project Management (1 credit)

The CAPS Makerspace Project Management course provides students with the information and skills necessary for success in managing projects. This course covers scheduling of resources (including personnel, budget, timelines, and equipment), utilization of Gantt charts, etc. Other possible topics include developing a business plan, finance, business law, marketing and promotion strategies, employee/employer relations, problem-solving and decision-making, and building leadership skills, along with completing a client-connected project.

Principles of Illustration (.5 credit)

This course is paired with Graphic Design Fundamentals. Principles of Illustration explores a variety of media, tools, and supports to communicate ideas. Topics include an understanding of illustration as applicable to careers in graphic design, animation, apparel/textile design, industrial design, web design, architecture, interior design, and fine arts. Techniques in traditional and digital illustration applications will be explored as directly linked to social trends.

Animation (1 credit) (Fall Double Block)

In this project-based course, students will explore Flash’s drawing, animation and audio capabilities and build interactive content that can be shared over the Internet. Students will learn how to create interesting motion graphics. They will learn about the aesthetics of design, motion, and sound. By constructing user interactive projects, students will be challenged to think in a non-linear way. Students will learn to use a combination of logical reasoning, critical thinking, and artistic creativity. Perfect course to take prior to taking Game Design.

Game Design (1 credit) (Spring Double Block)

A practical introduction to game design and game prototyping, design iteration, and user testing. Students will learn how to use popular game development software to create engaging, interactive games in a variety of styles. Challenging hands-on projects that teach all elements of successful game development will be provided.

Web & Digital Project Management Capstone Course (1 credit) – Application Only

Take this course if you are interested in pursuing an internship. Students will seek out an internship as a part of this work-based learning course.

Cedar Trails Exploration Center – Juniors & Seniors Only – 2 block minimum

Emerging Technologies Strand at CTEC CAPS

Manufacturing/Automation [Career Opportunities Part I](#) & [Part II](#)

Engineering [Career Opportunities](#)

Programming & Cybersecurity [Career Opportunities](#)

Course Title	Course Code	Credit	Weight	College Credit, IRC, Client Project, Internship	11	12	Course Fee	Prerequisite
Robotics I	CTC66A/B	1			X	X	\$20	
Robotics Capstone	CTC97A/B	1		Client Project	X	X	\$20	Robotics I or Instructor Approval; No concurrent enrollment
AP Computer Science Principles	CTC90A/B	1	FW	College Credit	X	X	None	
Digital Electronics	CTC62A/B	1	FW		X	X	\$20	Engineering Design (at home high school) & Principles of Applied Engineering (at home high school)
Computer Integrated Manufacturing	CTC63A/B	1	FW		X	X	\$20	Engineering Design (at home high school) & Principles of Applied Engineering (at home high school)
Introduction to Welding	CTC67	.5		IRC = OSHA 10	X	X	\$40	
Production Blueprint Reading	CTC68	.5			X	X	None	
*AP Computer Science A	CTC91A/B	1	FW	College Credit	X	X	None	AP Computer Science Principles
*Cybersecurity	CTC92A/B	1			X	X	\$20	AP Computer Science Principles
*WBL in Programming & Software Development (Capstone Course)	CTC93A/B	1		Internship	X	X	None	AP Computer Science A or concurrent enrollment + Application
*Engineering Design & Development	CTC64A/B	1		Client Project / Entrepreneurship	X	X	\$20	Digital Electronics or Computer Integrated Manufacturing or concurrent enrollment
*Engineering Workplace Experience (Capstone Course)	CTC65A/B	1		Internship	X	X	None	Digital Electronics or Computer Integrated Manufacturing or concurrent enrollment + Application
Production Methods I	CTC69A/B	1			X	X	\$40	Intro to Welding & Advanced Production Blueprint Reading
*Production Methods II	CTC96A/B	1		Client Project	X	X	\$40	Production Methods I or concurrent enrollment
*Work Experience in Manufacturing (Capstone Course)	CTC72A/B	.5 or 1		Internship	X	X		Application or Instructor Approval

*Application Level CTE Courses. IRC = Industry Recognized Credential (Certification). Client Projects = Projects completed for an outside company or for USD 232 that take 24 hours of student time.

STEP ONE...

CHOOSE A PATH:

Manufacturing/Automation, Programming or Engineering (see next 3 pages)

Interested in MANUFACTURING/AUTOMATION?

CTEC requires 2 full blocks/credits per year.

Year One Options

Production Blueprint Reading (.5 credit)

This course is meant to be taken at the same time as Introduction to Welding. A technical level course designed to develop advanced technical communication skills used to interpret manufacturing production drawings as related to manufacturing occupations including blueprints, schematics, and other trade prints.

Production Methods I (1 credit)

This course builds on the skills learned in Welding and Blueprint Reading. This is a hands-on fabrication course! A comprehensive course designed to instruct students in the knowledge and skills common to manufacturing occupations and required for fabricating products using a variety of materials (plastic, metal, composites, etc.)

CAPS Makerspace Project Management (1 credit)

The CAPS Makerspace Project Management course provides students with the information and skills necessary for success in managing projects. This course covers scheduling of resources (including personnel, budget, timelines, and equipment), utilization of Gantt charts, etc. Other possible topics include developing a business plan, finance, business law, marketing and promotion strategies, insurance employee/employer relations, problem-solving and decision-making, and building leadership skills, along with completing a client-connected project.

Introduction to Welding (.5 credit)

This course is meant to be taken at the same time as Production Blueprint Reading. An introductory level course designed to instruct students in basic welding skills. Student will complete OSHA 10-Hour General Industry (Manufacturing) Certification.

Robotics I (1 credit)

Students will be introduced to the main types of robotics, plus, students will build, assemble, and troubleshoot robotic devices/systems while constructing and verifying circuits. This is a project-based course in which students will work on collaborative projects.

MANUFACTURING/AUTOMATION – Year Two

CTEC requires 2 full blocks/credits per year.

Production Methods II (1 credit)

An application-level course in the Manufacturing Pathway at CTEC which builds on skills learned in other manufacturing classes where students will learn and apply advanced manufacturing and fabrication skills using current manufacturing technologies.

Work Experience in Manufacturing Capstone Course (1 credit) – Application Only

This is an advanced level application course that incorporates experienced based learning in which students will seek out an internship within their area of interest/study.

Robotics I (1 credit)

Students will be introduced to the main types of robotics, plus, students will build, assemble, and troubleshoot robotic devices/systems while constructing and verifying circuits. This is a project-based course in which students will work on collaborative projects.

Robotics Capstone (1 credit)

This course is designed to be taken after Robotics I offered at CTEC. Students will build on the knowledge gained during the first year of Robotics by working with a team of their peers to compete in several area robotics competitions.

Interested in PROGRAMMING?
CTEC requires 2 full blocks/credits per year.
Step One...

AP Computer Science Principles (1 credit)

Students will be introduced to the central ideas of computer science, inviting students to develop their computational thinking vital for success across multiple disciplines. This dual credit course is unique in its focus on fostering students to be creative and encouraging students to apply creative processes when developing computational artifacts. Students will also develop effective communication and collaboration skills, working individually and collaboratively to solve problems while discussing and writing about the importance of these problems and their impact on the local and global society.

PROGRAMMING
CTEC requires 2 full blocks/credits per year.
Next step after selecting AP Computer Science Principles.
Choose from the following courses:

AP Computer Science A (1 credit)

This dual-credit course introduces students to computer science with fundamental topics that include problem solving, design strategies, and methodologies, organization of data (i.e., data structures), approaches to processing data (algorithms), analysis of potential solutions and the ethical and social implications of computing. The course emphasizes both object-oriented and imperative problem solving and design using Java language. These techniques represent proven approaches for developing solutions that can scale up from small, simple problems to large, complex problems.

Cybersecurity (1 credit)

Cybersecurity is a problem-based course that gives students a broad exposure to the many aspects of digital and information security, while encouraging socially responsible choices and ethical behavior. It inspires algorithmic thinking, computational thinking, and especially, “outside-the-box” thinking. Students explore the many educational and career paths available to cybersecurity experts, as well as other careers that comprise the field of information security.

Robotics I (1 credit)

Students will be introduced to the main types of robotics, plus, students will build, assemble, and troubleshoot robotic devices/systems while constructing and verifying circuits. This is a project-based course in which students will work on collaborative projects.

Work-Based Learning in Programming & Software Development Capstone Course

(1 credit) – Application Only

Advanced level application course that incorporates experienced based learning in which students will seek out an internship within their area of interest/study.

Interested in ENGINEERING?
CTEC requires 2 full blocks/credits per year.
Step One...

Digital Electronics (DE) (1 credit)

A rigorous course that uses computer simulations to learn about the logic of electronics as they design, test, and construct circuits and devices. Students design circuits to solve open-ended problems, assemble their solutions, and troubleshoot them as necessary. Students will use mathematic theorems to perform Boolean algebraic functions to design complex logic circuits.

Computer Integrated Manufacturing (CIM) (1 credit)

Computer Integrated Manufacturing courses involve the study of robotics and automation. Building on computer solid modeling skills, students may use computer numerical control (CNC) equipment to produce actual models of their three-dimensional designs. Course topics may also include fundamental concepts of robotics, automated manufacturing, and design analysis.

ENGINEERING

CTEC requires 2 full blocks/credits per year.

Step Two...

Digital Electronics (DE) (1 credit)

A rigorous course that uses computer simulations to learn about the logic of electronics as they design, test, and construct circuits and devices. Students design circuits to solve open-ended problems, assemble their solutions, and troubleshoot them as necessary. Students will use mathematic theorems to perform Boolean algebraic functions to design complex logic circuits.

Engineering Design & Development (1 credit)

Engineering Design & Development (EDD) is a capstone course in the PLTW high school engineering program. It is an engineering research course in which students work in teams to design and develop an original solution to a valid open-ended technical problem by applying the engineering design process.

Engineering Workplace Experience Capstone Course (.5 or 1 credit) – Application Only

This course can be one or two semesters depending on the length of the internship. Students will seek out this internship that connects with their career goals.

Computer Integrated Manufacturing (CIM) (1 credit)

Computer Integrated Manufacturing courses involve the study of robotics and automation. Building on computer solid modeling skills, students may use computer numerical control (CNC) equipment to produce actual models of their three-dimensional designs. Course topics may also include fundamental concepts of robotics, automated manufacturing, and design analysis.

Robotics Capstone (1 credit)

This course is designed to be taken after Robotics I. Students will build on the knowledge gained during the first year of Robotics by working with a team of their peers to compete in several area robotics competitions.

CAPS Makerspace Project Management (1 credit)

The CAPS Makerspace Project Management course provides students with the information and skills necessary for success in managing projects. This course covers scheduling of resources (including personnel, budget, timelines, and equipment), utilization of Gantt charts, etc. Other possible topics include developing a business plan, finance, business law, marketing and promotion strategies, insurance employee/employer relations, problem-solving and decision-making, and building leadership skills, along with completing a client-connected project.

Eudora/De Soto Technical Education Center (EDTEC) Juniors/Seniors only. Everyday AM program. Fees apply. Payable to Eudora School District.						
Course Title	Course Code	Credit	Year	11	12	Prerequisite
Floriculture & Greenhouse Management	VE907A/B	1	1	X	X	Application
Animal Science	VE901A/B	1	1	X	X	Application
*Certified Nursing Assistant CNA	VE604	.5	1	X	X	Application
First Aid / CPR	VE605	.5	1	X	X	Application
Medical Terminology	VE602A/B	.5	1	X	X	Application
Health Care Research	VE606	.5	1	X	X	Application
Medical Interventions	VE607	1	2		X	Application + Year one courses
*Health Careers OJT	VE613A/B	1	2		X	Application + Year one courses
*Topics in Health Science	VE612A/B	1	2		X	Application + Year one courses
Auto Collision I	VE300A/B	1	1	X	X	Application
Auto Refinishing I	VE301A/B	1	1	X	X	Application
*Auto Collision II	VE310A/B	1	2		X	Application + Year one courses
*Auto Refinishing II	VE400	1	2		X	Application + Year one courses
Culinary Art I	VE500A/B	1	1	X	X	Application
Culinary Essentials	VE501	.5	1	X	X	Application
Event Planning & Mgt.	VE502	.5	1	X	X	Application
Culinary Arts II	VE510	.5	2		X	Application + Year one courses
*Culinary Applications	VE511A/B	1	2		X	Application + Year one courses
Foundations of Travel & Tourism	VE512	.5	2		X	Application + Year one courses
*Application Level CTE Courses						

Animal & Plant Science EDTEC Program – Course Block
Fees: approximately \$50/year

Floriculture & Greenhouse Management (1 credit)

Floriculture & Greenhouse Management is an applied-knowledge course designed to prepare students to manage greenhouse operations. This course covers principles of greenhouse structures, plant health and growth, growing media, greenhouse crop selection and propagation, and management techniques. Upon completion of this course, proficient students will be equipped with the technical knowledge and skills needed to prepare for further education and careers in horticulture production.

Animal Science (1 credit)

Animal Science investigates information about the causes, diagnosis, and the treatment of diseases and injuries of animals, typically emphasizing domestic and farm animals. Course topics focus on anatomy and physiology, nutrition behavior, and reproduction, but also include other areas of study as appropriate.

Health Science EDTEC Program – Year One Course Block
Fees: approximately \$100/year

Medical Terminology (.5 credit)

Medical Terminology students will learn how to identify medical terms by analyzing their components. This course emphasizes defining medical prefixes, root words, suffixes, and abbreviations. A primary focus includes an emphasis in developing both oral and written skills in the language used to communicate within health

Health Care Research (.5 credit)

This course examines topics in health careers targeted to one of the five paths within the Health Science career cluster. These clusters include Therapeutic, Diagnostic, Health Informatics, Support Services and Biotechnology. Students will be allowed to develop individual plans of study about specific health careers where they have an interest.

Certified Nursing Assistant (CNA) (.5 credit)

The CNA course is an introduction to basic nursing care skills and concepts necessary to prepare the student to function as a nurse aide in a long-term care facility. Upon successful completion of the state nurse aid certification test, the student will receive a certificate and be able to work as a CNA.

First Aid / CPR (.5 credit)

A technical level course designed to instruct students in the requirements and skills to obtain national certifications for First Aid/CPR.

Health Science EDTEC Program – Year Two Course Block
Fees: approximately \$100/year

Choice: 2nd year students can choose two OJT course sessions and not take Medical Interventions course with instructor approval.

***OR** 2nd year students can choose zero OJT course sessions and take Topics in Health Science for 2 semesters.*

Medical Interventions (1 credit)

Students 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. Through real-world cases, students are exposed to a range of interventions related to immunology, surgery, genetics,

Topics in Health Science (1 credit)

Topics in Health Science examines topics in health science other than those taught in the core sequence of courses. Students will be allowed to develop individual plans of study about specific health careers where they have an interest. Students will research a topic in an in-depth manner, write a research paper, and complete a class presentation, a full period in length, about their topic of choice.

Health Careers OJT (1 credit)

Health Careers OJT is a work experience course intended to provide a rotational clinical/shadowing experience for the students. Student goals are set cooperatively with the student, parents, teacher, and employers where applicable. The work experience may be paid or unpaid.

Restaurant & Event Management (Culinary Arts) EDTEC Program – Year One Course Block
Fees: approximately \$130/year

Culinary Arts I (1 credit)

Culinary Arts I focuses upon skills recognized as important to the field of culinary arts. Topics include plating, garnishes, soups, sauces, and main dish presentation. Bakery and desserts will be introduced, but not the main focus of this course. Catering experiences will be included as well as observations of personnel already in the field. Significant time will be devoted to skill development necessary for food production or a culinary kitchen.

Event Planning & Management (.5 credit)

Event Planning and Management provides students with the knowledge and skills relate to the even planning and implementation process. It will include establishing client relations, the importance of communication, planning process, resource management, quality service, and staffing issues.

Culinary Essentials (.5 credit)

Culinary Essentials is a comprehensive course providing students with knowledge and skills related to commercial and institutional food service establishments. Course topics include sanitation and safety procedures, nutrition and dietary guidelines, food preparation and production, as well as meal planning & presentation. It may also include both “back-of-the-house” and “front- of-the-house” experiences, and may therefore cover reservation systems, customer service, and restaurant/business management.

Restaurant & Event Management (Culinary Arts) EDTEC Program – Year Two Course Block
Fees: approximately \$130/year

Culinary Applications (1 credit)

Culinary Applications applies the skills needed in the culinary arts profession. It includes the application of skills within a school-based, community-based experience or work-based internship and will cover an introduction of all aspects of an industry. Students enrolled in this course are expected to have mastered skills in the culinary field so that they can apply them in authentic experiences following industry standards and regulations. In-house and off-site experiences will be an integral part of this class.

Foundations of Travel & Tourism (.5 credit)

Foundations of Travel & Tourism assists students in charting a career path in one of the world's largest industries: travel and tourism. It will look at the different segments of the tourism industry and explore careers that the industry offers. It looks at the economic impact and the ramifications of development to the economy. Students will also explore emerging trends and the impact of technology.

Culinary Arts II (.5 credit)

Culinary Arts II will focus on the skills required when developing an understanding of the diversity and uniqueness of foods across the globe. Topics may range from specific regions of the United States to the different cultures and food habits around the world. Particular attention will be made to keep the experiences as real as possible using authentic ingredients, procedures, and equipment. An entrepreneurship experience will also be part of this course.

Mobile Equipment Maintenance EDTEC Program – Year One Course Block
Fees: approximately \$140/year

Auto Collision I (1 credit)

Auto Collision I is a comprehensive, technical level course designed to instruct students in the knowledge and skills common to the Collision Repair Industry.

Auto Refinishing I (1 credit)

Auto Refinishing I is a comprehensive, technical level course designed to instruct students in the knowledge and skills common to the Auto Refinishing Industry.

Mobile Equipment Maintenance EDTEC Program – Year Two Course Block
Fees: approximately \$140/year

Auto Collision II (1 credit)

Auto Collision II is a comprehensive, application-level course designed to provide students with the advanced skills needed to perform diagnosis and repair in the Collision Industry.

Auto Refinishing II (1 credit)

Auto Refinishing II is a comprehensive, application-level course designed to provide students with the skills needed to perform diagnosis and repair in the Custom Refinishing Industry. This course is a first semester course, one hour in length and is blocked together with another one-hour length course, Auto Collision II.

Career Ready Programs – JCCC & KCKCC TEC

The following pages detail the Career & Technical Education college courses.



JOHNSON COUNTY
COMMUNITY COLLEGE



Kansas City Kansas
Community College

Important Career Ready Information

1. The school district will assist students with getting the needed course codes to enroll and counselors will remain in contact with the college for checking attendance, grades, etc.
2. These are college courses. The student is responsible for applying to the college, getting textbooks/supplies, driving to the college, completing coursework, and all needed communication with the instructors.
3. The Career Ready Programs are for juniors and seniors.
4. Seniors taking these courses will not be able to apply for part time status second semester.
5. Most of the courses in these programs qualify for Excel in CTE, meaning they are free tuition for high school students. Students will still pay for books and supplies.
6. Most of the courses in these programs require students to have flexible schedules, meaning that your college classes might be two blocks of time, every day.
7. The courses and course descriptions change on a regular basis. Please view the individual programs via the hyperlinked titles.

Johnson County Community College (JCCC) – Excel in CTE – Application Only

Most programs offer free tuition. Program fees apply for textbooks/supplies - Payable to JCCC.

The JCCC Excel in CTE Program is open to juniors and seniors as a dual enrollment on the JCCC campus. Student must provide transportation to/from the college campus. Most programs require an extra year or two post high school to fulfill all credits. **Check with your counselor to apply.**

Course/Program Title	USD 232 Course Code	HS Year Credit	HS Total Credit	College Total Program Credit	AM	PM	Fees
Automotive Technology I & II (AUTO)	VEJ14A/B(year 1) VEJ15A/B(year 2)	3	6	51	8:00-12:50 M-F	1:00-5:20 M-F	<u>Supplies</u> : Less than \$100 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Automation Engineer (AET) I & II	VEJ16A/B(year 1) VEJ17A/B(year 2)	4	8	62	Year One: 8:00-12:50 M-F	Year Two: 12:30-4:50 M-F	<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
CNA (in the spring); Medical Terminology (online in the fall) <i>One Year Program</i>	VEJ19 (CNA) VEJ62 (Med Term)	2.5	2.5	5	7:30-9:00 M-F	11:30-2:30 M-F	Per semester: <u>Supplies</u> : Less than \$100 <u>Lab Books</u> : Less than \$50
Construction Management (CMGT) I & II	VEJ63A/B(year 1) VEJ64A/B(year 2)	2	4	30		1:00-3:50 M-F	<u>Supplies</u> : Less than \$100 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Emergency Medical Responder <i>(one semester program)</i>	VEJ81	2	2	6	9:30-1:00 M & W	1:30-5:30 T & Th	<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approx. \$130 <u>Certification</u> : Approx. \$190
Fashion Merchandising & Design	VEJ79A/B(year 1) VEJ80A/B(year 2)	3	6	24	9:00-12:00 M & W or T & Th		<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approximately \$150 per semester
Hospitality & Culinary Arts (HMGY) I & II <i>Chef Apprenticeship</i>	VEJ65A/B(year 1) VEJ66A/B(year 2)	4	8	56		Various classes meet from 12:00-2:50 or 1:00-4:30 One day a week	<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Cybersecurity (IT) I & II	VEJ67A/B(year 1) VEJ68A/B(year 2)	2	4	60		1:00-2:50 M-F	<u>Supplies</u> : Less than \$100 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
*Drafting & Design Technology (DRAF) I & II	VEJ69A/B(year 1) VEJ70A/B(year 2)	4	8	42		12:00-2:50 M-F <i>Note: Classes are on Zoom</i>	<u>Supplies</u> : Less than \$100 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Heating, Ventilation & Air Conditioning (HVAC) I & II	VEJ71A/B(year 1) VEJ72A/B(year 2)	2	4	33		1:00-3:50 M-F	<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Electronics Technology (ELEC) I & II	VEJ73A/B(year 1) VEJ74A/B(year 2)	2	4	33	Year One: 9:00-11:50 M-F	Year Two: 1:00-3:50 M-F	<u>Supplies</u> : Less than \$200 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Electrical Technology (ELTE) I & II	VEJ75A/B(year 1) VEJ76A/B(year 2)	2	4	30	Cohorts: 2 = 12:00-2:50 3 = 3:00-5:50		<u>Supplies</u> : Less than \$250 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Plumbing Technology (PLUM) I & II	VEJ77A/B(year 1) VEJ78A/B(year 2)	2	4	30	8:30-10:50 M-TH	11:00-1:20 M-Th	<u>Supplies</u> : Less than \$100 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50
Welding I & II (MFAB) <i>Seniors Only</i>	VEJ12 VEJ13	2	4	32	8:00-12:50 M-F	12:00-4:50 M-F	<u>Supplies</u> : Purchase PPE \$600 <u>Textbooks</u> : Approximately \$150 per semester. <u>Lab Books</u> : Less than \$50

*The Drafting Program provides Zoom classes. Transportation is not needed. Your high school will assign you to a classroom.

Questions about the JCCC Career Ready Program? Please contact Dr. Cindy Swartz at cswartz@usd232.org

Kansas City Kansas Community College Technical Education Center (KCKCC TEC) – Excel in CTE – Application Only

Most programs offer free tuition. Program fees apply for textbooks/supplies - Payable to KCKCC TEC.
(Approximately \$87 per credit hour plus special course fees in chart below)

*KCKCC TEC Excel in CTE Program is open to juniors and seniors as a dual enrollment on the KCKCC TEC campus. Some programs require students to return to TEC as a full-time postsecondary student to finalize training. Some programs only require one year of training.
Check with your counselor to apply.*

Course Title	Course Code	HS Year Credit	HS Total Credit	College Total Credit	AM 7:30-10:30	PM 11:20-2:15	Fee (approx.)
Automotive Collision Repair I & II	VEK10A/B (year 1) VEK11A/B (year 2)	4	8	42	1 st Year	2 nd Year	\$75 per course
Automotive Technology I & II	VEK14A/B (year 1) VEK15A/B (year 2)	4	8	48	1 st Year	1 st Year & 2 nd Year	\$75 per course
*Construction Technology I & II	VEK20A/B (year 1) VEK21A/B (year 2)	2	4	48	1 st Year	2 nd Year	\$75 per course
*Culinary Arts I & II	VEK22A/B (year 1) VEK23A/B (year 2)	4	8	40	1 st Year / 2 nd Year Spring	1 st Year / 2 nd Year Fall	\$50-\$75 per course
Cybersecurity I & II	VEK24A/B (year 1) VEK25A/B (year 2)	2	4	28	1 st Year	2 nd Year	\$30-\$75 per course
*Electrical Technology I & II	VEK26A/B (year 1) VEK27A/B (year 2)	4	8	44	1 st Year & 2 nd Year	n/a	\$30-\$75 per course
*Heating & Refrigeration I & II	VEK28A/B (year 1) VEK29A/B (year 2)	4	8	44	1 st Year	2 nd Year	\$40-\$75 per course
Machine Technology I & II	VEK30A/B (year 1) VEK31A/B (year 2)	4	8	48	1 st Year	2 nd Year	\$75 per course
*CNA (SR Only)	VEK18 & VEK19	2	4	5	1 st Year	1 st Year	\$150
Multimedia/Video Production I & II	VEK32A/B (year 1) VEK33A/B (year 2)	2	4	30	1 st Year	2 nd Year	\$75 per course
Welding I & II	VEK12A/B (year 1) VEK13A/B (year 2)	4	8	40	1 st Year	2 nd Year	\$75 per course

*These programs are offered at the [Pioneer Career Center](#). Pioneer schedule: AM 8:00-11:00 / PM 11:45-2:45.

To search for more course details, please view the [Syllabi page](#) on the KCKCC website.

For more information about these programs, please contact Kim Klise at kklise@kckcc.edu, 913-288-7884, or contact the college...as various individuals to contact are listed on the [Career & Technical Education](#) page.

KCKCC-TEC STUDENT EXPECTATIONS

1. Attendance is vital for successful skill development. KCKCC policy states a student may be dropped after 5-10 absences in a semester depending upon the program requirements.
2. Attendance is expected at TEC whenever KCKCC is in session. This includes days when the home high school is not in session. There are no excused or unexcused absences at KCKCC.
3. Continuation of enrollment for the spring semester may be denied if the KCKCC grade point average drops below a 2.00 cumulative GPA or an unsatisfactory grade is earned in a required pre-requisite course.
4. Expectations of student behavior at TEC follow the policies outlined in the KCKCC Student Handbook. Failure to adhere to KCKCC policies may result in dismissal.

KCKCC-TEC STUDENT ENROLLMENT

High school sophomores and juniors enroll through their high school **before April 1st** to attend TEC during the following school year. **Please see your counselor to enroll.**