2021-2022 High School Course Catalog

Spectrum Academy Graduation Requirements

Subject	Credits Required
English	4.0
Mathematics	3.0
Science	3.0
Social Studies	3.0
Career & Technical Education	1.0
Digital Studies	.5
Financial Literacy	.5
Fine Arts	1.5
Physical Education	1.0
Fitness for Life	.5
Health	.5
Electives	5.5

24 Total Credits Required

Students may take more than what is required in any given area. Additional credits earned will count towards the student's electives. **Transition Planning** is not a state high school requirement, but rather a Spectrum Academy requirement. It is part of our charter and will count towards elective credits.

Spectrum's Transition Planning courses are designed to help students prepare to confidently transition smoothly from high school to adult life. It gives students guidance, hands on experiences, and teacher support to meet IEP goals, and graduation goals related to career planning and readiness, post high school education needs, and independent living skills. Each student will take this course each year they attend Spectrum. Each grade level will have a different class focus.

English (4.0 Credits Required to Graduate)

English 9 (Required)

The 9th grade language arts course connects reading instruction with writing for multiple purposes. The course continues intensive practice and study of informational and literary reading and writing. Students read extensively from a variety of sources, and draft, revise, and edit their own writing. Critical reading and analytical skill development will be emphasized, as well as essay structure and language awareness. (1.0 credit).

English 10 (Required)

This course explores topics relating to the English Common Core for the 10th grade as listed on the Common Core State Standards website: **http://www.corestandards.org/ELA-Literacy/.** In this course, students will learn writing strategies and organization and produce multiple samples in multiple formats. Students will work to develop the four language literacy skills: reading, writing, speaking, and listening (1.0 credit).

English 11 (Required)

Course explores topics relating to the English Common Core for the 11th grade as listed on the Common Core State Standards website: **http://www.corestandards.org/ELA-Literacy/.** In this course, students will gain some practical knowledge about the ACT test, specifically the grammar and reading portions, and different strategies for reading. They will learn writing strategies and organization and produce multiple samples in multiple formats. Students will work to develop the four language literacy skills: reading, writing, speaking, and listening (1.0 credit).

English 12 (Required)

This course explores topics relating to the English Common Core for the 12th grade as listed on the Common Core State Standards website: **http://www.corestandards.org/ELA-Literacy/.** In this course, students will gain practical knowledge about college level writing, and different strategies for reading. They will learn writing strategies and organization and produce multiple samples in multiple formats. Students will work to develop the four language literacy skills: reading, writing, speaking, and listening (1.0 credit).

Math (3.0 Credits Required to Graduate)

Secondary Math I (Required)
Grade 9
The objective is to understand and apply math skills necessary to prepare for Secondary Math II. Topics include sequences, linear and exponential functions, equations and inequalities, systems of equations and inequalities, transformations and symmetry, congruence, construction, and proof, connecting Algebra and Geometry, and modeling data (1.0 credit).

Secondary Math II (Required)
Grade 10
Focus is on quadratic expressions, equations, and functions and on comparing their characteristics and behavior to those of linear and exponential relationships from Secondary Mathematics I as organized into six critical areas, or units. The need for extending the set of rational numbers arises, and real and complex numbers are introduced so that all quadratic equations can be solved. The link between probability and data is explored through conditional probability and counting methods, including their use in making and evaluating decisions. The study of similarity leads to an understanding of right triangle trigonometry and connects to quadratics through Pythagorean relationships. Circles, with their quadratic algebraic representations, round out the course. 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 (1.0 credit).

Secondary Math III (Required)
Grade 11
This course will explore methods from probability and statistics to draw inferences and conclusions from data. They do this by first expanding their repertoire of functions to include polynomial, rational, and radical functions. They expand their study of right triangle trigonometry to include general triangles. They bring together all of their experience with functions and geometry to create models and solve contextual problems. The goal is that students experience mathematics as a coherent, useful, and logical subject that makes use of their ability to make sense of problem situations (1.0 credit).

Pre-Calculus
Grade 12
The course topics include college algebra, advanced trigonometry, and analytic geometry of two and three dimensions. Students experience a thorough analysis of all elementary functions and curve-sketching. Selected discrete mathematics topics including normal probability distributions, non-linear regression, and hypothesis testing are explored. Practice with proofs such as mathematical induction are included. Experience with graphing calculators is incorporated. Course also includes some Calculus topics (1.0 credit).

Mathematical Decision Making for Life
Grades 11-12
Course includes mathematical decision making in finance, modeling, probability and statistics & making choices. The four quarters of instruction are independent of each other, allowing students to enter and exit the course quarterly as needed. Students will make sense of authentic problems and persevere in solving them. They will reason abstractly and quantitatively while communicating mathematics to others. Students will use appropriate tools, including technology, to model mathematics. Students will use structure and regularity of reasoning to describe mathematical situations and solve problems (1.0 credit).

Science (3.0 Credits Required to Graduate)

Earth Science (Required)
Grade 9
This is a traditional class offering an in-depth understanding of our Earth's processes. We learn about our Earth's place in the Solar System, the Theory of Plate Tectonics, Freshwater Ecosystems, and Natural Hazards! Enjoy a rich array of insight into our complex world to prepare you for college in or outside of the science field (1.0 credit).

Biology (Required)
Grade 10
This course includes the topics of ecosystems, cells, heredity, organ systems, plants, animals, diversity, and evolution. This class will utilize dissections (1.0 credit).

Chemistry
Grades 11 & 12
This chemistry course includes the topics of atoms, energy, chemical bonds, chemical reactions, solutions, and includes multiple science labs. It is recommended that students successfully pass Secondary Math II before taking this course (1.0 credit).

Human Biology
Grades 11 & 12
This course is intended for students that have at least one high school credit in science. Topics include the general human body plan; structure and function of cells, tissues, and organs; organ systems of the human body; diseases (causes, cures, and prevention), human body chemistry; and the influence of fitness, nutrition, medical care, and ethnobiology on quality of human life (1.0 credit).

Environmental Science
Grades 11 & 12
Students in this course will learn about how energy transfers between organisms. Students will study the relationship between plants and animals and their surroundings. Three-dimensional, phenomenon-based teaching and the Utah Science and Engineering State Standards will guide students in their exploration of the world they live in (1.0 credit). **Unless another plan is in place, this is the 3rd year science course for students on the Applied track.**

Botany
Grades 10-12
This class explores the marvelous variety of plant life and their roles in ecosystems, history, and human societies. Students will participate in gardening projects and handle plant tissues. This course can count towards a 3rd year science credit (.50 credit).

Zoology
Grades 10-12
This class explores the tremendous diversity of animal life and their interactions with different animal species. This class will utilize dissections. This course can count towards a 3rd year science (.50 credit).

Social Studies (3.0 Credits Required to Graduate)

World History (Required)
Grade 10

This course combines World Geography and World Civilizations, to help students retain information and avoid redundancy between the two courses. It covers the history of the world from prehistory to the Cold War. Students will explore how different places shape the lives of the people who live there, including culture, religion, political and economic systems, and technology. They will learn how to think, read and write like historians using primary sources (1.0 credit).

US History II (Required)
Grade 11

This course covers the history of the United States from the Reconstruction to the War on Terror. Students will become more engaged citizens by exploring how historical events have shaped our nation. They will learn how to think, read and write like historians using primary sources (1.0 credit).

US Government (Required)
Grade 12

This course is the capstone social studies course that students take at Spectrum Academy. They will learn about the foundations of government and how government operates. Students will be required to write multiple papers and conduct research on a variety of governmental topics. **Students are required to pass the State Mandated Citizenship test to graduate** (.50 credit).

Mythology
Grades 11-12

Come and take part in a journey into the realm of mythology. Where heroes fight their greatest foes; mythical creatures roam free; and where gods and goddesses live among the people. These are the stories we will be looking at in this course. As long as man has been around these stories have been told to help people understand the world around them. On our journey we will seek to find the truth that lies behind these stories and the way that they have shaped society as we know it (.50 credit).

Career & Technical Education/CREATE
(1.0 Credit Required to Graduate)

Information Technology

Exploring Computer Science (Satisfies the Digital Studies requirement)
Grades 9-12

Exploring Computer Science is designed to introduce students to the breadth of the field of computer science through an exploration of engaging and accessible topics. The course focuses on the conceptual ideas of computing and helps students understand why certain tools or languages might be utilized to solve particular problems. The goal of Exploring Computer Science is to develop in students the computational thinking practices of algorithm development, problem solving, and programming within the context of problems that are relevant to the lives of today's students. Students will also be introduced to topics such as artificial intelligence, web development, programming, and physical computing (.50 credit).

Digital Graphic Arts Intro
Grades 9-12

This course is designed to provide students with the basic knowledge and skills related to the graphic design industry. It is intended to serve as a starting point for several pathways including Digital Media, Graphics and Printing, 3D Animation and Game Development. This includes instruction and hands-on assignments in the following areas: creative design & layout, typography, color, related software, and computer and professional skills (.50 credit).

Introduction to Information Technology
Grades 9-12
Prerequisite: Digital Literacy (8th grade requirement)

The Intro to IT course is for students interested in pursuing a career in the field of Information Technology. Students will be introduced to the different aspects of information technology to determine their interests. Students will complete assignments and projects in IT careers, digital media, hardware & operating systems, communications & networks, software development, databases, and new & emerging technologies (.50 credit).

Game Development Fundamentals 1
Grades 9-12

This course is designed to provide students with knowledge and project based experience of fundamental gaming development concepts relating to STEM. These concepts include game design, scripting, creation of digital assets, graphic resources, animations,understanding hardware, problem solving, critical thinking, collaboration, and project management (.50 credit).

Game Development Fundamentals 2
Grades 9-12
Prerequisite: Game Development Fundamentals 1

This course is designed to provide students with knowledge and project-based experience of fundamental gaming development concepts relating to STEM. These concepts include game design, scripting, creation of digital assets, graphic resources, animations, understanding hardware, problem solving, critical thinking, collaboration, and project management (.50 credit).

Web Development 1 (Satisfies the Digital Studies requirement)

Grades 9-12

Web Development 1 is a course designed to guide students in a project-based environment, in the development of up-to-date concepts and skills that are used in the development of today's websites. Students will learn the fundamentals of how the Internet works. They will learn and use the basic building blocks of the World Wide Web: HTML5 coding, Cascading Style Sheets (CSS), and JavaScript. They will follow the steps to create a website by planning, designing, developing, deploying, and maintaining of website projects. Students will learn and use different scripting technologies to create more dynamic and interactive websites. They will learn what it takes for a career in web development as they complete projects and create their own website(s) (.50 credit).

Web Development 2

Grades 9-12

Prerequisite: Web Development 1

Web Development 2 is a course designed to guide students in a project-based environment in the development of up-to-date concepts and skills that are used in the development of today's websites. Students will learn the fundamentals of how the Internet works. They will learn and use the basic building blocks of the World Wide Web: HTML5 coding, Cascading Style Sheets (CSS), and JavaScript. They follow the steps to create a website by planning, designing, developing, deploying, and maintaining of the website projects. Students will learn and use different scripting technologies to create more dynamic and interactive websites. They will learn what it takes for a career in web development as they complete projects and create their own website (.50 credit).

Web Development Capstone

Grades 10-12

Prerequisite: Web Development 1 & 2

Web Development is a course designed to guide students in a project-based environment in the development of up-to-date concepts and skills that are used in the development of today's websites. Some concepts for discovery and mastery include: Frontend (HTML5, CSS3, Bootstrap, JavaScript, jQuery, jQuery mobile), Foundation paradigms (OOPS, Design Patterns, Object Modelling, JSON, AJAX), MEAN Stack (MongoDB, Express Framework, AngularJS, Node.js) Data Exchange (HTTP, Websockets), Development Environment & Tools, DISHA (Resume & Interview prep package) (1.0 credit).

Computer Programming 1 (Satisfies the Digital Studies requirement)

Grades 9-12

Prerequisite: Digital Literacy (8th grade requirement)

An introductory course in program engineering and applications. The course introduces students to the fundamentals of computer programming. Students will learn to design, code, and test their own programs while applying mathematical concepts. Teachers introduce coding concepts and problem-solving skills to beginning students through a programming language such as C++, C#, Java, Python, or JavaScript. Students will also be introduced to more complex data structures and their uses, including arrays and classes. Students will learn to create more powerful programs (.50 credit).

Computer Programming 2
Grades 9-12
Prerequisite: Digital Literacy & Computer Programming 1
This course reviews (Strands 1-6) and builds on the concepts introduced in Computer Programming 1. Beginning in Strand 4, and then Strands 7-10, this course introduces students to more complex data structures and their uses, including sequential files, arrays, and classes. Students will learn to create more powerful programs within a specific programming language: Java, Python, C++, C#, Swift. (.50 credit).

Advanced Computer Programming
Grades 10-12
Prerequisites: Computer Programming 1 & 2
This is an advanced course in computer programming/software engineering and applications. It reviews and builds on the concepts introduced in Computer Programming 1 & 2. It introduces students to dynamic data structures, advanced utilization of classes, and applications of recursion through the application of mathematical concepts. This course will also highlight the differences between the many different languages of computer programming (1.0 credit).

Algorithms & Data Structures
Grades 10-12
Prerequisites: Computer Programming 1 & 2
This course builds on the object-oriented programming principles taught in Computer Programming 1, 2, and 3. A solid understanding of these concepts is assumed and required in this course. This course presents the ideas, tools, structure, syntax, libraries and object-oriented design techniques for developing well-formed programs using data structures. Students study and strengthen their concepts such as problem solving, program structure, classes, methods, data types, control constructs, file and console I/O. Students will also learn other important principles in designing object-oriented programs containing data structures. Students will design and use common data structures including arrays, hash tables, stacks, queues, linked lists, binary trees, multiway trees, graphs. Students will define and use common algorithms including traversals, searching, sorting, compression and paths. Students will write several programs that demonstrate their understanding of these concepts using an appropriate programming language including: C++, C#, Java, Python, and Swift (1.0 credit).

Family & Consumer Sciences

Food & Nutrition 1
Grades 9-12
This course is the foundational course in the Culinary Arts Pathway. Experiences will include food safety and sanitation, culinary techniques, food selection, and basic nutrition with a focus on career readiness. Student leadership and competitive events (FCCLA) may be integrated into this course (.50 credit).

Food & Nutrition 2
Grades 9-12
Prerequisite: Food & Nutrition 1
This course is designed to focus on principles of food preparation, sports nutrition, consumerism, and career options in the food industry. The study and application of nutrition, sanitation, food sciences and technology in this course provides students with laboratory-based experiences that will strengthen their comprehension of concepts and standards outlined in Science, Technology, Engineering and Math (STEM) education. FCCLA may be an integral part of this course (.50 credit).

Culinary 1
Grades 9-12
Prerequisite: Food & Nutrition 1
This course is the second step in the Culinary Arts Pathway. Experiences will highlight food safety and sanitation, careers, introduce knife skills and cooking techniques, and basic culinary skills related to stocks, sauces, and yeast breads. There will be a focus on career readiness. Student leadership and competitive events (FCCLA) may be integrated into this course (.50 credit).

Culinary 2
Grades 10-12
Prerequisites: Foods 1 & Culinary 1
This course will train students for career opportunities in the food service/culinary arts industry. Safety and sanitation procedures will be implemented and practiced, as well as knowledge of use and care of commercial food service equipment. Quantity food preparation will be explored as it relates to catering, bakery, restaurant, hospitality, and quick service business operations. Student leadership and competitive events (FCCLA) may be integrated into this course (1.0 credit).

Culinary 3
Grades 11-12
Prerequisites: Foods 1 & Culinary 1
This course will train students for career opportunities in the food service/culinary arts industry. Safety and sanitation procedures will be implemented and practiced, as well as knowledge of use and care of commercial food service equipment. Quantity food preparation will be explored as it relates to catering, bakery, restaurant, hospitality, and quick service business operations. Student leadership and competitive events (FCCLA) may be integrated into this course (1.0 credit).

Baking & Pastry
Grades 11 & 12
Prerequisites: Culinary 1 & 2
This course introduces Culinary Arts students to another aspect of the Culinary Arts industry, baking and pastry. Students will gain experience with baking terminology, equipment, formula conversions, and practice methods for creating yeast breads, pastries, fillings, cakes, and cookie production. Students will also have the opportunity to practice industry workplace skills, food safety and understand the opportunities for careers within the baking and pastry industry (.50 credit).

Food Science
Grades 10-12
Prerequisites: Foods 1 & 2
This course teaches scientific principles and how those principles can be applied to improve the health of individuals and families. Instruction is given concerning the physical, microbiological, and chemical principles that affect the food we eat. This course will strengthen comprehension of concepts and standards outlined in Sciences, Technology, Engineering and Math (STEM) education. Student leadership (FCCLA) may be an integral part of the course (.50 credit).

Foundations of Nutrition
Grades 11 & 12
This course is an introduction to the science of nutrition and the relationship of food intake and health. Nutrient requirements and food selection to meet those requirements are discussed. Students evaluate their own food intake, eating behaviors; learn to be informed consumers of food and nutritional information in our modern environment. Provide students with critical human life and nutrition information that will expand their understanding of science and also be personally applicable to their daily and life-long health and well-being in the modern environment through applied assessments, exams, and discussions. It will also serve as the foundation course for subsequent course work in the area of nutrition and **satisfy a life science general education course requirement**. This course will strengthen comprehension of concepts and standards outlined in Sciences, Technology, Engineering and Math (STEM) education. Student leadership and competitive events (FCCLA) may be integrated into this course (1.0 credit).

Human Development
Grades 11 & 12
Human Development introduces the developmental stages of individuals across the lifespan. Students will study biological, cognitive, and social/emotional developmental changes of the individual in the context of the family and society. It emphasizes and demonstrates the vital connections between theory, research, and application. This can be offered as a concurrent enrollment course. Student leadership and competitive events (FCCLA) may be integrated into this course (.50 credit).

Yearbook
Grades 10-12
In this course students will gain skills in one or more of the following areas: page design, advanced publishing techniques, copy-writing, editing and photography while producing a creative, innovative yearbook which records school memories and events. There is an emphasis on journalism skills in this class! Participants gain useful, real world skills in time management, marketing, teamwork, and design principles. Most of all, we have fun and learn responsibility. Yearbook teacher approval required (1.0 credit).

Construction/Manufacturing

Robotics 1
Grades 9-12
The first in a sequence of courses that prepares individuals with a lab-based, hands-on curriculum combining electrical, mechanical and engineering principles. Students will learn to design, build, program, and control robotic devices. A rigorous study and application of electrical concepts will include: sources of energy, electrical safety, use and identification of basic electronic components, sensors and actuators. Engineering concepts will include: mechanical design, prototype development, design testing, programming, and proper engineer documentation (.50 credit).

Engineering Technology
Grades 9-10
A foundational engineering design course that introduces basic problem-solving and documentation skills. Various aspects of engineering will be explored along with technology's environmental, societal, political, and economic impacts on our world. By utilizing problem-solving skills, students will develop essential abilities and attitudes that will in turn expand their occupational opportunities in the world of engineering (.50 credit).

Manufacturing Technology
Grades 9-10
An introductory course focused on the world of manufacturing technology. Students will gain an understanding of how manufacturing technologies impact politics, the environment, society, and the economy. Students will develop a foundation in essential abilities and attitudes that will in turn expand their occupational opportunities in the manufacturing world (.50 credit).

CAD Mechanical Design 1
Grades 10-12
The first in a sequence of courses that prepares individuals to develop technical knowledge and skills required to plan and prepare scale pictorial interpretations and technical documentation of engineering and design concepts. This includes instruction in the use of 2D Computer-Aided Design (CAD) software, sketching, drawing layout, geometric construction, orthographic projection, and dimensioning (.50 credit).

CAD Mechanical Design 2
Grades 10-12
Prerequisite: CAD Mechanical Design 1
The second in a sequence of courses that prepares individuals with an emphasis in developing technical knowledge and skills to develop 3D models in support of mechanical and industrial engineers, and related professionals. This includes instruction in the use of 3D Computer-Aided Design (CAD) software, model creation, and technical communication (.50 credit).

CAD Mechanical Design 3
Grades 11-12
Prerequisites: CAD Mechanical Design 1 & 2
The third in a sequence of courses that prepares individuals with an emphasis in developing technical knowledge and skills to develop working drawings in support of mechanical and industrial engineers, and related professionals. This includes instruction in the use of 3D Computer-Aided Design (CAD) software, threads & fasteners, welding symbols, geometric dimensioning & tolerancing, and assemblies (.50 credit).

Woods 1

Grades 10-12

The first in a sequence of courses that prepares individuals to apply technical knowledge and skills to lay-out, shape, assemble, and finish projects. Value is placed on developing craftsmanship, a production sense, and in design principles. This course emphasizes the safe use of a variety of hand tools, power tools, and machinery (.50 credit).

Woods 2

Grades 10-12

Prerequisite: Woods 1

The second in a sequence of courses that prepares individuals to apply technical knowledge and skills to lay-out, shape, assemble, and finish projects. Value is placed on developing craftsmanship, a production sense, and in design principles. This course emphasizes the development of production principles in a manufacturing environment (.50 credit).

CTE Internships

Grades 11 & 12

CTE Internships provide on the job training opportunities that are directly related to a career goal and course of study identified through the College and Career Ready Plan or IEP Transition Plan. This Work-Based Learning experience is designed to bridge the gap between school and work. There is an eligibility process that ideally is completed with the CTE Internships teacher in the previous school year. The first quarter is in-classroom learning for 1 class period. The 2nd quarter is when students will begin their Internship, which will likely be done over multiple class periods.

Fine Arts (1.50 Credit Required to Graduate)

Art Foundations 1
Grades 9-12
This course is an entry-level course for the High School Visual Arts Core Curriculum. It is designed to provide an overview and introduction to Visual Arts through studying a variety of art tools and materials. With an emphasis on studio production, this course is designed to develop higher-level thinking, art related technology skills, art criticism, art history, and aesthetics (.50 credit).

Art Foundations 2
Grades 9-12
Prerequisite: Art Foundations 1
This course is more advanced and designed to go a little deeper than Art Foundations 2. Students in this course will be held to a higher standard than Art 1 (.50 credit).

3D Design
Grades 10-12
This course provides an overview and introduction to fine crafts, their media, and the cultures they represent. With an emphasis on studio production, this course is designed to develop higher level thinking, art-related technology skill, art criticism, art history, and aesthetics. Lessons may include: book making, furniture design, jewelry making, paper mache, found object sculpture, installations, as well as traditional sculpture such as clay and plaster (.50 credit).

Art History
Grades 9-12
A course that surveys great works of art, artists, and art historical movements from prehistory to the present. (.50 credit).

Basic Digital Photography
Grades 10-12
This course is an introduction to the field of commercial photography. This course will cover many basic concepts, including but not limited to: purchasing a digital camera, image capture, image editing, and image output. This course will also feature Adobe Photoshop, its features and uses. These concepts will enable the student to be more knowledgeable and prepared to enter the field of commercial photography. If available, students are advised to continue on with the Advanced Commercial Photography course (.50 credit).

Fabric Arts
Grades 9-12
Learning classic folk art techniques with cloth such as dying, weaving, embroidery, quilting, breading, crochet, etc. with a new modern day twist (.50 credit).

Film Appreciation
Grades 9-12
Students will learn to see film as an artform! As well as watching a variety of fantastic films, they will build the tools and vocabulary to create meaningful classroom discussions and express effective criticism (.50 credit).

Jewelry Making
Grades 9-12
Students are taught basic jewelry making skills such as beading, weaving, and wirework. With an emphasis on studio production, this course is designed to develop higher-level thinking, art-related technology skill, art criticism, art history, and aesthetics. Students will assemble and create jewelry in a variety of media, and will understand evaluating and critiquing jewelry (.50 credit).

Ceramics
Grades 9-12
Prerequisite: Art Foundations 1
Students will be learning a variety of hand-building techniques to create both functional and decorative pottery. Students will learn how to safely use tools and materials to create, analyze, and critique ceramic forms. Some lessons will include: pinch pot, coil pots, slab construction, glazing, creating texture, making handles, and surface decoration (.50 credit).

Drawing
Grades 10-12
Prerequisite: Art Foundations 1
Study of the basic elements of art and techniques of drawing. Perspective, still life, landscape, animal and other subjects will be taught. A variety of mixed media such as graphic pencils, colored pencils, pen and ink, pastels and other drawing media will be used (.50 credit).

Painting
Grades 10-12
Prerequisite: Art Foundations 1
Painting is an advanced high school art course designed to help students develop skills in applying art concepts with several painting media such as watercolor and tempera paint. Students develop perceptual skills, graphic skills, and skills of observing and evaluating works of art. Students develop compositional skills by learning and applying visual concepts that apply to color (.50 credit).

Print Making
Grades 9-12
Prerequisite: Art Foundations 1
In this course, students will learn how to safely use tools and materials to create, analyze and critique fine art prints. Students will be learning a variety of printmaking techniques as well as some simple book forms to assemble and display prints. Lessons will include: linoleum block, wood cuts, mono printing, collograph, etching, typesetting, stencil creation and use, and screen printing (.50 credit).

Honors Art
Grades 11 & 12
Prerequisites: Art Foundations 1 & 2 and 1 Studio Art Class
This is a higher-level art course that students can take in their junior or senior year if they have completed both Art Foundations 1 & 2 plus at least 1 studio art class. Course will be more individualized in instruction and participation (.50 credit).

Dance (Ballet West)
Grades 9-12
Builds skills in dance technique, improvisation, and composition. In this section, Ballet West teaches dances to the students (.50 - 1.0 credit).

Dance
Grades 9-12
Builds skills in dance technique, improvisation, and composition (.50 - 1.0 credit).

Modified Dance
Grades 9-12
Modified version of dance class for students in functional skills and/or students with more limited physical abilities (.50 - 1.0 credit).

Physical Education & Health (2.0 Credits Required to Graduate)

Physical Education
Grades 9-12
This course is designed to develop skills and techniques in a variety of team and individual sports as well as improvement in personal fitness (.50 credit).

Fitness for Life (Required)
Grades 10-12
This course is an individualized, concept-based, semester course designed to give students the knowledge and skills necessary to self-assess, create, conduct, evaluate, and redesign personal fitness program. The course is a combination of classroom and activity-based learning activities with a focus on proper nutrition and the mastery of skills and concepts necessary to be able to monitor personal lifetime fitness (.50 credit).

Weightlifting
Grades 11 & 12
Weight lifting allows students to get stronger by using machines or free weights/ dumbbells, and strengthening their core through ab exercises. Students are taught the proper way to lift weights (using correct form) and how to spot (support) someone to keep them safe while they are lifting weights. Students are also taught about basic nutrition to help them maximize their workouts. **Course may be counted for .5 of physical education graduation requirement** (.50 credit).

Dance (Ballet West)
Grades 9-12
Builds skills in dance technique, improvisation, and composition. In this section, Ballet West teaches dances to the students. **Course may be counted for .5 of physical education graduation requirement** (.50 credit).

Dance
Grades 9-12
Builds skills in dance technique, improvisation, and composition. **Course may be counted for .5 of physical education graduation requirement** (.50 credit).

Modified Dance
Grades 9-12
Modified version of dance class for students in functional skills and/or students with more limited physical abilities. **Course may be counted for .5 of physical education graduation requirement** (.50 credit).

Yoga
Grades 9-12
Yoga seeks to unite your physical, mental, and spiritual self. Students will be working with the body through poses, breathing, and relaxation. Yoga can be viewed as a course in fitness training, sports therapy, lifestyle enrichment, and stress reduction (.50 credit).

Health Education 2 (Required)
Grades 10-12
This course provides opportunities for students to develop knowledge, skills, and attitudes necessary for practicing lifelong, health-enhancing behaviors (.50 credit).

Financial Literacy (.50 Credit Required to Graduate)

General Financial Literacy (Required)
Grades 11 & 12
The General Financial Literacy course for juniors and seniors encompasses standards that are essential to the development of basic financial literacy. Students will gain the information and skills to implement a life-long plan for financial success (.50 credit).

Elective Options

Study Hall
Grades 9-12
Provides students with a structured, scheduled academic environment providing the opportunity to complete assignments and access school resources. Students are required to adhere to behavioral and academic expectations in order to earn credit. This is also the course where we provide packets for free credit recovery (.5-1.0 credit).

Teacher Aide
Grades 10-12
Students will work with an individual teacher to help with classroom tasks. If teacher has no tasks on a given day, student must have homework to work on or a book to read. Teacher permission is required. **Please see counselor for more information.**

Davis Technology College (DTC)
Grades 11 & 12
DTC offers a variety of programs for students to experience outside of Spectrum. These are college-level programs that end in certification. All programs offered to our students are on the DTC campus in Kaysville. **Application process is required to participate.** They are available in the front office, as well as DTC fliers with all programs listed. **Please see counselor for more information.**

Seminary
Grades 9-12
This is considered a Released Time class period for students to attend LDS seminary at the church building just west of Spectrum's elementary building. Students meet in the wolf's den when it's their class period to attend seminary, then walk over together. **This is a no credit course.**

CTE Pathways at Spectrum Academy NSL:

Culinary Arts

Food Science, Dietetics & Nutrition

Manufacturing & Production

Mechanical Design (CAD)

Programming & Software Development

Web Development

Culinary Arts

JUNIOR HIGH / MIDDLE SCHOOL		
College and Career Awareness		
FCS 6th Grade		
FCS Exploration		
HIGH SCHOOL		
SUPPORTING COURSES: Suggested high school courses that support the Career Pathway (Courses DO NOT count towards the Pathway)		
Entrepreneurship *	Event Planning and Management	Hospitality and Tourism *
EXPLORER COURSES: Choose one or more of the following courses.		
Customer Service *		
Food and Nutrition 1		
Culinary 1 * +	ProStart® 1 +	
CONCENTRATOR COURSES: To be a concentrator you must pass one of the following courses AND one explorer course.		
Culinary 2	ProStart® 2	
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.		
Culinary 3		
Baking and Pastry		
CTE Internship		
POSTSECONDARY:		
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)		UtahMajors.org: Majors Guide

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING

There are several options for education and training beyond high school, depending on your career goals.

	1-2 Year Certificate	2-Year Associate Degree	4-Year Bachelor's Degree
COLLEGE 1, 2, 4 or more	N/A	> Baker/Pastry Chef > Sous Chef > Restaurant Manager	> CTE Teacher > Culinary Arts Instructor > Executive Chef

Courses offered at Spectrum in this pathway:

- Food & Nutrition 1 (.5 credit)
- Culinary 1 (1.0 credit)
- Culinary 2, previously known as Culinary Management (1.0 credit)
- Culinary 3
- Baking and Pastry (.5 credit)
- CTE Internship (.5 credit)

Food Science, Dietetics & Nutrition

JUNIOR HIGH / MIDDLE SCHOOL	
College and Career Awareness	
FCS 6th Grade	
FCS Exploration	
HIGH SCHOOL	
EXPLORER COURSES: Choose one or more of the following courses.	
Food and Nutrition 1 +	
Human Development *	
Medical Anatomy and Physiology *	
CONCENTRATOR COURSES: To be a concentrator you must pass the following course AND one explorer course.	
Food and Nutrition 2	
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.	
Dietetics **(Course under development. Available SY 2022-2023.)**	
Food Science	
Foundations of Nutrition *	
CTE Internship	
POSTSECONDARY:	
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)	UtahMajors.org: Majors Guide

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING

There are several options for education and training beyond high school, depending on your career goals.

	1-2 Year Certificate	2-Year Associate Degree	4-Year Bachelor's Degree
COLLEGE 24 or more	> Food Protections Manager > Food Inspector Assistant > Food Sanitation Coordinator	> Research and Development Technician	> CTE Teacher > Dietitian/Nutritionist > Food Scientist

Courses offered at Spectrum in this pathway:

- Food and Nutrition 1 (.5 credit)
- Human Development (.5 credit)
- Food and Nutrition 2 (.5 credit)
- Food Science (.5 credit)
- Foundations of Nutrition (1.0 credit)

Manufacturing & Production

JUNIOR HIGH / MIDDLE SCHOOL			
College and Career Awareness			
Exploring Technology			
HIGH SCHOOL			
SUPPORTING COURSES: Suggested high school course that supports the Career Pathway (Course DOES NOT count towards the Pathway)			
Secondary Math 2			
EXPLORER COURSES: Choose one or more of the following courses.			
CAD Mechanical Design 1 *	Composites 1 +	Plastics 1 +	Manufacturing Technology
CAM Automated Manufacturing	Manufacturing Principles 1	Woods 1 +	
CONCENTRATOR COURSES: To be a concentrator you must pass one of the following courses AND one explorer course.			
Composites 2			
Plastics 2			
Woods 2			
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.			
Woods 3			
CTE Internship			
POSTSECONDARY:			
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)		UtahMajors.org: Majors Guide	

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING There are several options for education and training beyond high school, depending on your career goals.			
COLLEGE 24 or more	1-2 Year Certificate	2-Year Associate Degree	4-Year Bachelor's Degree
	> Production Technician	N/A	> CTE Teacher > Manufacturing Engineer

Courses offered at Spectrum in this pathway:

- CAD Mechanical Design 1 (.5 credit)
- Manufacturing Technology (.5 credit)
- Woods 1 (.5 credit)
- Woods 2 (.5 credit)
- Woods 3, available 2022-2023 school year (.5 credit)
- CTE Internship (.5 credit)
-

Mechanical Design (CAD)

JUNIOR HIGH / MIDDLE SCHOOL		
College and Career Awareness		
Exploring Technology		
HIGH SCHOOL		
SUPPORTING COURSES: Suggested high school courses that support the Career Pathway (Courses DO NOT count towards the Pathway)		
Secondary Math 2		
EXPLORER COURSES: Choose one or more of the following courses.		
CAD Mechanical Design 1 * +	Engineering Technology	Plastics 1
CAM Automated Manufacturing	Machining 1 *	Welding Technician, Entry Level *
Composites 1	Metalworking 1	Woods 1
CONCENTRATOR COURSES: To be a concentrator you must pass the following course AND one explorer course.		
CAD Mechanical Design 2 *		
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.		
CAD Mechanical Design 3 *		
CTE Internship		
POSTSECONDARY:		
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)	UtahMajors.org: Majors Guide	

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING

There are several options for education and training beyond high school, depending on your career goals.

	1-2 Year Certificate	2-Year Associate Degree	4-Year Bachelor's Degree
COLLEGE 1 2 4 or more	N/A	> Engineering Technician > Mechanical Drafter > Mechanical Engineering Technician	> Aerospace Engineer > CTE Teacher > Civil Engineer > Industrial Designer

Courses offered at Spectrum in this pathway:

- CAD Mechanical Design 1 (.5 credit)
- Engineering Technology (.5 credit)
- Woods 1 (.5 credit)
- CAD Mechanical Design 2 (.5 credit)
- CAD Mechanical Design 3 (.5 credit)
- CTE Internship (.5 credit)
-

Programming & Software Development

JUNIOR HIGH / MIDDLE SCHOOL		
College and Career Awareness		
Computer Science Investigations	Python 1, Intro	
Creative Coding	Python 2, Intro	
Digital Literacy		
HIGH SCHOOL		
SUPPORTING COURSES: Suggested high school courses that support the Career Pathway (Courses DO NOT count towards the Pathway)		
Leadership Principles 1 *	Physics	Secondary Math 3
Math 1050	Secondary Math 2	
EXPLORER COURSES: Choose one or more of the following courses.		
AP Computer Science Principles	Robotics 1	Robotics Technology
Computer Programming 1 *	Database Development *	Game Development Fundamentals 1
Computer Science Principles *	Exploring Computer Science	Information Technology, Intro
CONCENTRATOR COURSES: To be a concentrator you must pass one of the following courses AND one explorer course.		
Computer Programming 2 *	Game Development Fundamentals 2	Mobile Development Fundamentals
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.		
AP Computer Science	Algorithms and Data Structures *	Computer Programming, Advanced *
CTE Internship		
POSTSECONDARY:		
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)		UtahMajors.org: Majors Guide

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING

There are several options for education and training beyond high school, depending on your career goals.

	1-2 Year Certificate	2-Year Associate Degree	4-Year Bachelor's Degree
	N/A	> Web Developer	> CTE Teacher > Computer Programmer > Computer Systems Analyst

Courses offered at Spectrum in this pathway:

- Robotics 1 (.5 credit)
- Computer Programming 1 (.5 credit)
- Exploring Computer Science (.5 credit)
- Game Development Fundamentals 1 (.5 credit)
- Computer Programming 2 (.5 credit)
- Advanced computer Programming (.5 credit)
- CTE Internship (.5 credit)

Courses not being offered next year but have been offered in either the 2019/2020 or 2020/2021 school years: Database Development, Intro to Information Technology, AP Computer Science Principles, Algorithms and Data Structures.

Web Development

JUNIOR HIGH / MIDDLE SCHOOL			
College and Career Awareness			
Computer Science Investigations		Creative Coding	
SUPPORTING COURSES: Suggested high school courses that support the Career Pathway (Courses DO NOT count towards the Pathway)			
Leadership Principles 1 *	Secondary Math 2	World Civilization	
Math 1050	Secondary Math 3	World Geography	
EXPLORER COURSES: Choose one or more of the following courses.			
Computer Science Principles 1 *	Digital Graphic Arts Intro *	Exploring Computer Science	Web Development 1 *
Database Development *	Entrepreneurship *	Information Technology, Intro *	
CONCENTRATOR COURSES: To be a concentrator you must pass one of the following courses AND one explorer course.			
HTML 5 Application Development Fundamentals *			
Web Development 2			
COMPLETER COURSES: To be a completer you must pass enough courses to earn 3.0 credits in this Pathway.			
UX/UI **(Course under development. Available SY 2022-2023.)**			
Web Development Capstone			
CTE Internship			
POSTSECONDARY:			
Utah System of Higher Education: ushe.edu (Utah's public colleges and universities)		UtahMajors.org: Majors Guide	

*** concurrent enrollment course + recommended explorer course**

HIGH SCHOOL TO POSTSECONDARY EDUCATION AND TRAINING There are several options for education and training beyond high school, depending on your career goals.			
COLLEGE 1 2 4 or more	**1-2 Year Certificate**	**2-Year Associate Degree**	**4-Year Bachelor's Degree**
	N/A	> Web Developer	> CTE Teacher > Computer and Information Systems Manager > Computer Programmer > Database Administrator

Courses offered at Spectrum in this pathway:

- Exploring Computer Science (.5 credit)
- Web Development 1 (.5 credit)
- Web Development 2 (.5 credit)
- Web Development Capstone (1.0 credit)
- CTE Internship (.5 credit)

Courses not being offered next year but have been offered in either the 2019/2020 or 2020/2021 school years: Digital Graphic Arts Intro, Database Development, Entrepreneurship, Intro to Information Technology.