CAREER & TECHNICAL EDUCATION

Course Offering	Gr. 9	Gr. 10	Gr. 11	Gr. 12	Grading Level
Business					
Accounting I*	X	X	X	X	I
Accounting II		X	X	X	II
Accounting III			X	X	II
Honors Accounting IV				X	III
Business Applications I	X	X	X	X	I
Business Applications II		X	X	X	II
Business Applications III			X	X	II
Marketing Education I*		X	X	X	II
Marketing Education II			X	X	II
Personal Financial Literacy*	X	X	X	X	I
Clothing Construction					
Clothing Construction I	X	X	X	X	II
Clothing Construction II		X	X	X	II
Clothing Construction III			X	X	II
Clothing Construction IV				X	II
Computers					
Video Game Design & Programming I	X	X	X	X	I
Video Game Design & Programming II		X	X	X	II
Construction					
Woodworking I	X	X	X	X	II
Woodworking II		X	X	X	II
Woodworking III			X	X	II
Woodworking IV				X	II
Culinary Arts					
Culinary Arts I	X	X	X	X	II
Culinary Arts II		X	X	X	II
Culinary Arts III			X	X	II
Cultural Foods		X	X	X	II

Students interested in a career in the Culinary Arts should take the following sequence of courses: Culinary Arts I, Culinary Arts II and Culinary Arts III. (Interested students are also encouraged to take Cultural Foods after completing Culinary Arts I)

CAREER & TECHNICAL EDUCATION
(continued)

Course Offerings	Gr. 9	Gr. 10	Gr. 11	Gr. 12	Grading Level
Education					
Life Skills & Relationships*	X	X	X	X	II
Child Development		X	X	X	II
Adv. Child Development			X	X	II
Engineering & Technology					
Computer Aided Drafting I (CAD I)	X	X	X	X	II
Computer Aided Drafting II (CAD II)		X	X	X	II
Robotics I	X	X	X	X	II
Robotics II		X	X	X	II
Honors Architecture I			X	X	III
Honors Architecture II				X	III
Honors Engineering I			X	X	III
Honors Engineering II				X	III
Technology I	X	X	X	X	II
Technology II		X	X	X	II
Technology III			X	X	II
Media					
Media Technology I	X	X	X	X	II
Media Technology II		X	X	X	II
Broadcast News Production			X	X	II
Entertainment Media			X	X	II
Television & Video Production				X	II
Journalism	X	X	X	X	II
Journalism Lab		X	X	X	II

All Career & Technical Education courses meet the state requirement for 21st Century Life & Careers or Career and Technical Education
*These courses meet the state requirement for financial, economic, business, and entrepreneurial literacy.
Please see course listings for required pre-requisites.

All courses are designed to meet the NJ Core Curriculum Content Standards for Career and Technical Education and applicable Common Core State Standards

Accounting I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

Students will receive an overview of how to keep business financial records, as well as personal financial records. Accounting I includes the use of journals, ledgers, worksheets, and financial statements. Practice sets will give students the opportunity to apply what they have learned in class. In addition, students will have hands on experience with the computer software programs *Automated Accounting* and *Excel*. Accounting I also focuses on Personal Financial Literacy skills that are so essential to all citizens. Some of the topics that will be investigated include: saving and investing, planning for retirement, managing credit, identity theft and consumer fraud. Students who complete Accounting I will fulfill the 2.5 credit Personal Financial Literacy requirements for graduation. Accounting I is strongly recommended for any student, especially those planning to major in business in college or manage a business.

Accounting II

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Accounting I

Accounting II is a continuation of Accounting I. It provides students with advanced accounting study and will emphasize the use of an automated system using the accounting computer applications *Automated Accounting and Excel*. Accounting II students will complete several computerized business simulations. Instruction will include accounting for corporations, as well as tax form preparation and the analysis of business financial statements. This advanced course is recommended for any student who is planning to major in business in college, as well as anyone planning to own or manage a business.
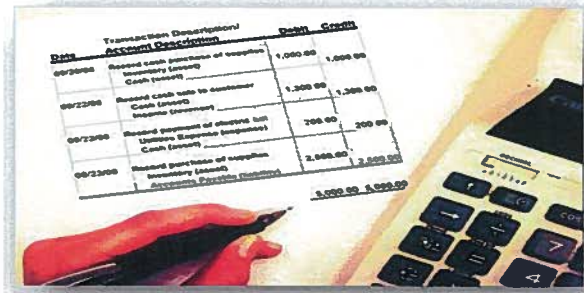
Accounting III

Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Accounting II

Completion of this course will prepare students for any business-related college major. Completion will also help students secure an entry-level position in a business using accounting skills. Accounting III provides a review of fundamental accounting principles and covers the more complex mechanics of accounting including departmentalized accounting, accounting adjustments and valuation along with corporate and management accounting. Students will complete an automated simulation for a departmentalized business organized as a corporation. Exposure to real-world business scenarios and their possible economic implications are a part of this course.

Honors Accounting IV

Length: Year   Credits: 5
Grade Level: 12
Pre-requisite: Accounting III

This course is the last in the accounting sequence. It prepares students for college courses in business-related areas and can assist them in securing an entry level business position through the accounting skills required. There is a great deal of independent and group learning that focuses on problem solving and requires critical thinking. This course will focus on corporate, management and manufacturing cost accounting. Students will use Automated Accounting to complete simulated accounting scenarios. Discussions centered on current real world business happenings and their potential impact to organizations will be a part of the course.

Personal Financial Literacy

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This course will teach students how to apply reliable information and systematic decision making to personal financial decisions. Students will learn how to use a career plan to develop personal income potential, organize personal finances, use a budget to manage cash flow, and how to maintain creditworthiness and manage debt. In addition, students will learn how to use appropriate and cost-effective risk management methods and learn how to implement a diversified investment strategy that is compatible with personal goals.

Business Applications I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

*After completing this course and Business Applications II and III, students are eligible for <u>college credits</u> and take Microsoft Office Certification Exams during school at no cost to the student. Each passed exam counts as one college credit at over 2,000 colleges. Visit the following for information on how to transfer credit:
http://www.certiport.com/Portal/desktopdefault.aspx?page =common/pagelibrary/College_Credit.html and
http://www2.acenet.edu/CREDITCollegeNetwork/
<u>*It is ultimately up to each institution from which the student is seeking credit and any questions should be directed to that institution.*</u>

Business Applications is a year-long course which utilizes **Microsoft Office 2013**, Adobe Photoshop CS6, Internet and Google Apps. Students will gain confidence in using **Word 2013, Publisher 2013, and PowerPoint 2013** to create, such as, MLA Papers, Business Documents, Newsletters, Presentations, and many more. Students will utilize **Adobe Photoshop CS6** to enhance pictures and web pages. Students will also learn the basics of web design through a web-assisted program. Students will use various forms of digital literacy, such as, finding and evaluating resources on the web, using social networking to connect with the world, and Google classroom. Students planning to attend college or the business world should strongly consider enrolling in this course as its content parallels introductory computer courses that many students must complete during their collegiate education.

Business Applications II

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Business Applications I

Students will continue with advanced facets of computer applications needed for college and work out of school. Included in this course are the following applications:

- **Advanced Word 2013** – including mail merges, high-level tables, advanced outlining and numbering.
- **Excel 2013** – the number one application used in the business world. Students will create spreadsheets, be able to manipulate information and create professional charts and graphs.
- **Access 2013** – create databases, including tables, forms, reports, and query designs.
- **Adobe Acrobat Professional 8.0** – Professional program used to create, control, and deliver more secure, high-quality Adobe PDF documents and forms.
- **Microsoft Office Simulation**—create your own business and utilize the Microsoft Office Suite to create your own business portfolio.

- **Opportunity to take Microsoft Office 2013 Word, PowerPoint and Excel Exams** (<u>No cost to student</u>)

Visit the following for information on how to transfer credit:
http://www.certiport.com/Portal/desktopdefault.aspx?page =common/pagelibrary/College_Credit.html and http://www 2.acenet.edu/CREDITCollegeNetwork/

Business Applications III

Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Business Applications II

This course is designed for any student interested in the business world either as a college major or as a transition to work from high school. Students will be involved in a variety of computer and office applications and work-based projects. Students will be able to apply advanced computer skills to jobs requested and will be involved in computer-based presentations, cooperative teamwork, and organizational skills as they are integrated throughout the course. This course requires that students work in a cooperative setting, applying work ethics taught to real-life situations such as finding and evaluating resources on the web and using social networking to connect with the world. Upon completion of Business Applications I, II, and III, students will have the option to become *Microsoft Specialists Certified* in one or all of the following *Microsoft* programs: *Word, Excel, PowerPoint, Access, and Outlook* at no cost to the student. Each passed exam counts as one college credit at over 2,000 colleges. Visit the following for information on how to transfer credit:
http://www.certiport.com/Portal/desktopdefault.aspx?page =common/pagelibrary/College_Credit.html and http:// www2.acenet.edu/CREDITCollegeNetwork/ <u>*It is ultimately up to each institution from which the student is seeking credit and any questions should be directed to that institution.*</u>
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Robotics I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

In this class students will explore the field of robotic design using a variety of hands-on activities. Students begin the course with an introduction to the tools used to create robotic devices. Working in teams students will create simple drive trains capable of movement through radio-operated interaction. Programming learned by the students will be used to work the onboard micro-processor to control the functions of the robot. Mechanical concepts such as gearing, torque, speed, and power will be used to design and build custom drive trains capable of meeting a variety of criteria including climbing, pushing, attaining maximum speed, etc.

Robotics II

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Robotics I.

In this class, students will explore the field of robotic design using complex hands-on activities. The First Tech Challenge, a sports-like robotics competition, is the framework for the class, and students enrolled in Robotics II are highly encouraged to join the extra-curricular FIRST Tech Challenge Robotics Team. Working in teams, students will use CAD to design their robots using 3D printed materials, metal and other innovative materials. Students will program the robots to utilize sensors to complete complex autonomous tasks. Students will also work in teams to drive the robots using android devices and game controllers. Class time will be devoted to planning and strategizing for the annual FTC game. The class will also document their process in an engineering notebook while promoting STEM, robotics and FIRST (For Inspiration and Recognition of Science and Technology) through marketing and community outreach campaigns.

Video Game Design and Programming I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This course is an introduction to the theory and practice of video game design and programming. Video game programming is one of the most challenging disciplines in Computer Science because it attempts to combine, in real time, concepts in: computer graphics, human computer interaction, networking, artificial intelligence, computer aided instruction, computer architecture, and databases. In this course students will develop computer programming and computer graphics knowledge by learning the basics of the video game design. Students will learn the core features of video games and use a variety of computer applications to develop an educational video game by the end of the course.

Video Game Design and Programming II

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Video Game Design & Programming I

This course is a continuation of Intro to Video Game Design and Programming I. Students will utilize real-world processes used by today's video game studio 3D modelers and programmers. In this course students will plan and design a project through hands-on experiences resulting in a 3D educational video game by the end of the course.

Marketing Education I

Length: Year   Credits: 5
Grade Level: 10, 11, 12

The key elements of the Marketing Education I curriculum are the functions of marketing, employment skills, computer training in business and employment related applications (word processing, spread sheets, desktop publishing), and personal development related to the student's role in the business community. Projects and role-playing are key instructional techniques used to give students an opportunity to practically apply what they learn. Students are given the opportunity to join DECA and attend its competitions (see DECA).

Marketing Education II

Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Marketing Education I

This course is recommended for students who are considering majoring in Business in college. This course will prepare students for college level business curricula and introduce students to marketing related careers. Course elements include advanced marketing concepts, entrepreneurship, international marketing, management training, computer training (*Excel* spreadsheet, PowerPoint presentations, and Internet marketing), business law, and team training. Students will learn team related skills and business ethics as well as develop personal survival skills.

DECA is an international organization for students enrolled in Marketing Education and related programs. Students may join DECA by paying a membership fee to the State and National associations. By participating in DECA, students can explore career interest and develop employment skills.

DECA holds conferences on the regional, state and national levels. At these conferences students compete in a marketing-related occupational category to determine their level of competency based upon industry standards. Students will compete by performing role-playing events in their selected category. They will also interact with members of the business community currently working in this field. At the conclusion of each role-play event, the member of the business community serves as the judge and rates each student's performance.

Students in the following courses are eligible for DECA: Marketing Education I and II and Accounting II, III, and IV.

Technology I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This entry-level course into technology is designed to introduce students to systems of technology in the home and workplace. Hands-on activities using tools, machines, materials, and state of the art equipment (computers, robots, and pneumatics) will allow the students to explore several technological areas. Using a design and problem solving approach, students will be asked to research and find solutions to problems dealing with production, robotics, transportation, communication, construction, power and

energy, biotechnology, etc. The course will also acquaint the students with the impacts, resources, and control of technology, as well as an awareness of consumerism and related careers in a technical society.

Technology II
Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Technology I

This course is designed to develop critical thinking skills that help students to creatively apply their knowledge to solving problems. Students will be involved in hands-on experiments designed to simulate workplace decision-making skills. Some of the topics will include the evolution of technology, design and problem solving process, and the systems approach to understanding technology. Students will be able to explore various areas of technology, including communication, lasers, energy and power, and transportation.

Technology III
Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Technology II

This course is an extension of Technology I and II giving the advanced student extensive practical application in the fields of basic robotics, transportation, energy, communications, biotechnology, and construction. Using a design and problem-solving approach, students will be able to find solutions to various situations related to the field of engineering through the application of long-term projects.

Media Technology I
Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This elective course in television/video production is designed to introduce students to systems of media communication technology. Students will perform hands-on activities using state of the art machines and materials (television cameras, professional editing machines and software, audio equipment, digital switches, mixers, computer-aided graphics, computer animations, etc.) which will allow students to explore various areas of media technology. Students interested in performing in front of the camera, and/or behind it, and who wish to understand the process of putting on a television show will find the course beneficial and rewarding.

Media Technology II
Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Media Technology I

Media Technology II is an advanced course dealing with the world of video, television, film, and their related careers, and technical equipment. The course provides experience in oral presentations, dramatic presentations, and media understanding. Students are expected to perform all of the functions related to the operation of a video and studio production to include performing, directing editing, and sound mixing. The primary instruments for learning these skills are the production of a long-term project for broadcast on the school's closed circuit system and the production of special projects. Students with a final grade of 85 or higher in Media I. and Media II. are eligible for 3 college credits through Rider University's PASS Program. Other colleges and universities may transfer Rider PASS credits based on their own transfer policies.

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Entertainment Media
Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Media Technology II

Students interested in performing in front of the camera, or behind it, and who wish to understand the process of Entertainment Media as a career will find this course beneficial and rewarding. The course is designed to give students an opportunity to study the field of entertainment production and the business side of filmmaking. Students will perform hands-on activities using state-of-the-art equipment and materials enabling them to explore various aspects of filmmaking.

Broadcast News Production
Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisites: Media Technology II

Broadcast News Production is an advanced course where students learn the fundamentals of broadcast journalism, as they create, research, film and edit news packages for production of the View News and the local cable access program. Students will utilize critical skills in the creation of high-interest, original stories. Similar to news professionals, students will contact and interview members of the school and community. Students will be organized into production teams with roles of executive producer, director, segment producers, reporters, cameramen, and editors. This course is designed for students who are interested in performing in front of the camera or operating behind it as they learn the process of broadcast media communication. Major goals of the program are for the students to acquire the ability to view media in a critical manner and to explore the impact of media on society.

Television & Video Production
Length: Year   Credits: 5
Grade Level: 12
Pre-requisites: Broadcast News Production or Entertainment Media

This course is designed for the student who is interested in pursuing advanced level training in electronic media. The student will be required to apply his/her previously acquired

skills in developing individualized projects, including movie making, a cable news program, and news editing. Through a variety of individual and cooperative learning activities, the student will achieve competency in the area of television news programming.

Journalism
Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This class is the foundation for the Journalism program. This year-long course is open to students in grades 9 through 12. Students will be introduced to journalistic writing skills, desktop publishing, broadcast journalism, creative writing for the literary magazine, and yearbook design and layout. Students taking this class should have a strong interest in a variety of writing styles, basic key-boarding skills enjoy working in cooperative groups and enjoy the challenge of public speaking. Students will learn how to utilize *Adobe In Design* CS4 and *Photoshop* 6.0.

Journalism Lab
Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisites: Journalism

This class builds on the skills started in Journalism I. Students must be skilled in word processing and desktop publishing since this class will publish the high school newspaper. After school meetings will be required at deadline times. Additionally, students will build a personal portfolio, containing a variety of journalistic pieces as well as creative works including poetry, short stories, one act plays, and biography or autobiography.

Computer Aided Drafting I (CAD I)
Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This course is highly recommended for students who are interested in drawing and working with computers. Students who are searching for a future engineering or design career, such as architecture, interior design, graphic design, aerospace, and/or automotive design will find this course beneficial. Students will be introduced to the basic areas of drawing through pencil techniques, as well as the use of Computer Aided Drafting. The areas of study will include: understanding and developing two-dimensional drawings using geometric construction, basic multi-view drawings, , and basic design problems. Technology

Learning Activities will allow the students to utilize their drafting capabilities in a problem- solving approach.

Computer Aided Drafting II (CAD II)
Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Computer Aided Drafting I (CAD I)

This is the second year of a recommended two-year basic drawing/drafting program. Students will build upon techniques studied in Computer Aided Drafting/Drafting I. These include intermediate multi-view drawings, advanced pattern and package design/modeling, and intermediate three-dimensional drawing techniques. Students will also build upon their basic knowledge of AutoCAD with step-by-step programmed instruction. They will also be introduced to computer three-dimensional modeling techniques. Computer Aided Drafting/Drafting II will prepare students planning to take additional courses in either architecture or engineering. Technology Learning Activities will allow the students to utilize their drafting capabilities in a problem-solving approach.

Honors Engineering I
Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Computer Aided Drafting II (CAD II)

This advanced design course is for students interested in various engineering/design fields as a possible career. The course will include an introduction to industrial, mechanical, electrical, civil-structural and geotechnical, and aerospace engineering. Students will gain engineering experience through real-life projects for each engineering discipline. Students will use various advanced Computer Aided Design software and prototype modeling to demonstrate design solutions. Activities include Invention and patents, gear/cam development, structural models/drawings, site plan design (topography), electrical layout and symbols, 3D model design and computer animation. Students will meet engineering professionals and understand their profession from classroom presentations and professional examples. Technology Learning Activities (TLA) will allow students to utilize their design capabilities in a problem-solving approach.

Honors Engineering II
Length: Year   Credits: 5
Grade Level: 12
Pre-requisite: Honors Engineering I.

This course is designed to give the students an overview of several engineering disciplines. This course will prepare the students to develop a product completely from

schematics to final documentation as well as marketing and presenting the product. The structure of the course will be based from a sample similar to a freshman engineering class at Rennsalear Polytechnical Institute. Students will reverse engineer a chosen product and will redesign the product to meet current or future trends in design and technology. Students will create market surveys, presentations, complete product documentation for the product to be manufactured accurately including production drawings.

Honors Architecture I
Length: Year Credits: 5
Grade Level: 11, 12
Pre-requisite: Computer Aided Drafting II (CAD II)

This course is for students who plan to design or redesign their home, study architecture or interior design, enter a construction trade, or for anyone who enjoys designing. Its scope is to develop a general knowledge of architectural history and style, spatial relationships and design, and construction detailing. The students will design and develop a set of working drawings. They will act in the role of an architect and will choose a client and design a house using Auto CAD, a computer aided design applications. In addition to these plans, the students will learn basic building codes and principles that will be applied to their designs. Methods of learning will include class discussion, reference material, professional examples, and Computer Aided Drafting.

Honors Architecture II
Length: Year Credits: 5
Grade Level: 12
Pre-requisite: Honors Architecture I.

This course is designed for students interested in architecture, interior design, becoming a builder and trades person, or for someone who will own a home in the future. This course will prepare the students who are planning to study Architecture at the college level and pursue a career in architecture. It will prepare them for the rigors and higher end design problems of a freshman/sophomore year in an architectural professional degree program.

Culinary Arts I
Length: Year Credits: 5
Grade Level: 9, 10, 11, 12

Culinary Arts I is an introduction to foods and all aspects of the kitchen including safety, sanitation, food terms, the use of small equipment and appliances, food preparation tools and basic cooking/baking skills. Students will explore various ingredients such as but not limited to dairy, eggs, poultry, and yeast and use basic kitchen equipment to prepare appetizers, desserts, main dishes and so much more. An introduction to basic nutrition and cake decorating will also be taught.

Cultural Foods
Length: Year Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Culinary Arts I

Students will take a culinary tour of the United States and abroad. This course will provide students with an understanding of regional ingredients and traditional foods. History, immigration influences, historic landmarks and local cuisines will be studied. Students will learn how to prepare international foods such as homemade Italian pasta, French desserts, Mexican appetizers, Chinese stir fry, German Spaetzle and American staple foods such as fried chicken, biscuits, pumpkin pie and California fusion cuisine.

Culinary Arts II
Length: Year Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Culinary Arts I

Culinary Arts II is a course that focuses on advanced techniques and food preparation. Students will use Culinary Arts I as a foundation for this class. Culinary Arts II will focus on a variety of food categories such as, but not limited to, (dairy, meat, poultry, fondue, chocolate, garnishing, salad and fruits/vegetables). Advanced techniques in food preparation and presentation will be incorporated into all labs. Advanced cake decorating and large scale gingerbread house construction will be taught. Healthy food preparation techniques, nutrition, and healthy eating habits will also be taught.

Culinary Arts III
Length: Year Credits: 5
Grade Level: 11, 12
Pre-requisite: Culinary Arts II

Culinary Arts III is a course that focuses on commercial foods. This course will provide a thorough knowledge of the principles, practices and scope of food preparation. Students will prepare various dishes and meals with commercial preparations in mind. They will learn proper presentation of foods using color and garnishing. Quantity food preparation/catering will be experienced as well. Aspects of the food service industry will be explored. Advanced nutritional lessons will also be incorporated into the labs and classroom lessons.

Clothing Construction I
Length: Year Credits: 5
Grade Level: 9, 10, 11, 12

Basic clothing construction techniques are developed through the construction of projects. No sewing experience is necessary! Emphasis is placed on safe and correct procedures when using tools and equipment. Students learn how to sew projects such as an apron, pajama pants, a pajama shirt, a tote bag, and a pillow pet.

Clothing Construction II, III, IV

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Clothing Construction I

This course is designed for students who have successfully completed the prior level of Clothing Construction I, II, or III. This course will build upon the knowledge, skills & creativity acquired in previous Clothing Construction levels. Emphasis will be placed on the student *independently* following pattern manufacturers' instructions to construct two different projects (of their choice) each marking period.

Life Skills & Relationships

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

Life Skills and Relationships is designed to take students through all phases of life including relationships, child development and care, independent living, career planning, and social skills for life. This hands-on course allows students to experience practical skills for living which are essential components of this class. A weekend with *Baby Think It Over* allows students to have a realistic experience in the demands and rigor of caring for an infant. Students will create projects relevant to Life Skills. Students are responsible for project materials.

Child Development

Length: Year   Credits: 5
Grade Level: 10, 11, 12

This course is designed for students interested in learning how to understand and work with children. Students will study the stages of child development from age three to six. Students will also gain knowledge in sound parenting skills. Practical experience will be achieved by working with children ages two and a half through five in our on-site pre-school lab. Students are required to prepare and develop lesson plans. They will be expected to team-teach and solo-teach the children in the on-site pre-school using their own or previously submitted lessons.

Advanced Child Development

Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisite: Child Development

This course is designed for students interested in working with children as a future profession. The students will work with children ages two and a half through five and examine the theories of child development from ages one through three. They will be required to observe and teach children in our on-site pre-school. Each student is expected to plan, develop, and teach their own lessons throughout the course.

Woodworking I

Length: Year   Credits: 5
Grade Level: 9, 10, 11, 12

This entry-level course will be the student's first chance to get involved in the creative world of woodworking. Students will be introduced to woodworking hand tools, equipment, and techniques necessary to produce innovative, practical, and quality products. The purpose of this course is to introduce students to the design loop and problem solving processes associated with the area of woodworking and production techniques. Activities will involve real-life situations and problems that place the student in the roles of researcher, designer, fabricator, tester, and evaluator. Emphasis is placed on the ability to find multiple solutions to problems. The class will assume responsibilities of various divisions of a company, and a product will be chosen. The class, acting as a "company," will provide and market the product.

Woodworking II

Length: Year   Credits: 5
Grade Level: 10, 11, 12
Pre-requisite: Woodworking I

This course is designed as an introduction to the advancing world of construction and the art of woodworking. It will not only offer the student the basics in woodworking, but cover a number of areas in construction such as masonry, drywall, electricity, and carpentry using both emerging building materials and techniques. This course should prove to be an enjoyable and interesting experience with a great deal of hands-on activities and real-life problem solving.

Woodworking III

Length: Year   Credits: 5
Grade Level: 11, 12
Pre-requisites: Woodworking II

This course is an intermediate course in woodworking developed to expose students to the world of materials fabrication, craftsmanship, and the construction industry. Students will plan and build individual and group projects utilizing all the concepts of the design loop process and incorporate problem solving techniques. This course will also acquaint the student with the impacts, resources, and tools of technology, as well as an awareness of consumerism and related careers in a technical society.

Woodworking IV

Length: Year   Credits: 5

Grade Level: 12

Pre-requisites: Woodworking III

This is an advanced course in the art of woodworking. Students will design, plan, and construct individual and group projects. Experiences will be gained in the safe and proper use of all wood lab hand tools and equipment. Both current and state of the art materials and practices will be emphasized throughout the course.

The best way to predict the future is to invent it.

Alan Kay