

10th – 12th GRADE COURSE DESCRIPTIONS 2022-2023

DANCE

Ballet I - IV

A progressively intense program through the many technical and historical styles of classical ballet, including barre and center. Ballet classes are highly recommended for any level II and above class. Ballet will use elements from yoga study. **Ballet shoes and proper dance attire required. Students must complete one level before moving to the next. Pointe work will be introduced as students are ready with teacher approval.**

FEE \$15.00

Modern I - IV

A progressively intense exploration of the concepts, history, and techniques of contemporary dance including improvisation and choreography. **Proper dance attire required. Students must complete one level before moving to the next.**

FEE \$15.00

Ballroom I - IV

Dancers move through levels of proficiency in Intermediate-Full Bronze American, and International style Latin, Swing and Ballroom dance patterns with more technical instruction for performance and competition applications. Students will move through silver level competitive dancing at the higher-level courses. **Shoes and proper dance attire required. Students must complete one level before moving to the next.**

FEE \$15.00

Hip Hop I - IV

The purpose of this course is to expose students to the cultural and historical styles of “street dancing.” Students will learn a variety of Hip-Hop techniques and choreography styles as well as the origins of the movement. **Proper dance attire required. Students must complete one level before moving to the next.**

FEE \$15.00

Tap/Jazz I – IV

An exploration of the disciplines of technique required for the tap dancer as well as the jazz dancer. Introduction to styles, structures and aesthetics of dance. **Proper dance attire and 2 different pairs of shoes required. Students must complete one level before moving to the next.**

FEE \$15.00

Pre-Professional Intensive Technique Course I - III

The Pre-Professional Intensive Technique class is designed to challenge the advanced dancer, with the goal of preparing them for a career in dance/college dance program. Rooted in ballet & modern, with extra focus on jazz skills & progressions (i.e. Leaps & Turns), along with various approaches in conditioning for dance, this course will offer intense training in a range of styles at a very advanced level. **By Invitation and Application only.**

FEE \$15.00

MUSIC

Guitar I – IV

The development of fundamental skills in guitar technique, interpretation, and performance. Basic harmony and composition through advanced technique, ensemble, harmony and composition are taught. Guitar provided. Students must complete one level before moving to the next. Students must complete one level before moving to the next. Guitar provided. Required supplies: One audio (gaming style) headset (exact type will be specified by the instructor).

FEE \$50.00

Keyboard I-IV

Learn to read music, play different rhythms and basic keyboard information. Includes both solo and ensemble performance and assessment as well as written theory work. For students with little or no musical experience to begin. Classes progress in level of difficulty as students improve. Students must complete one level before moving to the next. Required supplies: One audio (gaming style) headset (exact type will be specified by the instructor).

FEE \$25.00

Chorus I - IV

The purpose of this course is for students to develop basic individual and ensemble skills in choral/vocal performance through preparation of varied high school choral repertoire. Emphasis will be placed on healthy and expressive singing, accurate interpretation of notation, and development of critical and aesthetic response to music. Class assessment includes basic music reading skills, music and rhythmic notation, and sight-singing abilities. Required supplies: concert attire.

FEE \$10.00

Beginning Orchestra

Students will learn to play the orchestral instrument of their choice: violin, viola, cello, or double bass. Students will learn basic music notation reading through the study of this instrument. Students will play and perform Grade 1 string orchestral literature. Rhythm, pitch, posture, proper instrument position and music vocabulary will be developed. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to rent or purchase their instrument through local music stores or online vendors. Required supplies: Method Book *Essential Elements for Strings Book 1*, instrument, rosin, shoulder rest for violins and violas, and a rock stop for cellos and basses.

FEE \$25.00

Intermediate Orchestra

Prerequisite: Beginning Orchestra [or equivalent being 1 full year of public or private school instruction] or audition Students will continue to study the orchestral instrument of their choice while playing and performing Grade 2 string orchestral literature. Students will continue to develop music basics while continuing instrument specific techniques. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to rent an instrument from local music stores or an on-line vendor. Required supplies: Method Book *Essential Technique for Strings*, instrument, rosin, shoulder rest for violins and violas, and a rock stop for cellos and basses.

FEE \$25.00

Advanced Orchestra

Prerequisite: Intermediate Orchestra (or equivalent being 2 full years of public or private school instruction) or audition Students will continue to study the orchestral instrument of their choice while playing and performing Grade 3-5 string orchestral literature as well as perform for outreach events and District assessments. Rhythm, pitch, posture, proper instrument position and music vocabulary will be developed. Daily practice will be expected at home. *Students are placed at this level by the Director and must be fluent music readers.* Students are required to rent an instrument from local music stores or an on-line vendor. Required supplies: Instrument, rosin, shoulder rest for violins and violas, and a rock stop for cellos and basses.

FEE \$25.00

Beginning Band

Students will learn to play the woodwind or brass instrument of their choice: flute, oboe, bassoon, clarinet, alto sax, tenor sax, trumpet, trombone, baritone or tuba. Students will learn basic music notation reading through the study of this instrument. Students will play and perform Grade 1 band literature. Rhythm, pitch, posture, proper instrument position and music vocabulary will be developed. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to rent or purchase their instrument through local music stores or online vendors. Required supplies: Method Book *Tradition of Excellence (for your instrument)*, instrument and instrument care supplies.

FEE: \$25.00. Additional rental fees may apply.

Intermediate Band

Prerequisite: Beginning Band [or equivalent being 1 full year of public or private school instruction] or audition Students will continue to study the band instrument of their choice while playing and performing Grade 2 band literature. Students will continue to develop music basics while continuing instrument specific techniques. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to rent or purchase their instrument through local music stores or online vendors. Required supplies: Method Book *Tradition of Excellence (for your instrument)*, instrument and instrument care supplies.

FEE \$25.00. Additional rental fees may apply.

Advanced Band

Prerequisite: Two full years of Intermediate Band or by Audition / Invitation from the Director.

Students will continue to study the band instrument of their choice while playing and performing Grade 3-5 band literature as well as perform for outreach events and District assessments. Students will continue to develop music basics while continuing instrument specific techniques. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to rent or purchase their instrument through local music stores or online vendors. Required supplies: instrument and instrument care supplies.

FEE \$25.00. Additional rental fees may apply.

Percussion Ensemble I-IV

Prerequisite: One full year of Beginning Band on PERCUSSION or by Audition / Invitation from the Director.

Students will learn to play all percussion instruments, including Snare Drum, Mallets and Timpani. Students will learn basic music notation reading through the study of these instruments. Students will play and perform Grade 1 percussion literature. Class assessment includes the playing of individual musical excerpts and theory work, both written and played. Students are required to purchase their own Vic Firth SD1 General Drumsticks and any gum rubber drum pad. Rental Fees Apply for the use of school owned instruments.

FEE \$25.00

Jazz Ensemble I - IV

Open to HS students by Audition / Invitation from the Director The purpose of this course is to enable students to develop fundamental skills in jazz performance through knowledge of styles and performance techniques of varied jazz and contemporary literature. **Additional fees apply.**

FEE \$25.00

Select Choir I – IV

Open to HS students by audition only. Heavy performance-based class with solo and ensemble singing opportunities. This group is the premier choral group at MSA and will be representing school throughout the community at various public performances, including the Florida MPA competition at the end of the year. Students will learn advanced voice technique, as well as choral singing skills. Class assessment includes advanced music reading skills, music and rhythmic notation, and fast sight-singing abilities. **The purchase of formal competition attire required.**

FEE \$20.00

Commercial Music Ensemble Grade 10-12 ONLY

Requirements: Audition or permission of instructor. The Commercial Music Ensembles provide students with the experience of choosing songs, working with arrangements, rehearsing with a band, and bringing it all together as a cohesive performance. The ensemble draws its material from any style of music that has achieved popularity in the music industry as well as students' original songs. The class contains a small group of vocalists who perform lead and background vocals, and a rhythm section with drum set, electric bass, acoustic and electric guitar, piano, and keyboard. Horn players and other instruments are often recruited for the performances as well.

FEE \$50.00

THEATRE

Theatre I-II

Students must complete one level before moving to the next. The purpose of this course is to introduce students to fundamental skills in the multiple elements of theatre as a collaborative art. The class will include several performance-based projects. **FEE \$25.00**

Musical Theatre Production I-IV

MTP is a performance based class. Students may travel locally and throughout the state to performances and competitions. Students will learn techniques in dance, singing, acting and choreography. This course is enrolled by invitation or audition only. **FEE: \$20.00**

Stagecraft I

For first time stagecraft students who have never taken a stagecraft class at MSA before at either the middle or high school level.

Students focus on developing the basic tools and procedures for creating elements of technical theatre, including costumes, lighting, properties (props), publicity, scenery, and sound. Technical knowledge of safety procedures and demonstrated safe operation of theatre equipment, tools, and raw materials are central to success in this course. Students explore and learn to analyze dramatic scripts, seeking production solutions through historical, cultural, and geographic research. Students also learn the basics of standard conventions of design presentation and documentation; the organizational structure of theatre production and creative work in a collaborative environment; and the resulting artistic improvement. Public performances may serve as a culmination of specific instructional goals. Students may be required to attend or participate in technical work, rehearsals, and/or performances beyond the school day to support, extend, and assess learning in the classroom. **Permission to use power tools required. Stagecraft shirt is required. FEE \$50.00**

Stagecraft II - IV

Students focus on the design and safe application of basic tools and procedures to create elements of technical theatre, including costumes, lighting, properties (props), publicity, scenery, and sound. Students develop assessment and problem-solving skills; the ability to connect selected literature to a variety of cultures, history, and other content areas. Public performances may serve as a culmination of specific instructional goals. Students may be required to attend or participate in technical work, rehearsals, and/or performances beyond the school day to support, extend, and assess learning in the classroom. **Permission to use power tools required. Stagecraft shirt is required. FEE \$50.00**

Acting I – IV

Prerequisite: Theatre I or Theatre 8.

Students must complete one level before moving to the next.

The purpose of this course is to enable students to develop fundamental acting skills and integrate them into individual and ensemble theatrical performances.

FEE \$25.00

Stage Make-up I

The purpose of this course is to enable students to develop knowledge and skills necessary for the correct use of make-up in theatrical productions. The content includes: functions of make-up, tools and material, procedures and application techniques, career opportunities.

Make-up support for all MSA events are furnished by the Stage Make-up classes.

FEE \$65.00

Theatre Improvisation

Prerequisite: Theatre I/II or Acting I

New course offering! Through collaboration, communication, and performance activities, students engage in improvisation as a stand-alone art form and as an acting methodology. Study includes short-form and long-form improvisation, stand-up comedy, and sketch comedy. **FEE \$25.00**

VISUAL ART

2D/3D Comprehensive

Grades 9th – 12th

This course is an introductory level class for students with little or no art training. Students will gain knowledge of the use of tools, materials, and equipment, as well as art terminology. Emphasis will be placed on acquiring a working knowledge of the elements of art. Basic drawing and painting skills will be covered, as well as experimentation in 3-D design. **Students with no prior art classes may not be enrolled in any other higher-level course in the Visual Art Department until successful completion of this class.**

FEE \$40.00

Drawing I

Grades 9th – 12th

Prerequisite: Successful completion of Drawing 8th, 2D/3D 8th, Art Survey, or 2D/3D Comprehensive (HS) and current art instructor approval.

Building on past experience, students will continue exploring the basics of design: line, shape, color, texture, space, and value, which are necessary to communicate a range of subject matter, symbols and ideas. Various tools, vocabulary, artistic elements and history are explored..

FEE \$40.00

Drawing II

Grades 10th -12th

Prerequisite: Successful completion of Drawing I and current art instructor approval.

Continuation of Drawing I. Students will focus on observation drawing and a study of life and figure drawing with new materials.

FEE \$40.00

Drawing III

Grades 11 & 12 ONLY

Pre-requisite: Successful completion of Drawing II and current art instructor approval.

Continuation of Drawing II. Students will continue life and observation drawing while focusing on creating their own unique style. A more in-depth application of the elements of art and the principles of design is stressed. **FEE \$40.00**

Painting I

Grades 9th -12th

Prerequisite: Successful completion of Drawing 8th, 2D/3D 8th, Art Survey, 2D/3D Comprehensive (HS) or Drawing I and current art instructor approval. An introduction to the many different styles and techniques in painting, with focus on design and production of a painting. Course includes acrylic paint, watercolor paint and building canvas.

FEE \$40.00

Painting II

Grades 10th – 12th

Prerequisite: Successful completion of Painting I and current art instructor approval. A continuation of exploring the media of painting. In-depth famous artist style and study; includes canvas building and framing. Study of the elements of art and the principles of design with individual style as a focus.

FEE \$40.00

Painting III

Grades 11 & 12 ONLY

Prerequisite: Successful completion of Painting II and current art instructor approval. A continuation of exploring the media of painting. In depth famous artist style and study; includes canvas building and framing. Study of the elements of art and the principles of design with individual style as a focus. **FEE \$40.00**

Portfolio – Drawing I-III

Grades 10 – 12

Prerequisite: Instructor approval.

Portfolio class is designed for students who want to continue their artistic efforts at a more advanced level and/or intend to further their education at an art school, college or university. Artists may work in, but are not limited to, content in drawing, painting, printmaking, and/or illusion of depth. Students are required to keep a thorough personal sketchbook. Students must also prepare a portfolio of their work and an artist's statement of their best work for group presentation and exhibition in the spring.

FEE \$40.00

Cartooning and Illustration I

Grades 9 –12

Prerequisite: Successful completion of Drawing 7 or 8, 2/D 3/D, Pre-AP Traditional and Digital Art or Art Survey AND Digital Art 2 is required as well as current art teacher approval. In this class, students will create and discuss visual art through cartooning & illustration art topics such as book, advertising and editorial illustration, game and animation concept art and design, and comic creation. This class will emphasize the art elements and principles of design, creative thinking, problem solving, drawing skills, and a variety of media. Subject matter will include human, animal and other inventive characters, creativity, and design processes. Other topics will include concept art, craft, sketchbook assignments, and art history topics.

FEE \$40.00

Cartooning and Illustration II

Grades 10– 12

Prerequisite: Successful completion of Cartooning I and instructor approval required.

This class expands on the knowledge learned in Cartooning I. In this class, students will create and discuss visual art through cartooning & illustration art topics such as book, advertising and editorial illustration, game and animation concept art and design, and comic creation. This class will emphasize the art elements and principles of design, creative thinking, problem solving, drawing skills, and a variety of media. Subject matter will include human, animal and other inventive characters, creativity, and design processes. Other topics will include concept art, craft, sketchbook assignments, and art history topics.

FEE \$40.00

Cartooning III

Grades 11 & 12 ONLY

Pre-requisite: Successful completion of Cartooning II and instructor approval required. In this class, students will continue to learn how to tell a story with pictures through cartoon illustration. This class will continue hand drawing and the cartooning process starting from character and story development, to make a hand drawn "rough," to a final finished product. This class will be self-directed. Projects could include comics or graphic novels, animation, or concept art for gaming or video. **Grades 11th & 12th. FEE \$40.00**

Fiber/Craft Explorations**Grades 9-12**

Prerequisite: Successful completion of Drawing 8, 2-D/3-D, or Art Survey and current instructor approval. A survey course covering various art forms that use fiber as a main component. Projects may include coiled basketry, tapestry weaving, silk painting, batik, painted floor cloths, crochet and cast paper. Students write self-critiques at the completion of each project.

FEE \$40.00

Jewelry Making**Grades 9 – 12**

Prerequisite: Successful completion of Drawing 8th, 2D/3D 8th, Art Survey or 2-D/3-D Comprehensive (HS) and current art instructor approval. Students in Jewelry Making will experiment with paper, polymer clay, ceramic clay, wire and metal, leather, glass, wood, fiber and plastic in the creation of jewelry pieces. A main focus will be on the elements and principles of design and how they translate to jewelry. Students are taught terminology and proper use of tools and equipment. Students write self-critiques at the completion of each project.

FEE \$40.00

Costume Design I**Grades 9-12**

Students in costuming class are taught basic sewing techniques of repair, alteration, and construction as they pertain to costuming for the stage. Students construct a basic garment (pajama pants) including pattern reading, layout, cutting, sewing and finishing. Students are responsible for helping with costuming for school plays and assisting actors during evening performances. **Course requires approximately 3-4 evenings per school year to attend school plays.** **FEE \$20.00 for sewing kit, notions and mask materials.**

Costume Design II**Grades 10-12**

Prerequisite: Successful completion of Costume Design I and current instructor approval. Students in Costuming II are taught more advanced sewing techniques and design skills as they pertain to fashion and costuming as an industry. Students read a pattern to create an adult onesie, learn to design start to finish from a script, research major figures in the fashion and costume design industries, and learn to do basic patterning through quilted pillows. **Course requires approximately 3-4 evenings per school year to work backstage and 10 hours of lab time per semester.** **FEE \$20.00 plus additional Costume II fabric required.**

AP Studio Art (Including Digital Art and Photography)/Portfolio Development

Instructor approval required. PREREQUISITES: Any High School Level Visual or Digital Art Class **RECOMMENDED: Junior year**

The AP Studio Art portfolio class is designed for students who are seriously interested in a career in the visual arts. Students create a portfolio of work to demonstrate the artistic skills and ideas they have developed, refined, and applied over the course of the year and may add past works to produce a portfolio of 29 works. Portfolios will be evaluated at the end of the school year by the College Board. The AP 2-D Portfolio addresses two-dimensional design issues through the integration of the elements and principles of art. Effective design is possible whether one uses representational or abstract approaches to art. Students are asked to demonstrate mastery of 2-D design through any two-dimensional medium or process, including, but not limited to graphic design, digital imaging, photography, collage, fabric design, weaving, fashion design, fashion illustration, painting, and printmaking. Students will produce a minimum of 24 works that satisfy the requirements of the quality, concentration, and breadth sections of the AP Studio Art: 2D Design Portfolio for college credit. **AP STUDIO FEE \$50.00 PORTFOLIO DEVELOPMENT FEE \$20.00**

Arts Collaboration (Honors)

PREREQUISITES: Level 2 of the following Visual, Digital Arts, or Stagecraft. Instructor approval required. Grades 11 & 12 - RECOMMENDED: Senior Year. A project-based class that will allow you to work on projects of YOUR choosing with other students, teachers, charities, and local businesses to pump up your resume and give you the real-world experience you need to impress future employers. You will use your individual strengths and interests in this highly independent setting which may require out of school and/or off-campus time. Examples of opportunities might include Film Festivals, Commercials, Print Advertisements, T-Shirt Design, Murals, the opportunities are endless. **FEE \$20.00**

Sculpture/Ceramics I

Pre-requisite: Successful completion of 2D/3D Comp, Drawing 1, Painting 1, or Cartooning 1 and current art instructor approval. This course will explore the use of a variety of sculpture media (including, but not limited to, clay, plaster and wire). Students will develop basic skills in design, processes and techniques. Emphasis shall be placed on the use of visual, spatial and compositional concepts to communicate a range of ideas. Course includes class critiques and one research paper. Grades 10th – 12th. **FEE \$45.00**

Sculpture/Ceramics II

Pre-requisite: Successful completion of Sculpture I and current art instructor approval. This course will explore the use of a variety of sculpture media (including, but not limited to, clay, plaster and wire). Students will develop basic skills in design, processes and techniques. Emphasis shall be placed on the use of visual, spatial and compositional concepts to communicate a range of ideas. **Course includes class critiques and one research paper. Grade 11th – 12th. FEE \$45.00**

Sculpture/Ceramics III

Pre-requisite: Successful completion of Sculpture I and II and current art instructor approval. The purpose of this course is to enable students to develop advanced skills in the use of sculpture media, design, processes and techniques. Emphasis shall be placed on the use of visual, spatial and compositional concepts to communicate a range of ideas. **Course includes class critiques and one research paper. Grade 12th Only. FEE \$45.00**

DIGITAL ARTS AND TECHNOLOGY

Animation I

PREREQUISITES: ANY Visual Art Class Students will learn the basics needed to create a variety of animation as well as the artistic aspects of creating moving images. Students will become familiar with professional software programs through watching demonstrations and completing structured assignments, as well as open ended projects. This class is perfect for the designer who would like to explore the various types of animation including digitizing traditional hand drawings, stop motion and web animation. **FEE \$20.00**

Animation II

Prerequisite: Animation I with at least a grade of 75% or higher. Students will explore Adobe Photoshop, Animate, After Effects and Premiere, learning both the technical aspects of animation as well as the artistic aspects of creating moving images. Projects may include roto-scoping, point to point animation, digital flipbooks, morphing, etc. This class is perfect for the designer who would like to explore the various types of animation including digitized hand drawings, limited animation, and web animation. **FEE \$20.00**

Digital Photography I

Students will explore the fundamentals of photography and become familiar with the basic mechanics of a camera, including lens and shutter operation, compositional foundations, printing an image for display, and evaluating a successful print. Much of class time will be spent learning Photoshop and proper photo-editing. Students will have the opportunity to earn their Industry Standard Certification in Adobe Photoshop. Students must be willing to take pictures outside of class, as this is a requirement. **Each student will be provided with a camera to use. The student and a parent/guardian will be required to sign a camera user agreement. **FEE \$50.00**

Digital Photography II

Prerequisite: Creative Photography I Students explore more advanced photography techniques. All skills used in Photography I will be used and built on, as well as learning new and more creative techniques. More emphasis will be placed on the student developing their own personal photographic style. This class takes a highly dedicated student. Much of class time will be spent learning Photoshop and proper photo-editing. Taking pictures outside of school will be a requirement. **Each student will be provided with a camera to use. The student and a parent/guardian will be required to sign a camera user agreement. **FEE \$50.00**

Digital Photography III

Prerequisite: Digital Photography II Students explore more advanced photography techniques. All skills used in Photography I will be used and built on, as well as learning new and more creative techniques. More emphasis will be placed on the student developing their own personal photographic style. This class takes a highly dedicated student. Much of class time will be spent learning Photoshop and proper photo-editing. Taking pictures outside of school will be a requirement. **Each student will be provided with a camera to use. The student and a parent/guardian will be required to sign a camera user agreement. **FEE \$50.00**

Digital Design I

Students will learn the concepts needed to create professional quality digital imaging and publication projects. Get an Industry Standard Certification in Adobe In-Design. Explore Adobe Photoshop and Illustrator. Learn both the technical and artistic aspects of image manipulation, color choice, typography, and desktop publishing in the field of Digital Design. **FEE \$20.00**

Digital Imaging II

Prerequisite: Digital Design I. Students will learn to set project requirements, engage in project planning, and utilize the design process. Get an Industry Standard Certification in Adobe Photoshop. Explore Adobe Animate and Dreamweaver. Learn both the technical and artistic aspects of promotional design and the use of emergent technologies in the digital design industry. **FEE \$20.00**

Digital Cinema I

Students will learn the concepts needed to create professional quality videos and films. Get an Industry Standard Certification in Adobe Premiere. Learn the skills needed to create stunning motion graphics, including production writing, storyboarding, editing, and camera techniques. Students will also learn tips and techniques that will help craft intriguing original stories. **FEE \$20.00**

Digital Cinema II

Prerequisite: Digital Cinema I. Students will learn the aspects of production management and art direction. Learn the skills necessary to create complex and interesting characters, through development. They will further their understanding of storytelling through scriptwriting and advanced storyboarding. Get an Industry Standard Certification in Adobe After Effects. **FEE \$20.00**

Video Game Design I

Prerequisite: MS Digital Photo, MS Illustration, or HS Digital Imaging Do you like video games? Have you ever been interested or curious about how video games are created? Have you ever thought about designing your own video game? Opened to all high school students, this course is designed to provide an introduction to game and simulation concepts and careers, the impact game and simulation has on society and industry, and basic game/simulation design concepts such as rule design, play mechanics, and media integration. This course compares and contrasts games and simulations, key development methodologies and tools, careers, and industry-related information. This course also covers strategies, processes, and methods for conceptualizing a game or simulation application; storyboarding techniques; and development tools. This course will emphasize hands-on activities and students will be able to create their own playable game as part of a culminating activity. **FEE \$50.00**

Video Game Design II

Prerequisite: Video Game Design I This course covers fundamental principles of designing a game or a simulation application, rules and strategies of play, conditional branching, design and development constraints, use of sound and animation, design tools, and implementation issues. The content includes market research, product design documentation, storyboarding, proposal development, and presentation of a project report. Emphasis is placed on the techniques needed to develop well-documented, structured game or simulation programs. Extensive use is made of evaluating and analyzing existing games or simulations. Includes the use of modeling programs. **FEE \$50.00**

Video Game Design III

PREREQUISITES: Video Game Design II This course builds upon the principles learned in Video Game Design I & II. Students will use skills learned throughout the course to design a complete functioning game by the end of the school year. Students will collaborate with peers to discuss game concepts, rules and strategies for play, design and developer constraints, sound and animation, design tools, and implementation issues. The content includes market research, design documentation, presentation of a project report, and implementation of 3D tools and Software. Emphasis is placed on the techniques needed to develop a well-documented, structured game. Extensive use is made of evaluating and analyzing existing games or simulations, analyzing peers concepts and games, participating in group critiques and implementing design changes based on peer feedback. **FEE \$50.00**

Yearbook Digital Media I - IV

Prerequisite: Must be accepted through an application process. Each year, the staff's goal is to define and record the school year in an honest and introspective photographic historical record that creates lasting memories of student life, academics, clubs, our school community, and most importantly, the people who breathe life into our school. Members of the yearbook staff are entrusted to plan the yearbook from cover to cover. Under student leadership, we decide all content, conduct interviews, photograph images, write articles, design spreads, distribute yearbooks and sell and design advertising for the yearbook. It's a lot of work, a lot of fun, and it's an incredible real-world publishing experience that we take very seriously.

Cartooning and Illustration I

Grades 9 –12

Prerequisite: Successful completion of Drawing 7 or 8, 2/D 3/D, Pre-AP Traditional and Digital Art or Art Survey AND Digital Art 2 is required as well as current art teacher approval. In this class, students will create and discuss visual art through cartooning & illustration art topics such as book, advertising and editorial illustration, game and animation concept art and design, and comic creation. This class will emphasize the art elements and principles of design, creative thinking, problem solving, drawing skills, and a variety of media. Subject matter will include human, animal and other inventive characters, creativity, and design processes. Other topics will include concept art, craft, sketchbook assignments, and art history topics.

FEE \$40.00

Cartooning and Illustration II**Grades 10– 12****Prerequisite: Successful completion of Cartooning I and instructor approval required.**

This class expands on the knowledge learned in Cartooning I. In this class, students will create and discuss visual art through cartooning & illustration art topics such as book, advertising and editorial illustration, game and animation concept art and design, and comic creation. This class will emphasize the art elements and principles of design, creative thinking, problem solving, drawing skills, and a variety of media. Subject matter will include human, animal and other inventive characters, creativity, and design processes. Other topics will include concept art, craft, sketchbook assignments, and art history topics.

FEE \$40.00

Cartooning III**Grades 11 & 12 ONLY**

Pre-requisite: Successful completion of Cartooning II and instructor approval required. In this class, students will continue to learn how to tell a story with pictures through cartoon illustration. This class will continue hand drawing and the cartooning process starting from character and story development, to make a hand drawn “rough,” to a final finished product. This class will be self-directed. Projects could include comics or graphic novels, animation, or concept art for gaming or video. **Grades 11th & 12th. FEE \$40.00**

AP Studio Art (Including Traditional Art, Digital Art, and Photography)/Portfolio Development

Instructor approval is required. PREREQUISITES: Any High School Level Visual Arts Class or Digital Arts Class. RECOMMENDED: Junior year. The Advanced Placement portfolio class is designed for serious art students. Students create a portfolio of work to demonstrate the artistic skills and ideas they have developed, refined, and applied over the course of the year. Students are asked to demonstrate mastery of art elements and 2-D design principles through any two-dimensional medium or process, including, but not limited, to graphic design, digital imaging, photography, collage, fabric design, weaving, fashion design, painting, drawing, illustration, and printmaking. Students will produce works that satisfy the requirements of the Sustained Investigation and Selected Works sections of the AP 2D Art & Design Portfolio. Portfolios will be evaluated at the end of the school year by the College Board and students may receive college credit. **AP STUDIO FEE \$50, PORTFOLIO DEVELOPMENT FEE \$20.00**

Arts Collaboration (Honors)

Prerequisite: Level 2 of the following Visual, Digital Arts, or Stagecraft. Instructor approval required. Recommend Senior Year. A project-based class that will allow you to work on projects of YOUR choosing with other students, teachers, charities, and local businesses to pump up your resume and give you the real-work experience you need to impress future employers. You will use your individual strengths and interests in this highly independent setting which may require out-of-school or off-campus time. Examples of opportunities might include Film Festivals, Commercials, Print Advertisement, T-Shirt Design, Murals, the opportunities are endless. **FEE: \$20.00**

PHYSICAL EDUCATION

Tae Kwon Do I - IV

Learn basic self-defense skills, physical fitness, discipline and sports competition in this traditional martial art. Physical Education (PE) uniforms are required and available in the school store. Tae Kwon Do uniforms are optional and available from the instructor for an additional fee.

HOPE - Course required for Graduation

The purpose of this course is to develop and enhance healthy behaviors that influence lifestyle choices and student health and fitness. **PE uniform is required.**

FEE \$10.00

Life Fitness I - II

Prerequisite: HOPE

Get in shape and learn how to stay that way learning the disciplines of stretch, strength and variety in classes including sports, yoga and aerobic activities. Some power walking and running included.

PE uniform is required.

FEE \$10.00

Recreational Activities

Prerequisite: HOPE

The purpose of this course is to enable students to develop knowledge and skills in a variety of recreational activities and improve health related fitness. Content of this course will include history, terminology, etiquette, rules, correct techniques, strategies, and physical benefits. Physical assessments and knowledge assessments are included. **PE Uniform required.**

FEE \$10.00

ACADEMIC ELECTIVES

Foreign Languages: The following meets foreign language requirements for Bright Futures and University Admissions.

Spanish I-IV

These courses will enable students to begin to acquire proficiency in Spanish through linguistic, communicative, and cultural approach to language learning. Emphasis is placed on the development of listening, speaking, reading and writing skills and on acquisition of the fundamentals of applied grammar.

French I-IV

These courses will enable students to begin to acquire proficiency in French through linguistic, communicative, and cultural approach to language learning. Emphasis is placed on the development of listening, speaking, reading and writing skills and on acquisition of the fundamentals of applied grammar.

Research Reading

Required if FSA ELA score in reading is a Level 1 or 2.

Psychology I & II

Grades 11 - 12

Through the study of psychology, students acquire an understanding of an appreciation for human behavior, behavior interaction and the progressive development of individuals. This will better prepare them to understand their own behavior and the behavior of others.

Advanced Placement – Psychology

AP Psychology course is designed to introduce students to the systematic and scientific study of the behavior and mental processes of human beings. The class follows a curriculum designed to prepare students for the AP Psychology Exam. Students are exposed to the psychological facts, principles, and phenomena associated with each of the major subfields within psychology. This course is intended to be a college-level class and requires academically rigorous readings outside the class.

Students are expected to take the AP Psychology exam in May.

Florida History

Grades 10 - 12

The purpose of this course is for students to understand the history and current trends of the state of Florida through various experiences within and outside the classroom. The motto of the class is to experience the “real” Florida, which includes field trips to DeSoto National Memorial, Payne’s Prairie (overnight camping), Little Manatee River (canoe trip), Myakka State Park, Itchetucknee Springs (tubing), Florida Eco Safari (overnight horseback safari), and various others. As members of a democratic society, the goal of the class is to help students make connections with their local community, state, and natural environment in order to become leaders and stewards of their state and nation. **Semester long course. To be taken in conjunction with Vietnam History.**

The History of the Vietnam War **Grades 10 - 12**

The purpose of the course is to help students understand the causes and effects of this controversial war, along with making connections with current wars and issues today. Furthermore, students will examine the other issues of the Vietnam era, which includes the Civil Rights Movement, media, student protests, the hippie movement, etc. This course offers a unique and diverse look at the Vietnam era, which will be taught and learned through guest speakers, documentary films, letters, photography, music and literature.

Semester long course. To be taken in conjunction with Florida History.

Film & The Humanities

This course is intended as a journey through the world of film, for a sampling of the thought and accumulated critical opinion that forms the basis of the modern stature of 100 years of film-making, as art or culturally important dramatic work. Learn about film-analysis, discussion of film, the period genres and movements in film-style, and more.

FEE \$10.00

Personal Financial Literacy

How money smart are you? The various aspects of finances are not always easy to teach or learn, so this course strives to be a comprehensive, yet simple overview of various financial topics like banking, budgeting and saving, credit and debt, insurance and financial frauds and scams. The outcome is simple: to help students understand the importance of the financial world, including planning and managing money wisely. Areas of study include: sources of income, budgeting, banking, consumer credit, credit laws and rights, personal bankruptcy, insurance, spending, taxes, investment strategies, savings accounts, the stock market, buying a vehicle, and living independently. Based on the hands-on skills and knowledge applied in this course, students will develop financial goals, and create realistic and measurable objectives to be MONEY SMART!

Career Research and Decision Making (with Digital Technology)

During this course students will focus on who they are, what they want to do, and how they can get there. Students will reflect on their learning styles, leadership styles, and interests. They will refine their skills of time management, organization, public speaking, note taking and other skills important to student success. They will investigate career fields that are matched with their interests. This study will include job responsibilities, postsecondary education requirements, and job outlook. In addition, students will learn how to write a resume, search for a job, and participate in an interview. After they have identified potential career fields, students will research the postsecondary education necessary for their desired career, including the institutions offering the training/degree program, registration requirements, the application process, financial aid, and scholarships. When students have a clearer picture of life after high school, they will be better prepared to plan their life in high school. The activities in this course will help students organize the courses they will take while in high school. This will show students a clear connection between their high school courses and plans for adult life. **FEE \$30.00**

Health Career Explorations and Internship I

Prerequisite: Career Research and Decision Making. Grades 10-12 Are you interested in exploring and experiencing a possible career path in the medical/health field? The purpose of this course is to provide a practical introduction and exploration of Health Careers. Students will have choices and have the opportunity to have direct contact with medical health professionals in the local community.

FEE \$30.00

The content will include, but not be limited to, the following:

- exploration of career paths in the medical/health field
- discussion of professional job requirements
- awareness and knowledge of career opportunities
- building vocabulary appropriate to the area of professional interest
- development of decision-making skills
- development of personal and educational job-related skills
- development of a college and career portfolio

Health Career Explorations and Internship II

Prerequisite: Health Career Explorations and Internship 1, with a passing grade of 80% on portfolio Grades 11-12 Level 2 of the Health Career Explorations program is organized into two semesters that will focus on clinical skills and simulations, laboratory procedures, OSHA Training, computerized medical billing, and electronic medical records. There will also be various field trips to various health-related colleges/universities around the state of Florida. Students will also have the opportunity to join HOSA, which is a national organization for future health professionals. The mission of HOSA is to empower HOSA-Future Health Professionals to become leaders in the global health community through education, collaboration, and experience. Students will have the opportunity to attend conferences, earn scholarships and participate in competition events.

FEE \$30.00

Health Research

Prerequisite: Health Career Explorations and Internship 1, with a passing grade of 80% on portfolio Grade 12 ONLY. While working with their teacher, students will explore an academic topic, problem, or issue that interests them and design, plan, and conduct a year-long research-based investigation to address it. The course culminates in an academic paper of 4,000- 5,000 words and a presentation, with an oral defense. Students will complete scientific research if they are on the Health Career Track. **FEE \$30.00**

Principles of Business and Entrepreneurship

Prerequisite: Career Research and Decision Making. Grades 10-12. This is the first course of a series of courses in our upcoming new Business Academy. The program is designed for students who may have an interest in starting any type of business in the future. The program will also include an arts management track for visual and performing art students who may want to start a dance studio, sell art, record music, manage a theatre, or any other type of business related to the arts.

This initial course provides instruction in the basic principles of entrepreneurship including the role of the entrepreneur, entrepreneurship as a career, ethics in business, and the principles of marketing, financing, and managing a business. Students will be engaged in identifying strategies and methods for generating a business idea, identifying trends in business, and outlining steps in developing a new business. Students will learn about the different forms of business ownership, including corporations, LLC's, franchising, and licensing. Students will learn the basic principles of accounting, marketing, sales, and developing a marketing plan. This class will include guest speakers and trips to local businesses. At the conclusion of the course, students will have a complete understanding of all aspects of planning and implementing a strategic business plan to successfully start and run their own business. **FEE \$25.00**

Business Management and Law

Prerequisite: Principles of Business and Entrepreneurship - This course is designed to provide an introduction to business management techniques. Topics include human relations, decision making, communication techniques, and business-related legal concepts. The student will learn the five (5) functions of management: planning, organizing, staffing, directing, and controlling. They will also learn about leadership styles and exemplify characteristics of effective leaders. **FEE \$25.00**

Creative Writing I&II

The purpose of this course is to enable students to develop and use grade 9-10 writing and language skills for creative expression in a variety of literary forms. Studying and modeling a variety of genres will be emphasized at this level of creative writing, including personal and dramatic narratives, various poetic forms, screenplays and multimedia productions, multi-genre and creative non-fiction selections, and digital writing platforms. This is a class for dreamers, for artists, for the students who see entire worlds in their imaginations and who want the tools to bring them to life. In this class, all major forms and genres of creative writing will be explored: poems, short stories, novels, nonfiction, and play writing. It can be fantasy or romance, protest or meditation, science fiction or historical fiction, reportage or memoir. The point is to be exposed to the written word in as many ways as possible, in order for you, and the writer within, to discover what is inside of yourself and what is important in this world and beyond.

FEE \$10.00

Sociology/Women's Studies

Sociology will provide students with the opportunity to acquire an understanding of group interaction and its impact on individuals. Content to be covered will include, but not be limited to, an understanding of the methods of study employed by sociologists, social institutions and norms, social classes, relationships between the sexes, racial and ethnic groups, the handicapped, societal determinants, group behavior, the socialization process (including the transmission of group behavior), social deviation, social conflict, social roles, social stratification, social participation, and the role of social organizations and institutions (including their interrelationships and interdependence).

Women's Studies will enable students to develop a basic understanding of women throughout history, of individual women who have shaped history and world today, and of contemporary issues that impact the lives of women today. The social studies disciplines included in this course are American and World history, economics, sociology and psychology.

Dual Enrollment - Communication Dynamics (SPC 1608)

Prerequisite or concurrent enrollment: ENC 1101 This course is one of the three required courses which satisfy the Communication portion of the Florida General Education Core. This course focuses on the process and practice of Human Communication in its various forms. Students will have the opportunity to develop skills in Interpersonal Communication; Public Speaking; Persuasion/Debate; and Message Analysis. Students will also have the opportunity to develop and hone their Performance and Interpretation Skills, and study non-traditional modes of human communication and performance.

MATHEMATICS
4 credits required for graduation
(Algebra I, Geometry and two higher)

Algebra I and Pre-AP Algebra

In Algebra 1, instructional time will emphasize five areas: (1) performing operations with polynomials and radicals, and extending the Laws of Exponents to include rational exponents; (2) extending understanding of functions to linear, quadratic and exponential functions and using them to model and analyze real-world relationships; (3) solving quadratic equations in one variable and systems of linear equations and inequalities in two variables; (4) building functions, identifying their key features and representing them in various ways and (5) representing and interpreting categorical and numerical data with one and two variables. **Graduation requirement and STUDENTS MUST PASS EOC EXAM TO GRADUATE.**

Geometry and Pre-AP Geometry

Prerequisite: Algebra I In Geometry, instructional time will emphasize five areas: (1) proving and applying relationships and theorems involving two-dimensional figures using Euclidean geometry and coordinate geometry; (2) establishing congruence and similarity using criteria from Euclidean geometry and using rigid transformations; (3) extending knowledge of geometric measurement to two-dimensional figures and three-dimensional figures; (4) creating and applying equations of circles in the coordinate plane and (5) developing an understanding of right triangle trigonometry.

GRADUATION REQUIREMENT

Algebra II and Algebra II Honors

Prerequisite: B-average or higher in both Algebra I and Geometry, or permission from the instructor In Algebra 2, instructional time will emphasize five areas: (1) extending arithmetic operations with algebraic expressions to include radical and rational expressions and polynomial division; (2) graphing and analyzing functions including polynomials, absolute value, radical, rational, exponential and logarithmic; (3) building functions using compositions, inverses and transformations; (4) extending systems of equations and inequalities to include non-linear expressions and (5) developing understanding of the complex number system, including complex numbers as roots of polynomial equations. **Requirement for Scholar Designation**

Pre-Calculus Honors

Prerequisite: B-average or higher in Algebra II, or permission from the instructor In Precalculus Honors, instructional time will emphasize six areas: (1) extending right triangle trigonometry to unit circle trigonometry and trigonometric functions; (2) extending understanding of functions to trigonometric; (3) developing understanding of conic sections; (4) representing and performing operations with complex numbers and vectors in the coordinate plane; (5) extending understanding of relations in the plane using parametric representations, including polar coordinates and (6) analyzing arithmetic and geometric sequences and series.

Probability and Statistics Honors

Prerequisite: Algebra II - In Probability and Statistics Honors, instructional time will emphasize four areas: (1) creating and interpreting data displays for univariate and bivariate categorical and numerical data; (2) comparing and making observations about populations using statistical data, including confidence intervals and hypothesis testing; (3) extending understanding of probability and probability distributions and (4) developing an understanding of methods for collecting statistical data, including randomized trials. **A statistical calculator is required for this course (TI-83+)**

Business Math (Mathematics for Data and Financial Literacy)

Prerequisite: Successful completion of Algebra I and Geometry. In Mathematics for Data and Financial Literacy, instructional time will emphasize five areas: (1) extending knowledge of ratios, proportions and functions to data and financial contexts; (2) developing understanding of basic economic and accounting principles; (3) determining advantages and disadvantages of credit accounts and short- and long-term loans; (4) developing understanding of planning for the future through investments, insurance and retirement plans and (5) extending knowledge of data analysis to create and evaluate reports and to make predictions.

Discrete Mathematics

Prerequisite: B-average or higher in Algebra II, or permission from the instructor In Discrete Mathematics Honors, instructional time will emphasize five areas: (1) extending understanding of sequences and patterns to include Fibonacci sequences and tessellations; (2) applying probability and combinatorics; (3) extending understanding of systems of equations and inequalities to solve linear programming problems; (4) developing an understanding of Graph Theory, Election Theory and Set Theory and (5) developing an understanding of propositional logic, arguments and methods of proof.

Math for College Liberal Arts

Prerequisite: Algebra II. In Mathematics for College Liberal Arts, instructional time will emphasize five areas: (1) analyzing and applying linear and exponential functions within a real-world context; (2) utilizing geometric concepts to solve real-world problems; (3) extending understanding of probability theory; (4) representing and interpreting univariate and bivariate data and (5) developing understanding of logic and set theory.

Math For College Algebra

Prerequisite: Algebra II In Mathematics for College Algebra, instructional time will emphasize five areas: (1) developing fluency with the Laws of Exponents with numerical and algebraic expressions; (2) extending arithmetic operations with algebraic expressions to include rational and polynomial expressions; (3) solving one-variable exponential, logarithmic, radical and rational equations and interpreting the viability of solutions in real-world contexts; (4) modeling with and applying linear, quadratic, absolute value, exponential, logarithmic and piecewise functions and systems of linear equations and inequalities; (5) extending knowledge of functions to include inverse and composition.

ENGLISH

4 credits required for graduation

English I – IV & Honors

This course is designed to provide integrated educational experiences in the language arts strands of reading, writing, listening, viewing, speaking, language and literature.

Advanced Placement - English Literature and Composition Grade 12

Prerequisite: A/P English Language and Composition

AP Literature is a rigorous, college level course. Students will read and analyze a variety of imaginative literature. Close reading of texts will examine structure, style, themes, imagery, symbolism, and tone as well as figurative language with a close focus on historical context. Students will be required to read several novels outside of class and to write about their reading in several different formats including research, analyses and syntheses, expository, and argumentative essays. At the year, students have the option to take the AP Literature and Composition Exam for possible college credit.

Advanced Placement - English Language and Composition Grades 11 & 12

Prerequisite: A/B Average in English I/Pre-AP English I or a C in a Dual Enrollment course and Instructor Approval

AP Composition is a rigorous, college level course. The primary goal is to develop the reading and writing skills that students need for college success and for intellectually responsible civic engagement. The reading and writing students do in the course will deepen and expand understanding of how written language functions rhetorically: to communicate writers' intentions and elicit readers' responses in particular situations. The course cultivates the rhetorical understanding and use of written language by directing students' attention to writer/reader interactions in their reading and writing of various formal and informal genres.

Dual Enrollment - Written Communication I (ENC 1101)

Prerequisite: 106 or better on PERT Reading Test AND 103 or better on PERT Writing Test

This course meets Area I requirement for the A.A., A.S., and A.A.S. general education requirements, and the 6000 word Gordon Rule requirement. This course encompasses grammar and diction review, composition, expository writing, work with primary and multiple source themes, instruction in the use of the library and writing research papers, and practice in oral communication.

Dual Enrollment - Written Communication II (ENC 1102)

Prerequisite: ENC 1101 This course meets Area I requirement for the A.A. general education requirements, and the 6000 word Gordon Rule requirement. While instruction in composition, rhetoric, grammar and research is continued from ENC 1101, course content includes an introduction to literature with emphasis on reading critically and analytically, understanding literary terminology and techniques, and writing about literature.

SOCIAL SCIENCE

3 Social Science credits required for graduation (World History, American History, US Government and Economics)

World History

Students explore historical themes throughout the course in order to make connections among historical developments in different times and places encompassing the five major geographical regions of the globe: Africa, the Americas, Asia, Europe, and Oceania. **This course fulfills the World History requirement for graduation.**

Pre-AP World History

Prerequisite: U.S. History Honors AND FSA Score of 3, 4, or 5

World History Honors students investigate significant events, individuals, developments, and processes from world history to develop the same thinking skills and methods (analyzing primary and secondary sources, making historical comparisons, chronological reasoning, and argumentation) employed by historians when they study the past. Students explore historical themes throughout the course in order to make connections among historical developments in different times and places encompassing the five major geographical regions of the globe: Africa, the Americas, Asia, Europe, and Oceania. This course is designed to prepare students for the rigors of both Advanced Placement and Dual Enrollment classes. **This course fulfills the World History requirement for graduation.**

American History & Honors

The purpose of this course is to enable students to understand the development of the U.S. within the context of history, with a major focus on the post Reconstruction period.

American Government & Honors **12th Grade ONLY**

The purpose of this course is to enable students to gain an understanding of American Government and political behavior that is essential for effective citizenship and active involvement in a democratic American society. **Semester long course. This course fulfills the Government requirement for graduation.**

Economics & Honors

12th Grade ONLY

The purpose of this course is to provide students with the knowledge and decision-making tools necessary for understanding how society organizes its limited resources to satisfy its wants. Students will gain an understanding of choices they must make as producers, consumers, investors, and taxpayers. **Semester long course. This course fulfills the Economics requirement for graduation.**

AP U.S. Government and Politics **12th Grade only**

Prerequisite: FSA score 4 or 5 OR PSAT score 950 + and Attendance 90% or above during previous school year. AP U.S. Government and Politics provides a college-level, nonpartisan introduction to key political concepts, ideas, institutions, policies, interactions, roles, and behaviors that characterize the constitutional system and political culture of the United States. Students study U.S. foundational documents, Supreme Court decisions, and other texts and visuals to gain an understanding of the relationships and interactions among political institutions, processes, and behavior. They also engage in disciplinary practices that require them to read and interpret data, make comparisons and applications, and develop evidence-based arguments. **Students are expected to take the AP Exam in the Spring. This course fulfills the Government requirement for graduation.**

AP Macroeconomics

12th Grade Only

Prerequisite: FSA score 4 or 5 OR PSAT score 950 + and Attendance 90% or above during previous school year AP Macroeconomics is an introductory college-level macroeconomics course. Students cultivate their understanding of the principles that apply to an economic system as a whole by using principles and models to describe economic situations and predict and explain outcomes with graphs, charts, and data as they explore concepts like economic measurements, markets, macroeconomic models, and macroeconomic policies. **Students are expected to take the AP Exam in the Spring. This course fulfills the Economics requirement for graduation.**

AP World History

PREREQUISITES: US History Honors OR World History Honors AND FSA score of 4 or 5 OR PSAT score of 950+ AND Attendance rate of 90% or above during previous school year

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 from approximately 1200 C.E. to the present. Students develop and use the same skills, practices, and methods employed by historians: analyzing primary and secondary sources; making historical comparisons; utilizing reasoning about contextualization, causation, and continuity and change over time; and developing historical arguments. 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. **Students enrolled in AP World History are expected to take the AP Exam in May. This course fulfills the World History requirement for graduation.**

SCIENCE

3 credits required for graduation

Physical Science

This multifaceted course focuses on labs, hands-on activities, arts assignments, group learning, and multimedia to explore the basics of chemistry and physics. Students actively participate in the exploration of these topics by specifically studying matter, work, energy, and the laws of motion. Topics include the scientific method, the metric system, classification of matter, states of matter, gas laws, properties of atoms, the Periodic Table, chemistry basics, force and motion, energy, electricity, magnetism and waves. An additional objective of this course is to provide multiple opportunities for students to fine tune laboratory skills and prepare students for success in future science courses.

Lab fee: \$30.00.

Physical Science Honors

Prerequisite: 3 or higher on the 8th grade FSA, a B average or higher in science, and teacher recommendation. This multifaceted course focuses on labs, hands-on activities, arts assignments, group learning, and multimedia to explore the basics of chemistry and physics. Students actively participate in the exploration of these topics by specifically studying matter, work, energy, and the laws of motion. Topics include the scientific method, the metric system, classification of matter, states of matter, gas laws, properties of atoms, the Periodic Table, chemistry basics, force and motion, energy, electricity, magnetism and waves. An additional objective of this course is to provide multiple opportunities for students to fine tune laboratory skills and prepare students for success in future science courses.

Lab fee: \$30.00.

Biology

The purpose of this course is to provide exploratory experiences and laboratory and real-life applications in the biological sciences from the simple cell to the diversity of the environment. Topics will include cell biology, biochemistry, evolutionary science, ecology, environmental sciences, and human anatomy. **This course is required for graduation.**

Lab fee: \$30.00

Pre-AP Biology

Biology is the study of living organisms, their origins, how they survive, reproduce, change over time, and interact with each other and their environments. The Pre-AP Biology curriculum is an introductory course taught in two semesters and counts as a high school class. The primary objective of the course is to provide students with a fundamental understanding of modern biology and scientific processes, building a foundation for success in the college level AP courses to follow.

Pre-AP Biology is recommended for high-achieving students and for students who have a particular interest in biology and the natural sciences. The course places a higher priority on developing critical thinking skills by examining real world problems. Laboratory investigations play a more prominent role in the Pre-AP course. **This course fulfills the Biology requirement for graduation. Lab fee: \$30.00**

Physics

Grades 10 - 12 ONLY

Prerequisite: Completion of Algebra I with a "B" or higher. Physics is a course that fulfills one of the three Science courses needed to graduate by using Motorsports as a theme. Data collection and motorsports application of physics will occur in student driven lab vehicles at least once a month at a nearby closed course race track.

Lab fee: \$50.00.

Advanced Placement Biology

Prerequisite: Passed Biology with a B or higher, 3 or higher on the Biology EOC, Chemistry, and teacher recommendation. AP Biology is a rigorous, hands-on, demanding course, which is equivalent to a two-semester introductory college biology course. This class will focus on enduring conceptual understandings and the content that supports them, which will allow students to focus on inquiry-based learning of essential concepts and developing reasoning skills necessary to engage in the science practices used throughout their study of AP Biology. There are four Big Ideas and 12 mandatory labs that will be taught in great detail and assessed on the AP exam. You will be required to work hard and keep up with the rigorous curriculum. **Students are required to take the exam in May. Lab fee: \$30.00**

Zoology

Prerequisite: Successfully passed Biology with a "C" or higher. In this elective class we will be exploring the evolution, taxonomy, behavior, ecology, and the anatomy and physiology of the animal kingdom; primarily vertebrates: fish, reptiles, amphibians, birds, and mammals. There will be several mandatory fieldwork trips to places like Lowry Park Zoo, Busch Gardens husbandry department, The Center for Great Apes, manatee dissections at Florida Fish and Wildlife, many vertebrate dissections, and FWC. **Lab fee: \$30.00. DOES NOT MEET SCIENCE REQUIREMENT FOR BRIGHT FUTURES**

Chemistry

Chemistry is an inquiry-based course that examines matter and the changes it undergoes. This course is designed for students who have shown a proficiency in studying science and who have exhibited interest in and enthusiasm for science. This course is intended to help students realize the important role that chemistry will play in their personal and professional lives. The course will cover essential topics to give students a firm foundation for classes that may be taken later and for the chemistry experienced in everyday life. Students will also learn reading and studying strategies to help them become more effective readers, learners, and thinkers. Topics include laboratory skills, conceptual applications, atomic structure, periodic table, chemical bonding and reactions, acids and bases, and gas laws.

Lab fee: \$30.00.

Chemistry Honors

Chemistry is an inquiry-based course that examines matter and the changes it undergoes. This course is designed for students who have shown an advanced proficiency in studying science and who have exhibited interest in and enthusiasm for science. This course is intended to help students who may be interested in a career in science, engineering, or health-related fields realize the important role that chemistry will play in their personal and professional lives. Students will use principles of chemistry to think more critically about issues they encounter involving science and technology. The design of this course is intended to help students prepare for the rigors of lab-science courses that may be encountered in college. Topics include laboratory skills, mathematical applications, atomic structure, periodic table, chemical bonding and reactions, acids and bases, and gas laws. A strong background in reading, writing, and algebra I is essential.

Lab fee: \$30.00.

Marine Science Honors

Prerequisite: Passed Biology with a C or higher, 3 or higher on the Biology EOC, and teacher recommendation. This course is for students who are seriously interested in possibly pursuing marine science or animal science in college, or to gain a better understanding of the marine environment, which surrounds our local area. This class will cover a variety of topics, such as the history and technology of marine science, marine ecology, the Tampa Bay estuary, the deep sea, oceanography, structure and function of marine ecosystems, marine invertebrates, and human interaction with the sea. There are several mandatory labs that we conduct in the field, which include the Florida aquarium, plankton sampling, invertebrate dissections, kayaking, beach seining, snorkeling, mangrove and seagrass ecology, mark and recapture of fish, and species collection and identification. **Lab fee: \$30.00 and \$20.00 for aquarium.**

Anatomy and Physiology Honors

Prerequisite: Passed Biology with a C or higher, 3 or higher on the Biology EOC, and teacher recommendation. Anatomy and Physiology is a laboratory-based course that investigates the structure and function of the human body. Content will include the basic organization of the body, major body systems and the impact of disease. Students will engage in many topics and competencies related to understanding the structure and function of the human body. These topics range from basic anatomical terminology to the biochemical composition of the human body with detailed focus on each of the major body systems. Students will learn through PowerPoint presentations and guided notes, case study reviews, collaborative group work, arts infusions projects, and labs/dissections. Students will be responsible for proper use of lab equipment, lab reports, and projects assigned throughout each unit. **Dissections are mandatory.**

Lab fee: \$30.00.

Forensic Sciences I

Prerequisite- successfully passed Biology. Forensic science I is a year-long, elective course, designed to explore the science used in crime investigations, while incorporating concepts from biology, chemistry, and math. The course has a strong emphasis on field work, inquiry, and problem solving. Throughout the year, working as a team is stressed, as each unit requires thorough investigative work by a group and each team member must contribute to the activities. A few of the areas covered will include: crime scene documentation, fingerprint development, blood spatter analysis, entomology (insects), excavation, etc.

Lab fee:\$30.00.

Earth Space Science

Earth and Space Science is the study of the processes that shape the Earth and explain the universe. This course will explore the four main branches of Earth Science, which includes the following: geology, oceanography, meteorology, and astronomy. In this physical science course, students will learn in detail about the Earth's interior and the theory of plate tectonics. Students will learn about Earth's systems and their interactions. Students will also explore the current theories that describe the formation of Earth, our Solar System, and the universe. Students will learn about the relationship between Earth Science and technology.

Lab fee:\$30.00

Environmental Science

Environmental science is the study of patterns and processes in the natural world and their modification by human activity. This course will give you the skills necessary to address the environmental issues we are facing today by examining scientific principles and the application of those principles to natural systems. This course will survey some of the many environmental science topics at an introductory level, ultimately considering the sustainability of human activities on the planet. **Lab fee: \$30.00**

Environmental Science Honors

Prerequisites- passed the 8th grade Science FSA and teacher recommendation. Environmental science is the study of patterns and processes in the natural world and their modification by human activity. This course will give you the skills necessary to address the environmental issues we are facing today by examining scientific principles and the application of those principles to natural systems. This course will survey some of the many environmental science topics at an introductory level, ultimately considering the sustainability of human activities on the planet.

Lab fee: \$30.00

AP Environmental Science

Prerequisite: Passed Biology with a B or higher, 3 or higher on the Biology EOC, and teacher recommendation. The goal of the AP Environmental Science course is to provide students with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world, to identify and analyze environmental problems both natural and human-made, to evaluate the relative risks associated with these problems, and to examine alternative solutions for resolving or preventing them. Environmental science is interdisciplinary; it embraces a wide variety of topics from different areas of study. Yet there are several major unifying constructs, or themes, that cut across the many topics included in the study of environmental science. The following themes provide a foundation for the structure of the AP Environmental Science course.

- 1. Science is a process.
- 2. Energy conversions underlie all ecological processes.
- 3. The Earth itself is one interconnected system.
- 4. Humans alter natural systems.
- 5. Environmental problems have a cultural and social context.
- 6. Human survival depends on developing practices that will achieve sustainable systems.

Lab fee 30.00