



Frankfort-Schuyler
CENTRAL SCHOOL

2023-2024
Course of Study Book

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Telephone Numbers

Frankfort-Schuyler Elementary School..... (315) 895-7461
High School / Middle School

Superintendent.....(315) 894-5083

Guidance

Ms. Nicole Ruddy
Guidance Counselor

Mrs. Andrea Cordero
Guidance Counselor

Program Planning

The guidance department is the clearinghouse for questions relating to subject choice and program planning.

An important task of the counselors is to help students interpret course offerings in view of their own educational and career vocation plans. They provide source materials and information concerning career opportunities and training beyond high school. Individual scheduling conferences are held with all students. Parents are always encouraged to attend.

Individual schedules must be completed for all students in grades 9-12. Further counseling is necessary in case of conflicts in subject choice and in the event of course failure. Failing students may be advised to attend summer school, to repeat subjects next term, or to change their programs. Students in this category should contact the guidance office as soon as their status is known.

Appointments to discuss course changes may be made throughout the summer.

Support Services

In addition to program planning, special services are available to students in the areas of counseling, individual testing, speech therapy, occupational therapy, and physical therapy; as well as those who are identified by the Committee on Special Education (CSE). All of the above are administered by specialists on an individual or group basis. Parents and/or students may contact the CSE chairperson to discuss any related concerns/questions.

Course Selection Procedures

Student selection of courses typically takes place in early spring. Counselors meet with students to review previously completed course work and the requirements for graduation. Parents are encouraged to participate in the process. Notification will be sent home when the process begins.

Graduation Requirements

The Board of Education minimum standards and the New York State Regents minimum standards are required for graduation from high school.

All school programs have one main purpose even though they provide a variety of experiences to students. This purpose is to help all students develop and acquire the skills, abilities, knowledge, and attitude necessary to work toward high school graduation. Eligibility of a student for a High School or a New York State Regents Diploma will be determined by the high school principal on the basis of the official high school record. Students who meet the requirements may be issued a diploma.

Diploma Requirements

Required Units of Credit

Courses	Diploma	
	Regents	Advanced Regents
English	4	4
Social Studies (a)	4	4
Mathematics	3 (b)	3 (b)
Science	3 (b)	3 (b)
Health	0.5	0.5
The Arts (c)	1	1
Core Credits (subtotal)	16	16
World Languages	1	(e)
Physical Education (g)	2	2
Sequence Courses/Electives [WL, CTE, The Arts] (d, f)	3.5	4.5 (e)
Total Required (minimum)	22	22

Examinations

Minimum Testing Requirements	Diploma	
	Regents	Advanced Regents
RE English	Yes	Yes
RE Mathematics	Yes (i)	Yes (i)
2nd RE Mathematics	No	Yes (i)
3rd RE Mathematics	No	Yes (i)
RE Global History & Geography	Yes	Yes
RE U.S. History & Government	Yes	Yes
RE Science	Yes	Yes
2nd RE Science	No	Yes

Footnotes

- (a) Four credits required, including 1 unit in U.S. history and government and 1/2 unit each in participation in government and economics.
- (b) Amendment to section 100.5 approved moving to a 65 as the passing score for Regents Exams. The transition will be phased in as follows:
- (c) Students may meet the learning standards in technology either through a course in technology education or through an integrated course combining technology with mathematics and/or science. A commencement-level course in technology education may be used as the third unit of credit in science or mathematics, but not both.
- (d) The arts include dance, music, theater, and visual arts.
- (e) Only those students completing a sequence of not less than 5 units of credit in career and technical education (CTE) or the arts may substitute another 5-unit sequence in place of the 3 units in a World Language.
- (f) To earn the advanced designation, the student must complete one of the following:
- A language other than English (total of 3 credits).
 - CTE (5 credits), plus one credit in World Language.
 - The arts (5 credits), plus one credit in World Language.
- (g) For students entering grade 9 prior to the fall of 2001, participation in physical education is required at the equivalent of 1/2 unit of study per year. Starting with 9th graders entering in 2001, 2 units of credit in physical education are required for graduation.
- (h) Districts may establish a passing score no lower than 55.
- (i) By scoring ≥ 65 on Regents in Algebra I, Geometry and Algebra II, or by scoring ≥ 65 on Algebra I.
- (j) Elective offerings will change from year to year in response to student interest.

Advanced Placement Course Policy

I. Criteria for student enrollment in advanced placement courses shall be the following:

- A. Specify that a minimum grade of 85 on both the United States History and Global History Regents Exam is required for enrollment in the AP U.S. Government and Politics.

Specify that a minimum grade of 85 on both the Geometry and Chemistry Regents Exams is required for enrollment in the AP Calculus Course.

Specify that a minimum Grade of 85 on the English Language Arts Regents Exam is required for enrollment in the AP English Course.

Specify that a minimum Grade of 85 on both the Biology and Chemistry Regents Exams is required for enrollment in the AP Biology Course.

- B. Student must have teacher recommendation.
- C. In situations when a student has not earned an 85, but has performed exceptionally well in the class, teacher recommendation for course enrollment will be considered. An appeals process will be available to students. The process will involve a review and discussion of available information, with a decision made as to the student enrollment in the course. The appeals committee shall consist of: the High School Principal, Guidance Counselor and the Teacher of the AP course for which the student is requesting enrollment.
- D. In situations where there is low enrollment for a course and we are unable to offer the course traditionally, students will have the option to register for the AP Course through an online course program. Students should contact Ms. Ruddy if they are interested in taking the course online to complete the necessary paperwork.

Frankfort-Schuyler Central School District

Adopted: 12/06/05

Revised: 12/19/18

Recognition Of Graduating Seniors Policy

- I. A. Ranking shall be completed at the end of the third marking period of the senior year.
- B. All computations for class rank shall be made by the Guidance Department, under the supervision of the High School Principal.
- C. Advanced Placement Courses represent a significant academic challenge. Grades for Advanced Placement Courses, therefore, shall be weighted by adding ten (10) points to the final grade for the purpose of calculating grade point average (G.P.A.).
- II. A. Any student achieving a 90-93 cumulative Grade Point Average at the end of the third marking period of the Senior year will be awarded his/her diploma “With Honors” as a separate and distinct designation.
- B. Any student achieving a 94-95 cumulative Grade Point Average at the end of the third marking period of the Senior Year will be awarded his/her diploma “With High Honors” as a separate and distinct designation.
- C. Any student achieving a 96+ cumulative Grade Point Average at the end of the third marking period of the Senior Year will be awarded his/her diploma “With Highest Honors” as a separate and distinct designation.
- III. A. Students graduating with Honors, High Honors or Highest Honors will be recognized at Graduation.
- B. The student who achieves Rank One shall be named Valedictorian. The student who achieves Rank Two shall be named Salutatorian.
- C. The Top 10% of the Class will be designated. In order to qualify for the Top 10%, Valedictorian or Salutatorian, students must have earned an Advanced Regents Diploma. In addition to an Advanced Regents Diploma, students must have successfully completed the following:
 - **4 credits in math**
 - **4 credits in science**

IV. SUMMARY

- A. The District will recognize the Valedictorian, Salutatorian and Top 10% at graduation.
- B. To Qualify for Valedictorian, Salutatorian, or Top 10%, a student must have earned an Advanced Regents Diploma, and successfully completed 4 credits in math, and 4 credits in science.
- C. Advanced Placement Courses shall have a grade weighting of ten (10) points, for the sole purpose of determining Grade Point Average.
- D. The final Grade Point Average shall be determined at the end of the third marking period of the Senior Year.
- E. This policy shall be in effect with the Class of 2016.

Frankfort-Schuyler Central School District

Adopted: 02/18/71, 08/18/98, 01/10/06

Revised: 07/08/14, 09/09/14, 12/14/21

Art

Digital Art & Design

1 Credit

Digital Art and Design is intended for 9th-12th grade students who are creative but not confident in, or intrigued with, traditional 2D and 3D mediums such as ceramics, sculpture, drawing and painting. This course introduces students to the principles of graphic design and visual communication. Emphasis will be placed on the design-process using methods, strategies, and techniques to create original student artwork. Students will learn and apply their knowledge of the elements and principles of design in order to strengthen their ability to visually communicate ideas. We will explore a range of design techniques using various art materials and software programs such as Adobe Photoshop. Students will analyze, critique artworks and learn about the origins of graphic design in the history of art. Students will be exposed to a variety of disciplines within the Graphic Design field, which include but are not limited to logo design, photography basics, file management, photo manipulation, typography, digital painting, and illustration.

Course Topics:

- Photography
- Adobe applications
- File management
- Composition
- Careers in graphic design
- The elements of art and principles of design
- Copyright law and commercial and artistic integrity
- Art history and contemporary design trends
- Evaluating art and digital media
- Presentation of your digital art portfolio

Studio Art

1 Credit

Studio Art is an introductory level course designed for both the student who wishes to pursue a sequence in art or to fulfill the graduation requirement. The first half of the course focuses on the elements and principles of art, development of visual communications basic skills, and an introduction to art history and the use of MS PowerPoint. The second half of the year deals with the incorporation of these skills in a variety of design projects and new media applications. Student production is emphasized through the creation of original works in the program including studio assignments in drawing, watercolor, and acrylic painting; design functions; computer and graphics applications; print making; ceramics; sculpture; mixed media; charcoal; pen and ink drawing; and calligraphy.

This course is designed primarily for students in grades 9 and 10 and serves as the prerequisite for the advanced art classes.

Ceramics 1

1 Credit

The introductory level deals with clays and their application in art, society, and industry. All facets of their origin, history, and types of construction are explored. Students are involved with hand building, glazing, and the organizational aspects of running a ceramics studio. Advanced levels include the solution of specific design problems and participation in studio management.

Sculpture 1

1 Credit

This course is designed for the student who wishes to work with a variety of three-dimensional media. Problems are presented in realistic and conceptual natures and are solved through using a variety of media. Technical applications, background, and limitations are covered in clay, wood, steel, paper, paint, plastic, and plaster. More advanced problems of form/space/dimension are dealt with at the advanced levels along with incorporation of more challenging media.

Drawing & Painting 1

1 Credit

Students work in all facets of drawing and painting including a variety of media and supports. Pencil, charcoal, pen and ink, and acrylic are introduced at the initial level. Students deal with a variety of technical and aesthetic problems. Advanced classes allow students to work in depth on a series of challenging assignments.

English

AP English

1 Credit

AP English is designed according to the College Board standards in order for students to meet the requirements for the AP exam in May. Course selections include short stories, poetry, drama, and novels by major authors, both traditional and contemporary. The course emphasizes critical and analytical reading and writing similar to what is expected of students in college freshman English. Students may enroll in this course just for a better preparation for college but must take the exam, which could provide exemption from freshman English. This course is *highly recommended* for those pursuing study at a four-year college.

English 12 (College Now)*

1 Credit

Partnering with Herkimer College, students are able to earn credit for English 111: Introduction to Literature, and English 112: College Writing. This year-long course will focus on formal, informal, and expository writing, writing for communication, research, note-taking and study skills, as well as college academia. Emphasis will be

on crafting thesis statements, source incorporation and citations, as well as in-depth analysis through supporting examples and evidence for clarification. Reading selections will be short fiction for analysis and non-fiction to serve as material for written assignments. * *College Now credit available.*

English 11

1 Credit

The English 11 curriculum is a study of both fiction and nonfiction texts including novels, short stories, poetry and documents. Building on previous years, students will utilize their knowledge of literary techniques, rhetorical devices, and reading comprehension strategies in order to write Regents level argument essays and text analysis responses. All assignments and assessments are structured to increase reading comprehension, writing ability, vocabulary and confidence in their ability to understand and discuss literature based in analysis as it relates to theme, symbolism and characterization. All units of instruction adhere to the NYS Common Core Standards. The course will culminate with the NYS English Language Arts Regents Exam.

English 10

1 Credit

English 10 focuses on character development through literature and non-fiction texts. Our major literature sources are *Macbeth*, *To Kill a Mockingbird*, and a novel of student choice, but all are enriched with creative and critical thinking activities, non-fiction articles, poetry, music, photography, and various opportunities to write, learn, and reflect. Students also complete an argumentative research paper on a topic of their choice using our database systems to support their reasoning. This course is completely digitally based as all materials are posted daily on Google Classroom. Lessons and notes are delivered via Google Slides and Nearpod for easy completion when students are absent. All assignments are turned in through these digital platforms as well.

English 9

1 Credit

The English 9 curriculum is a mix of contemporary and classical literature, short stories, poetry and various non-fiction pieces to supplement each unit. Writing is highly emphasized, with instruction in reading comprehension strategies, language skills, vocabulary, literary techniques, and rhetorical devices being integrated into each unit. Students are introduced to the research process, following MLA style procedures. Students will be competent in many styles of writing, various genres of reading, listening, as well as public speaking, as all units and instruction are aligned to the Common Core State Standards. English 9 is foundational for all skills required in subsequent English classes as well as the Common Core Regents taken while enrolled in English 11.

Novel Adaptations 21st Century

1/2 Credit

This elective course will focus on film adaptations of mostly contemporary works of various genres. Genres in focus include, but are not limited to: historical fiction, young adult literature, memoir, and horror. Students are expected to read the texts more quickly than a traditional English class pace and discuss their thoughts on their reading weekly. After the novel is read, the class views the film with intent to discuss the interpretations and implications of the adaptation. While the course is run like an organized book club, students' grades are heavily based on their contribution to discussion. Lastly, the heart of this course is intended to instill an enjoyment of reading for leisure within students.

Young Adult Literature

1/2 Credit

Students will read, become familiar with and critique a variety of YA texts. Chosen texts will provide opportunities for discussion and analysis of various topics related to gender, difference, identity, cultural diversity, race and class, dystopian visions, friendship/relationships, coming of age, voice and silence, technology and a range of other social and psychological themes. This course is based in discussion and we will utilize socratic seminar as a form of assessment.

Health Education

Health Education

1/2 Credit

Required for graduation

The senior high health education curriculum is based on the concept that health is the state of complete physical, mental, and social wellbeing; not merely the absence of disease (WHO). The elements of physical, mental, and social health will be implemented throughout the curriculum of study to provide students with the skills and functional knowledge to develop and maintain healthful living, while complying with the learning standards provided by the New York State Education Department.

Foreign Language

Spanish I

1 Credit

Students that have not fulfilled the one credit language requirement for graduation must take a Spanish I introductory course. This course combines the study of vocabulary, grammar, and culture of Spanish-Speaking countries. Throughout the course, students are expected to achieve a certain level of proficiency in basic Spanish communicative skills (listening, reading, writing, and speaking). This course culminates with students taking a final exam. All students must pass the course with a 65% or better to obtain the high school credit for graduation.

Spanish II**1 Credit**

In level II, students expand their knowledge of the Spanish-speaking world through a more in-depth study of the language and culture. Throughout this course, students will utilize authentic resources such as media, stories, and videos to further develop their Spanish communicative abilities. This course is the second of the three required courses that can be used to fulfill requirements towards a Regents Diploma with Advanced Designation.

Spanish III**1 Credit**

Spanish III builds upon knowledge and skills acquired during the previous two courses (Spanish I and II). This course provides a more rigorous curriculum while expanding students' linguistic and cultural awareness. It culminates with students taking the Regional (Checkpoint B) exam and preparing students for Spanish IV. Successful completion of all three language courses, and the exams given, can be used towards an advanced regents diploma.

Mathematics

Sequence 1: Accelerated Students	Sequence 2	Sequence 3	Sequence 4 BOCES Students
Geometry (9th Grade)	Algebra 1 (> 75 on 8th grade final exam)	Pre-Algebra (< 75 on 8th grade final exam)	Pre-Algebra
Algebra II	Geometry	Algebra 1	Algebra 1
Pre-Calculus	Algebra II	Geometry / Personal Finance	Integrated Math (BOCES credit)
Calculus (College Now)*	Pre-Calculus/ Statistics	*Can take additional math	*Can take additional math

Non-Regents Geometry**1 Credit**

Non-Regents Geometry continues students' early study of geometric concepts and applied Algebra. This course is intended for students that have successfully completed Algebra 1, desires a math course that prepares them for further academic study, but does not intend to major in mathematics or science. Much of the NYS Geometry Common Core curriculum will be covered within the class, but at a slower, more student-based progression. Included will be topics such as congruent triangles, right triangle trigonometry, coordinate geometry and circle geometry. Although there will be no formal proofs, students will be expected to justify their answers by applying the same theorems taught in the Regents Geometry course. A local exam is administered with the completion of this course.

Pre-Calculus (College Now)***1 Credit**

The study of polynomial, rational, trigonometric, logarithmic and exponential functions; in particular, the algebra and the curve sketching techniques involved with these functions. This course should be taken after successful completion of Algebra 2 and is a prerequisite for Calculus. **College Now credit available*

Calculus (College Now)***1 Credit**

An introduction to calculus, including functions, limits, continuity, differentiability, the derivative, the derivatives of simple functions and trigonometric functions. The course will also include applications of the derivative as well as the antiderivative and basic integration. Prerequisite: MA 141 (PreCalculus) or > 90 in Algebra II and >85 on the NYS Algebra II Regent Exam, with Teacher Recommendation

**College Now credit available*

Personal Finance**1 Credit**

The personal finance course covers all of the essential personal finance topics necessary to become a financially capable student. Topics include banking, credit, budgeting, investing, career planning and more.

Pre-Algebra**1 Credit**

This course will develop the foundational skills necessary for successful completion of Common Core Algebra. Topics of study include but are not limited to: Variables and Operations on Algebraic Expressions, Multiple Representations of Linear Equations, Proportions, Systems of Equations, Quadratics and Inequalities. Students must successfully complete Pre-Algebra with a minimum average of 65 to move on to Algebra I.

Algebra I**1 Credit**

In this course students will explore a variety of topics within algebra including linear, exponential, quadratic, and polynomial equations and functions. Students will achieve fluency in solving linear and quadratic equations as well as with manipulation of polynomials using addition, subtraction, multiplication, and factoring. Students will understand the key differences between linear and exponential functions. Students learn to model problems using algebra, functions, sequences and statistics. This course is aligned to the Next Generation State Standards for Algebra I.

Prerequisite: Math 8 Final Exam Grade above 75

Geometry**1 Credit**

In this course students will acquire tools to help them explore two-dimensional and three-dimensional space. These tools include Euclidean geometry, rigid motion transformations, dilations and similarity, and coordinate geometry. Students will learn

how to prove various geometric facts about triangles, quadrilaterals, and circles by using axiomatic proof and coordinate geometry proof. Finally, students will model real world objects using geometric formulas for perimeter, area, and volume. Three dimensional objects such as prisms, pyramids, cones, cylinders, and spheres will be used in a variety of models. This course is aligned to the Common Core State Standards for Geometry. Prerequisite: Algebra 1

Algebra II

1 Credit

In this course students will learn about a variety of advanced topics in algebra. Students will expand their understanding about functions by learning about polynomial, logarithmic, and trigonometric functions. These new functions along with linear, quadratic, and exponential, will be used to model a variety of problems, including compound interest, complex numbers, growth and decay, projectile motion, and periodic phenomena. Polynomial and rational algebra is extensively covered including advanced factoring and polynomial long division. Advanced work in probability and statistics is included. This course is aligned to the Common Core State Standards for Algebra II. Prerequisite: Algebra I and Geometry

Statistics (College Now)*

1 Credit

This course is a Herkimer Community College probability and statistics course. This course involves computing probabilities using permutations and combinations, a study of descriptive statistics including mean, variance, and standard deviation, a study of discrete and normal probability distributions, a calculation of confidence intervals, and studies of hypothesis testing and regression analysis. A prerequisite for this course is a passing grade in at least Integrated Algebra. **College Now credit available*

Music

Senior High Chorus

1 Credit

Senior High Chorus is open to all students in grades 9-12. The focus of the class is on performing four-part choral music. Members of Senior High Chorus also receive small-group vocal lessons once every six days in order to work on individual singing technique. Course requirements include lesson attendance, in-class writing assignments, and performing in two evening concerts per year.

Music Theory I

1/2 Credit

Music Theory I is open to all students in grades 9-12. The class focuses on building an understanding of basic written music notation as well as basic ear-training skills. For the final project, students compose an art song for voice and piano using all available music technology.

Music Theory II

1/2 Credit

(Prerequisites: Mastery of music composition technology and successful completion of Music Theory I)

Music Theory II is a continuation of Music Theory I and focuses entirely on composition skills. Students write four to six compositions in varying musical styles such as four-part chorale, woodwind or brass quintet arrangement, pop song, and elementary band piece.

Senior High Band (Grades 9-12)

1 Credit

Senior High Band is open to all students in grades 9-12. In this group, we play an array of music including marches, Broadway tunes, movie soundtracks, and classics. Some previous titles have been the *John Williams soundtrack*, *2001 Space Odyssey*, and *The Barber of Seville*. Students in this ensemble will also receive weekly instrumental lessons which will focus on building and refining techniques specific to the instrument they play. In addition to the two concerts we play in December and May, we also prepare music for school functions such as the Veterans Day assembly at the elementary school and the graduation ceremony at the high school. Because we work so diligently at honing our individual as well as ensemble skills year after year, we take the time in this high school group to “show off” our talent, dedication, and hard work at festivals such as “Music in the Parks.” During this time, we enjoy performing for other schools and judges, as well as having the pleasure of hearing what other groups like ours do throughout the year. Other activities that students involved in band may participate in either by choice or selection include: All-County, NYSSMA, Jazz Band and Honors Bands.

Music Theatre Performance Skills*

1/2 Credit

The class meets every other day for the full year. Students in this class will work on the following concepts: breath control, articulation, facial expressions, body movement, stage blocking, vocal inflection, motivation (historical/plot context), characterization, genre/style, and stage presence/posture. Activities will include: group and individual performances of musical theatre songs, monologues, group dialogue scenes, peer critiques, and solo/duets in scenes. The midterm and final projects will include evening showcases performed for the public.

** The above class satisfies the public speaking graduation requirement.*

Career & Technical Education at Herkimer BOCES

Automotive Technology

Building Construction Trades

Business Management

Child and Family Services

Cosmetology

Criminal Justice

Culinary Hospitality

Health Science and Careers

Media Arts and Visual Communications

Natural Resource Management

Network Administration

Outdoor Power Equipment Technology

Welding and Metal Fabrication

Physical Education

The main goal of the physical education program at FSHS is to prepare students to be able to participate in physical and recreational activities throughout their lives and to maintain a high degree of physical fitness and efficiency through knowledge and skills acquired. The curriculum is designed to promote the physical, social, and emotional well being of the students by providing a variety of activities within a coeducational setting.

Physical Education 9-12

1/2 Credit

Physical education in grades 9 through 12 will continue to build on the development of fundamental skills and fitness through participation in a variety of activities. Emphasis is also placed on lifetime and recreational activities that students may pursue after graduation.

Science

General Chemistry: The Physical Setting

1 Credit

Chemistry is the study of the composition, structure, and properties of matter; the changes which matter undergoes; and the energy accompanying these changes. Laboratory skills, problem solving techniques, graphing and interpreting graphical data, and mathematical analysis are included. The chemistry core topics include atomic structure; periodic table; moles/stoichiometry; chemical bonding; physical behavior of matter; kinetics/equilibrium; organic chemistry; oxidation/reduction; acids, bases and salts; and nuclear chemistry. This course is designed to provide a basic understanding of chemistry without extensive mathematical calculations. It should enable students to understand chemicals and processes in their daily lives.

Physics: The Physical Setting

1 Credit

Physics is the study of motion, forces affecting motion, and forms of energy. It is the basic science because it forms the foundation for understanding and studying chemistry, earth

science, and biology. Laboratory skills, practice developing experiments to solve problems, and techniques in mathematical problem solving are included. Topics include mechanics (velocity, acceleration, Newton's Laws, conservation of momentum, kinetic and potential energy, power and work), waves (light and sound), electricity and magnetism, and modern physics (atomic energy levels, standard model, leptons and quarks).

Chemistry: The Physical Setting (Regents)

1 Credit

Chemistry is the study of the composition, structure, and properties of matter; the changes which matter undergoes; and the energy accompanying these changes. Laboratory skills, problem solving techniques, graphing and interpreting graphical data, and mathematical analysis are included. The chemistry core topics include atomic structure; periodic table; moles/stoichiometry; chemical bonding; physical behavior of matter; kinetics/equilibrium; organic chemistry; oxidation/reduction; acids, bases and salts; and nuclear chemistry. This course uses mathematics extensively to explain chemical concepts.

Chemistry: The Physical Setting (College Now)*

1 Credit

Chemistry is the study of the composition, structure, and properties of matter; the changes which matter undergoes; and the energy accompanying these changes. Laboratory skills, problem solving techniques, graphing and interpreting graphical data, and mathematical analysis are included. The chemistry core topics include atomic structure; periodic table; moles/stoichiometry; chemical bonding; physical behavior of matter; kinetics/equilibrium; organic chemistry; oxidation/reduction; acids, bases and salts; and nuclear chemistry. This course will cover concepts and topics in more detail than the Regents level course. This course uses mathematics extensively to explain chemical concepts. *College Now credit available*

Living Environment - Biology

1 Credit

Biology is the study of life, living organisms, and living processes. Major emphasis in the new biology includes molecular and cellular biology; maintenance in animals and plants; reproduction and development; heredity, evolution, and diversity; and ecology and conservation. Considerable time is devoted in the laboratory to microscopic and macroscopic study of representative organisms.

Earth Science

1 Credit

Earth Science is a blend of many different sciences, including geology, meteorology, oceanography, mineralogy, and astronomy. Earth science students study and model the processes that change our planet in these different specialties. Students study earth science using organized procedures called scientific methods, the same way scientists use models to propose theories today. Students develop a new way of looking at and studying the Earth using observation and inference. Students must successfully complete a minimum of 20 hours of laboratory experience to be eligible to take the Regents exam.

Environmental Science

1 Credit

This elective course will cover the basics of environmental study including such topics as ecology, plants, dendrochronology, succession, carrying capacity, biodiversity and plant and animal natural history. All examples are based off of New York State systems. Current events will be included, as well as topical discussions based on student interest.

Chapter 1: Introduction and a history of the environmental movement

Chapter 2: Ecology basics

Chapter 3: All about plants and our food

Chapter 4: Dendrochronology - specialized science

Chapter 5: Succession, Carrying Capacity and Biodiversity

Chapter 6: Plant Natural History

Chapter 7: Animal Natural History

Anatomy and Physiology

1 Credit

Anatomy and Physiology is an entry college-level science course designed to link your Regents science courses to the subject matter taught at the collegiate level. This course is ideal for students who intend on majoring in any of the natural sciences, especially those hoping to enter the pre-medical, nursing, physical therapy, biomedical research, or medical technician fields. The course is divided into six major units covering all aspects of the body's physical structures and biochemical processes. A thematic approach will be taken to interconnect the six units under the biological stability of homeostasis.

AP Biology

1 Credit

AP Biology is a project and self directed based course where students are allowed to generate knowledge about biology to prepare for the demanding Advanced Placement Biology Exam that is given in May. Course is organized around 8 major themes from the AP Biology Curricular Requirements including: Science as a Process, Evolution, Energy Transfer, Continuity and Change, Relationships of Structure to Function, Regulation, Interdependence in Nature, and Science, Technology, and Society.

Social Studies

Introduction to Psychology (College Now)*

1/2 Credit

This course is designed to familiarize students with the major divisions of psychology, including physiology, learning, perception, motivation, emotion, personality, adjustment, and abnormal behavior. Attention is focused on the mastery of basic concepts and theories, along with supporting research and application. **College Now credit available*

Introduction to Sociology (College Now)***1/2 Credit**

This course is designed to familiarize students with the concepts and methods of sociology. The concepts include culture, socialization, deviance, and social stratification. The concepts are used to analyze major aspects of society including racial and ethnic relations, the family, politics and the state, education, population and social change and social movements. **College Now credit available*

AP U.S. Government and Politics**1 Credit**

The goals of this course are to increase understanding of the American political system, its framework, traditions, and values. This course is concerned with the nature of the American political system, its development over the past two hundred years, and how it continues to function at the beginning of the twenty-first century. The principal processes and institutions through which the political system functions, as well as some of the public policies which these institutions implement, will be examined in detail.

Units:

- I. Constitutional Underpinnings of the American Government
- II. Civil Rights and Civil Liberties
- III. Political Beliefs and Behaviors
- IV. Political Parties and Interest Groups
- V. The Institutions and Policy-making Processes of the National Government

Economics 12 (College Now)***1/2 Credit**

This course explores basic economic concepts necessary to function productively in both the United States and the world economies. There is a major focus on scarcity, opportunity, cost, supply and demand, inflation, and interdependence. Attention is given to the differences between microeconomic and macroeconomic concepts. **College Now credit available*

Participation in Government 12 (College Now)***1/2 Credit**

This course focuses on the interaction between citizens and government. Similarities and differences are explored between local, state, and national governments. Participation in the government process is a major focus. **College Now credit available*

U.S. History and Government 11**1 Credit**

This course includes a chronological survey of United States history with an emphasis on the United States as a developing industrial and post-industrial nation. Constitutional and legal issues are explored as well as the problems of an industrial society in a complex world.

Global History and Geography 10

1 Credit

This course examines the history and development of the following areas from the mid-1700s to the present: Europe, Africa, Latin America, China, the former U.S.S.R., and Southeast Asia. News journals that chronicle current events are also required. The course will be assessed with the New York State Global Regents Assessment.

Global History 9

1 Credit

This course explores the history of the world up to at least the events of the French Revolution. Attention is given to interdependence, cultural patterns, and ties to current events. This course is taught chronologically using the resources available at our school.

Project Lead the Way

Acceptance into the Project Lead the Way (PLTW) program is based on the following criteria:

- Eighth grade students passing Algebra I
- Eighth grade students passing Math 8 with a grade of 85 or better

To continue in the PLTW program, students must successfully complete all PLTW classes that they have previously been enrolled in.

Introduction to Engineering and Design (Design and Drawing for Production)

1 Credit

A course that teaches problem-solving skills using a design development process. Models of product solutions are created, analyzed, and communicated using solid modeling computer-design software. In New York state, the course is also called Design and Drawing for Production and follows the syllabus developed by the State Education Department.

The course is divided into 10 units:

1. Design Process
2. Technical Sketching and Drawing
3. Measurement and Statistics
4. Modeling Skills
5. Geometry of Design
6. Reverse Engineering
7. Documentation
8. Advanced Computer Modeling
9. Design Team
10. Design Challenges

Digital Electronics

1 Credit

Digital Electronics is a course in applied logic that encompasses the application of electronic circuits and devices. Computer simulation software is used to design and test digital circuitry prior to the actual construction of circuits and devices. Students are introduced to the digital circuits found in video games, watches, calculators, digital cameras, and other devices.

This course is divided into 4 units: (Units may not appear in the order given below)

Unit 1 - Foundations in Electronics

Unit 2 - Combinational Logic

Unit 3 - Sequential Logic

Unit 4 - Controlling Real World Systems

Principles of Engineering

1 Credit

Principles of Engineering is a course that helps students understand the field of engineering/engineering technology. Exploring various technology systems and manufacturing processes helps students learn how engineers and technicians use math, science, and technology in an engineering problem-solving process to benefit people. The course is a hands-on, laboratory-based experience that provides access to tools, machines, and materials for individual and small group projects.

This course is divided into 4 units: (Units may not appear in the order given below)

Unit 1 - Energy and Power

Unit 2 - Materials and Structures

Unit 3 - Control Systems

Unit 4 - Statistics and Kinematics

Civil Engineering and Architecture

1 Credit

Ever think about building a house, a store, or a restaurant, and wondered how to go about it? Then Civil Engineering and Architecture is the course for you. The major focus of the course is a long-term project that involves the development of a local property site. As you learn about various aspects of civil engineering and architecture, you will apply what you learn to the design and development of this property. There is flexibility for you and your teacher in developing the property as a simulation or as a real-world experience that civil engineers and architects experience when developing property. The course covers the following:

This course is divided into 4 units:

Unit 1 - Overview of Civil Engineering and Architecture

Unit 2 - Residential Design

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- Unit 3 - Commercial Applications
 - Unit 4 - Commercial Building Systems

In addition, you will use AutoDesk Rivet, which is a state-of-the-art 3D design software package from AutoDesk, to help you design solutions to solve your major course project. You will learn about documenting your project, solving problems, and communicating your solutions to other students and members of the professional community of civil engineering and architecture.

Engineering Design and Development

1 Credit

An engineering research course in which students work in teams to research, design, and construct a solution to an open-ended engineering problem. Students apply principles developed in the four preceding courses and are guided by a community mentor. They must present progress reports, submit a final written report, and defend their solutions to a panel of outside reviewers at the end of the school year.

This course is divided into 6 units:

- Unit 1 - Research
- Unit 2 - Design
- Unit 3 - Prototype and Test
- Unit 4 - Evaluation of Project and Process
- Unit 5 - Reflection and Presenting the Design Process
- Unit 6 - Going Beyond EDD

Notice of Compliance

The Frankfort-Schuyler School District does not discriminate on the basis of sex, race, color, national origin, handicap, or age in employment or in providing student access to educational programs, courses, and activities. This policy is in compliance with Title VI of the Education Amendments of 1972, Section 504 of the Rehabilitation Act of 1973, and the Age Discrimination Act of 1975. Any alleged grievances should be reported to the appropriate compliance officer. The compliance officer is as follows:

Mr. Joseph Palmer
Superintendent of Schools
605 Palmer Street
Frankfort, NY 13340
(315) 895-5083 or (315) 895-7461

