

Addendum

2017-2018 Course Descriptions

Advisory

Freshman Advisory - .5 credit

The main purpose of 9th grade advisory is to ensure that every student receives ongoing academic and social support, mentoring and guidance. Additionally, advisory serves as the core tool for establishing school mission, vision, and values and integrating 21st century skills into all aspects of learning. With these goals in mind, this course will help students monitor and reflect upon their academic progress through formal student academic conferencing, develop and maintain relationships between and among students and the advisor, help students identify and develop the necessary behaviors and skills to succeed in school, college and life, and provide them with the resources and information necessary to make thoughtful decisions about the future. This course will emphasize on team building, identifying and creating S.M.A.R.T goals, understanding stress, habits and strategies that help students to do well in school, tracking progress toward a Diploma, and introducing students the importance of college education.

Sophomore Advisory - .5 credit

The goal of 10th grade advisory is for students to develop an understanding of who they are in their community-- their social, academic, and familial communities. Central to 10th grade advisory is positive choice-making both inside and outside of school. Through team-building, activities, and weekly check-ins, students explore their own decision-making process and goals for the future. Students continue to develop positive academic behaviors and organization through weekly grade checks and bi-annual student-led conferences.

Junior Advisory - .5 credit

The goal of the 11th grade advisory program is to help students start to address the question, “Who Am I Becoming?” Through weekly goal setting, academic enrichment, and community building activities, students will explore who they are as learners and leaders and continue to develop their tool kit for high school success. 11th Grade advisory is also unique in that it aligns with the weekly Junior Projects and Junior Seminar Courses.

Senior Advisory - .5 credit

This course guides and prepares students for graduation defense and life after high school. Students will organize and document their learning through an online portfolio which will be presented in front of a panel of professionals during their graduation defense. This course also acts as academic support for all courses.

Art

Fundamentals of Art- 1 credit

This course will provide students with an introduction to fundamental concepts of art. Students will develop an awareness and appreciation of visual experience and use 21st century skills throughout a variety of 2D and 3D media: drawing, painting, ceramics, collage, and crafts. Students will be expected to participate in a gallery and public display of work.

Advanced Art – Media Studies – 1 credit

An advanced level course in drawing and painting with an emphasis on developing a greater depth of understanding art and art history. The course will concentrate on the application of the Elements of Art and Principles of Design in a variety of media. Studio experiences include drawing, painting, illustration, digital media and printmaking projects. Each student will demonstrate progress over time by developing a body of work and organizing a portfolio.

Advanced Art - Band - 1 credit

To provide the opportunity and instruction for those students who wish to expand their musical skills and participate in music performance groups. The course will be focused on the development, continuation, and expansion of basic learning about musical keys, notation, rhythms, beat and format of pieces. By the end of the course students should be able to recognize, understand, and play basic sheet music. No experience is necessary – only the will and desire to play an instrument.

Civic Literacy and Engagement

Community Engagement – 1 credit

Civic literacy addresses the skills needed for citizenship development as well as the connections to existing standards in reading, writing, speaking, listening, and critical thinking skills. This course is an introduction to the issues, challenges and opportunities of civic life in Hawai'i in the 21st Century. It provides a foundation for understanding the roles of community engagement and social action in democratic citizenship and local stewardship, as well as an opportunity to explore strategies for responsible social and environmental change. We will engage in service and community-based learning projects, and explore why we do this, and what positive difference we can make in our community. We will have the opportunity to interact with community leaders who help make Maui a better place.

Engineering

Engineering 1 - Introduction to Engineering Design – 1 credit

Students dig deep into the engineering design process, applying math, science, and engineering standards to hands-on projects. They work both individually and in teams to design solutions to a variety of problems using Autodesk inventor 3D modeling software, and use an engineering notebook to document their work. Solutions are created, analyzed and communicated using Autodesk Inventor solid modeling computer design software.

Design Process

- **Technical Sketching and Drawing**
- **Engineering Documentation and Drawing Standards**
- **Measurement and Statistical Analysis**
- **Applied Geometry**
- **3D CAD Solid Modeling**
- **Reverse Engineering**
- **Product Design**
- **Engineering Ethics**
- **Virtual Design Teams**
- **Presentation Design and Delivery**

Introduction to Engineering Design: This course teaches problem-solving skills using a design development process. Part A of the class introduces students to elements of design and drafting techniques through the use of Autodesk Inventor solid modeling computer design software. Part B of the class is a continuation of Part A, utilizing elements of model and product design. Solutions are created, analyzed and communicated using Autodesk Inventor solid modeling computer design software.

Engineering 2 – Understanding Engineering Technologies - 1 credit

This course helps students understand the field of engineering/engineering technology. Through problems that engage and challenge, students explore a broad range of engineering topics, including mechanisms, the strength of structures and materials, and automation. Students develop skills in problem solving, research, and design while learning strategies for design process documentation, collaboration, and presentation.

Topics Covered:

- **Mechanisms**
- **Energy Sources**
- **Energy Applications**
- **Machine Control**
- **Fluid Power**
- **Statics**
- **Material Properties**
- **Material Testing**
- **Statistics**
- **Kinematics**

Principles of Engineering: This course helps students understand the field of engineering/engineering technology. Exploring various technology systems and manufacturing processes help students learn how engineers and technicians use math, science and technology in an engineering problem solving process to benefit people. The course also includes concerns about social and political consequences of technological change.

Language Arts

English 9 - Communication Fundamentals - 1 credit

Fundamentals of Communication introduces the use of writing for multiple purposes and audiences. Students will investigate the use of perspective and genre with autobiographical writing and sharpen research skills to develop arguments in persuasive writing. Research methods, such as properly utilizing/citing primary and secondary sources and evaluating the credibility of sources, will be used to form ideas about issues in U.S. democracy and modern Hawaiian history. Students will prepare for oral debate, forming and defending a researched thesis. Students will also broaden oral communication skills by giving presentations and working in cooperative groups. (Course will explore texts from dystopian and Hawaiiana genres)

English 10 – Oral Communication – 1 credit

Communication skills will continue to hone research, writing, and oral communication skills. Students will learn about perspective and point of view by comparing and contrasting specific topics written by different authors and how text and structure of written work emphasizes key points, ideas, and/or concepts. Students will learn how to analyze and critique primary and secondary sources in order to use within research, as well as, understand the limitations of both kinds of sources. Students will use their knowledge of perspective and text structure when writing informative essays, persuasive speeches, and creative writing assignments. Students will continue working on oral communication skills through presentations, cooperative group work, and classroom discussions. (Course will explore various texts from American Literature)

English 11- Creative Writing - 1

Creative writing is an English Language Arts course that focuses on world literature and continues to build on students' reading, writing, research, and presentation skills. Through an exploration of multi-genre texts, students will produce clear, thoughtful, and coherent writing that is appropriate to task, purpose, and audience. Students will write in a variety of genres to express thoughts and ideas. Through collaborative and individual work, students will use technology to produce and publish their writing, as well as to respond to feedback and new information.

English 12 – Academic and Professional Writing – 1 credit

This course will focus upon producing quality writing that effectively communicates to specific audiences in a professional environment. There will be an emphasis on the use of clear language and composition that impacts the reader by being easily understood by the intended audience. The writing may be for analysis, self-expression, and information sharing, persuading or stimulating debate. There will be an emphasis on drafting, editing and revising text for purpose, style, clarity, and impact. 42 Students will be exposed to different types of writing projects to address individualized college and career readiness goals. Writing styles include: Academic writing for college reports; professional writing to the standards and styles demanded by professional situations; and creative expressive writing.

Math

Algebra I – 1 credit

Algebra 1 is a comprehensive course that includes topics such as operations in the real number system, solving equations and inequalities, proportional reasoning, equations of lines and graphing, linear functions, absolute value functions, solving systems of linear equations, laws of exponents, polynomials and factoring, simplifying and solving complex fractions and radicals, quadratic functions, and transformations of functions. Algebraic thinking skills are developed through a variety of classroom activities, hands on projects, real world problem solving, class discussions, note taking, and utilizing technology.

Geometry – 1 credit

This course formalizes what students have learned about geometry in the middle grades, with a focus on reasoning and making mathematical arguments. Students develop geometric reasoning skills such as analyzing rigid motions, completing formal constructions, and writing proofs. Some of the topics in this course include proving circle, triangle, and polygon properties, transformations, area, the Pythagorean Theorem, volume, similarity, trigonometry, and logic.

Algebra II – 1 credit

This course focuses on the four critical areas of the Common Core model pathway for Algebra II: functions, polynomials, periodic phenomena and collecting and analyzing data. Topics cover solving linear, inequality, and absolute value equations, direct variation, linear functions, piecewise functions, and linear modeling. Families of graphs and systems of equations lead into solving quadratic equations and modeling quadratic functions, and complex numbers, followed by solving and graphing polynomial functions, rational and radical functions, exponential and logarithmic function, and basic trigonometry. The Common Core practice standards are embedded throughout the course, as students solve novel problems, reason abstractly, and think critically.

Consumer Math – 1 credit

In Consumer Math, students study and review arithmetic skills they can apply in their personal lives and future careers. The first semester of the course focuses on topics related to personal finance. During the second semester, students have a brief introduction to broad economic and financial concepts and will apply the knowledge gained throughout the course on a personal finance project.

Pre-Calculus - 1 credit

This course is designed to cover topics in Algebra ranging from polynomial, rational, logarithmic and exponential functions to conic sections, vectors and matrices. It is also designed to cover topics in discrete math, probability,

sequences and series. Trigonometry concepts such as Law of Sines and Cosines will be introduced. Students will then begin learning calculus concepts such as limits, derivatives, and integrals. This class is important for any student planning to take a college pre-calculus or calculus class.

Physical Education

Physical Education - .5 credit

This course is designed to meet the NASPE standards. Students will set goals for physical fitness and monitor progress toward meeting identified goals. Students will learn to access community opportunities for physical activity. Students will learn to demonstrate an understanding of the benefits of physical activity and the role it plays in healthy living. Students learn to gather and monitor personal heart rates in resting and active states in a variety of physical activities. They will learn to correlate heart rates to rates of perceived exertion (RPE).

Projects

Project Fundamentals 1 and 2 - .5 credit each year

Project Fundamentals is designed to help you develop your basic understanding of project-based learning and 21st Century Skills. The goal is to have students to develop integrated group projects and eventually independent projects using research, real-world experiences, and their own skills and interests. Students will complete two supported semester-long projects throughout each year, building the skills needed for bigger and better independent projects in subsequent years. In their second year of projects class, students are expected to identify and work with the more challenging 21st century skills, like Civic Literacy and Engagement, Thinking and Problem Solving, Financial, Economic and Business Literacy, and Global Awareness.

Junior Seminar / Projects – .5 credit

This class is divided into two semesters: fall is Junior Projects, and spring is Junior Seminar. Junior Projects designed to help students further develop their independent project skills with an emphasis on depth and application of the 21st Century

Skills. All students will be required to complete a single, full-semester project that is meaningful to their lives. This includes academic research, in-class activities, and independent project development. The goal of second semester is to help students think deeper about their career paths and how to get there. A big part of this will be helping students understand the importance of knowing, connecting to and utilizing their networks. At the end of the semester, students will have explored different career and college options, prepared for and completed the ACT, developed a personal statement, resume, and other helpful tools for their lives beyond KCS. Additionally, students will have explored many possible summer internship opportunities and secured the internship that fits their life's goals the best.

Personal Transition Plan (Senior Graduation Defense) - .5 credit

Seniors will have the opportunity to demonstrate their 21st Century Skills, academic growth, and future plans during these presentations. Each student will present for approximately 1 hour to a panel of teachers, administrators, and board members. We also encourage the attendance of family members and student mentors at the event. The Senior Graduation Defense is a major component of the Kihei Charter School graduation process.

Internships - .5 credit

Senior Projects- 0.5 credit

This course is a requirement for graduation. Students will pick a topic of their choice, complete a proposal, research paper, and create a product or service that displays their learning and development of 21st century skills. Students present their project to a panel of peers, professionals, and/or experts in the field.

Science

Physical Science – 1 credit

Physical science is designed to be an introduction to the many disciplines of science that include Chemistry, Physics, Earth and Space Sciences. We will learn aspects of each discipline and how they are interrelated. We will follow the Next Generation Science Standards in order to investigate the various disciplines of science and how they relate to our lives. We will use our knowledge to tackle real world problems here on Maui and investigate ways Maui and Hawaii can become more sustainable using the many tools science provides.

Biology (Lab) – 1 credit

Biology provides an overview of the living world. Topics include the central tenets of scientific thought and exploration, experimental design, cell biology, genetics, evolution, anatomy, and ecology. The course is updated annually to include recent breakthroughs in scientific research. Concepts are explored through reading, online assignments, current events, lecture, and student-driven projects. Strong emphasis is placed on hands-on laboratory activities and students are expected to be active participants in class discussions and activities.

Chemistry (Lab) – 1 credit

This course provides an overview of the conceptual chemistry. Topics include the central tenets of scientific thought and exploration, experimental design, properties of matter, scientific measurement, atomic structure, electron configuration, the periodic table, ionic and covalent bonding, chemical names and formulas, chemical quantities and reactions, stoichiometry, states of matter, the behavior of gases, reaction rates and equilibrium, acids and bases, oxidation-reduction reactions, nuclear chemistry, and an introduction to organic chemistry. Concepts are explored through reading, assignments, lecture, laboratory activities, and student-driven projects. The Common Core practice standards are embedded throughout the course in a way to encourage problem solving, critical thinking, and active participation.

Applied Physics – 1 credit

Students learn basic physics concepts as well as written and oral technical communication through several large inquiry projects. Physics concepts include investigations in mechanics such as motion, forces, Newton's Laws, momentum, collisions, work, energy and simple machines, states of matter, electricity and magnetism, waves and light, math tools and an overview of modern physics concepts. Small group projects typically include the design, construction and testing of parachutes, rockets, crash test vehicles, and catapults. A focus on scientific communication requires students to design and execute controlled experiments, present original research, critique peer presentations, and write scientific reports in a format similar to peer-reviewed journals. Students will also be introduced to the abstraction bridge model: *The abstraction bridge concept is designed to enable students to form a cognitive bridge between what they learn in a focused-applied setting and the types of physics that students encounter every day. The abstraction bridge model is a tool that the teacher will use every day.*

Marine Biology – 1 credit

Marine Biology is for students that have an intrinsic fascination of the near coastal and marine environment that surrounds the Hawaiian Islands. We will examine Native Hawaiian practices that allowed Polynesians to navigate thousands of miles throughout the Pacific and live harmoniously here in the Hawaiian Islands. Incorporating the Next Generation Science Standards, we will look at the modern day sciences in order to study the physical, chemical and geological aspects of oceanography, marine biology, the coastal environment and interrelationships among the various disciplines of science. We will combine modern scientific knowledge with traditional knowledge to learn how we can become a more sustainable community and help those around us learn about this fascinating underwater realm.

Social Studies

Participation in a Democracy - .5 Credit

Participation in a Democracy focuses on the roles and rights of citizens, as well as the ways citizens can influence government. Students investigate different forms of

power and the ways in which power dynamics influence political change and development. Principles such as rule of law, consent of the governed, separation of powers, sovereignty, and checks and balances are used to deepen understanding of the American political system.

Modern Hawaiian History - .5 Credit

This course provides an overview of Hawaii's past and present history. Students will explore the historic, geographic, socio-political, economic, and multicultural development of modern Hawai'i as well as study the effects of change on the people of Hawai'i. Course content begins with a look at pre-contact Hawaiian civilization, the campaign of Kamehameha, then outlines the change brought about by the first foreigners to the islands, continuing on through statehood, and into modern movements and issues.

U.S. History and Government – 1 credit

U.S. History and Government 1 explores important historical events and topics of the 20th Century including immigration, urbanization, the Gilded Age and Progressive Era, World War I, and the conflicts and transitions of the 1920's. The course explores how each event and era influences laws, power of governmental institutions, and society. Students will identify and be able to explain the role of citizens within each sector of society, including the contributions of minorities and women.

U.S. History and Government 2 explores events leading up to The Great Depression and FDR's New Deal, World War II, The Cold War, Civil Rights Era, and Contemporary Culture and Society. The course explores how each event and era influences laws, power of governmental institutions, and society. Students will identify and be able to explain the role of citizens within each sector of society, including the contributions of minorities and women.

World History and Culture - 1 credit

This course examines the dynamics of the human experience through the lens of world history. Students will keep up with international current events and work collaboratively to explore key themes in world history, write and create multimedia critical reflection pieces, and engage in discussion. Students will use their global awareness skills to understand how politics, economics, religion, geography, intellectual ideas, and art consistently shape the cultural landscape of specific

geographic regions. By critically and analytically examining issues and events, students can make informed decisions about present-day issues and events.

Social Studies 12 – Global Issues – 1 credit

Global issues is a social studies course that focuses on themes of culture, politics, economics, geography, and religion as they play out in an international context. Students are expected to gain an understanding of global interdependence by exploring topics such as globalization, international political and banking systems, resource management, and human rights from a variety of perspectives. Students will also be challenged to develop research and critical thinking skills related to the ways in which historical events have shaped the contexts of present-day cultural, economic, social, and environmental challenges. By exploring a variety of sources from diverse perspectives, students will develop their analytical, writing, and oral presentation skills while also sharpening their awareness of the world they live in.

Spanish

Spanish 1 – 1 credit

Spanish 1 Students will learn about the rich Spanish culture and the geography of Spanish speaking countries. Students will have a general introduction to the Spanish language: pronunciation, vocabulary, verb conjugation and basic grammatical structures. Emphasis will be on: listening, and speaking. Students will have the ability to carry on a simple conversation. Students should be prepared to put in extra time memorizing and studying vocabulary and grammatical concepts.

Spanish 2 – 1 credit

Spanish 2 builds upon knowledge gained in Spanish 1. Students will broaden their knowledge of Spanish-speaking countries and cultures. This course will also reinforce the skills learned in Spanish I. Emphasis is on perfecting pronunciation, mastery of the basic grammatical structures, and increased communicative proficiency. Students will be expected to apply them in their writing and speaking.

Spanish 3 – 1 credit

This course builds upon knowledge gained in Spanish 1 & 2. The course is a continuation of knowledge acquired in Spanish 1 and Spanish 2, as well as an introduction to new vocabulary, structures and expressions. Students will be expected to expand their vocabulary range to include more sophisticated terms, use advanced language expressions, verb tenses and grammatical concepts such as the pluperfect and the subjunctive mood. Students develop their listening, speaking, reading and writing skills as they acquire knowledge about the culture and history of the Spanish-speaking world.

Virtual/Online

Basic Social Studies Concepts – 1 Credit

This Social Studies course is recommended for students with developing Social Studies skills. This course covers land formations, resources and population within various regions of the United States.

Epic Moments in World History – 1 Credit

Epic Moments in World History is a Hollywood-style elective History course that will take students through the beginnings of civilization, to the present day, looking into just how our global society has evolved into the world we now live in. Acellus Epic Moments in World History is taught by Acellus.

Exam Prep – Math – 1 Credit

This course focuses on Mathematical reasoning, including precision and fluency in executing and applying core computations, as well as learning to apply quantitative and algebraic reasoning skills within a wide range of academic, real-life, and workplace contexts. Specific areas include the following:

- Basics of Mathematics
- Fractions, decimals, percents, and probability
- Basics of Geometry, perimeter, area, surface area, and volume
- Pre-Algebra
 - o Integers, rational numbers, and properties of Algebra

-Algebra

- Expressions, order of operations, and sets
- Absolute value, square roots, squares, and irrationals
- Equations and their applications
- Graphing, inequalities, and systems of equations
- Polynomials and operations with polynomials
- Rational expressions

Exam Prep – Language Arts – 1 Credit

This course focuses on reasoning through language arts via an integrated approach, reading carefully, writing about reading material, and the demonstration of good command of English language conventions. Areas covered include the following:

- Comprehension and summarization of details and ideas
- Inference of implied ideas
- Creation of evidence-based generalizations based on textual details
- Editing for effective support of logic and clarity
- Paragraph development and organizational skills
- Editing to ensure proper sentence structure

Exam Prep – Science – 1 Credit

This course emphasizes the ability to apply scientific reasoning skills to three areas: Life Science, Physical Science, and Earth and Space Science, with understanding of scientific content pertaining to the themes of health and the human body, and energy. Specific areas covered include the following:

- Properties and types of matter, and changes in matter
- Forms of energy – heat, electricity, and waves
- Forces, motion, work and machines
- Alternative energy sources
- Plate tectonics, earthquakes, mountains, and volcanoes

- Earth in space, comets, asteroids, stars, star systems, and galaxies
- Ecology
- Cell structure, function, and transport
- Cellular energy, cell division, genetics, and evolution

Exam Prep – Social Studies – 1 Credit

This course places emphasis on applying reasoning skills in social studies to content drawn from four areas: Civics and Government, United States History, Economics, and Geography and the World. This includes textual analysis and understanding, skills in data representation and inference, and solving problems in the context of social studies. Areas covered include the following:

- The foundations of the United States Government
- The Constitution
- Checks and balances
- The Bill of Rights and Amendments
- Political participation and parties
- How elections work, and the influence of mass media
- Historical foundations and nationalism
- Reformation, and the Union in Peril
- The First World War
- World War II
- Post-War America and Civil Rights
- Contemporary Issues: 1945 to the Present
- Basics of Personal Finance
- Basics of Geography

Health – 1 credit

This is an online introductory health class supplemented in large part the Acellus Learning System. It is aligned with the National Health Education Standards. Course topics include:

- Physical Fitness
- How your body works
- Understanding Disease
- Drugs and Medicines
- Adolescence
- First Aid
- Hygiene and Healthcare

Introduction to Computer Science – 1 Credit

This course instructs students on core aspects of computer science. Students will learn to create and implement computer programs that solve problems relevant to today's society, as well as deploy programming tools and effectively deal with complex problems through hand-on application and examples.

Investigating Careers – 1 Credit

Investigating Careers gives students an overview of many career options and the education, training, and skills required for each. Career Paths include:

- Agriculture and Natural Resources
- Architecture and Construction
- Arts and Communication
- Business and Administration
- Education and Training
- Finance and Insurance
- Government and Public Administration
- Health Science
- Hospitality, Tourism, and Recreation
- Human Service
- Information Technology
- Law and Public Safety

- Manufacturing
- Retail and Wholesale Sales and Service
- Scientific Research, Engineering, and Mathematics
- Transportation, Distribution, and Logistics

Mastering Excel – 1 Credit

The Mastering Microsoft® Excel® course focuses on providing students with a solid foundation on the many features and applications of the Microsoft Excel spreadsheet program. Excel, being a vastly versatile and widely used tool in the modern workforce, is a skill integral to success for students planning for any business-related career. This course explores topics from basics of creating workbooks to advanced functions using macros, as well as how to work with other Microsoft Office programs.

Music Appreciation – 1 Credit

The Acellus Music Appreciation course provides an overview of the development of western music from Pre-Renaissance to Modern times on the European continent and in America. The focus is on select composers and how they influenced musical styles – and on enjoying our rich heritage of music. Course topics include:

- Renaissance Music
- Baroque Music
- Classical Music
- Pre-Romantic Music
- Early Romantic Music
- Mid-Romantic Music
- Late Romantic Music
- Twentieth Century Music