

# Course Catalog



**Valley Lutheran High School**  
2018-2019

This catalog is designed as a guide to typical projected course offerings at Valley Lutheran High School. Please note that course offerings and descriptions are subject to change without notice. Some courses may not be offered every year.

© 2018 Valley Lutheran High School, All Rights Reserved.

# Dual Enrollment

Valley Lutheran High School offers the following classes for dual college credit through Concordia University Nebraska.

AP Calculus AB

AP Calculus BC

Students enrolled in these classes will receive additional information the first week of class, including any additional requirements and fees to receive dual enrollment credit, and will be able to select at that time if they wish to enroll for dual enrollment credit.

Additionally, Valley Lutheran High School offers online dual credit courses through Concordia University Wisconsin. This program offers a great opportunity, and fantastic value, for the college-bound high school student, and allows high school students, to get a head start on college, and save time and money by combining accelerated high school courses into a collegiate career.

Through flexible online classes taught by Concordia University Online faculty, high school students can complete coursework during the school day, or at home if it's more convenient. Courses are one semester long and cost \$200 per credit (\$50 per credit through the Concordia Promise). \*please visit <http://concordiapromise.com/> for more information on the Concordia Promise.

**The following elective courses are currently offered through this program:**

Introduction to Sociology

Principles of Management

Principles of Marketing

Introduction to Business Writing

Financial Accounting

The Old Testament

The New Testament

**The following additional elective courses are available if you have completed the listed prerequisite at Valley Lutheran High School:**

Introduction to Psychology

Prerequisite: Psychology

Principles of Economics

Prerequisite: Economics

Foundations of Computer Science

Prerequisite: 2 semesters of computers

Interpersonal Communications

Prerequisite: Communications

For more information and full course descriptions, please see Mrs. Stokes in the school office.

# Theology

The Theology department at Valley Lutheran High School seeks to put God and His Word at the center of its curriculum. Ethics, current issues, and apologetics will be addressed under the umbrella of grace and in the context of Scripture. We rely solely on the providence of God the Father, the redemption of His Son, Jesus Christ, and the revelation and guidance of the Holy Spirit.

## **Foundations of Religion** 9, 10, 11, 12 101

This one semester course is designed for students who are new to the study of theology as it pertains to the Christian faith. Students will be exposed to basic biblical study as well as learn about key concepts of salvation, grace, and timeline of events. **Prerequisite:** Department approval required.

## **Freshman Theology: Old Testament I** 9 103/104

Freshmen will take an in-depth look at the Old Testament books of Genesis – 1&2 Chronicles. They will also study the following current issues, apologetics, and ethics: Lutheran heritage, similarities and differences between Christian denominations, creation and evolution theories, peer pressure, sex and dating, self-perception, substance abuse, and how to read and study the Bible.

## **Sophomore Theology: Old Testament II** 10 113/114

Sophomores will take an in-depth look at the Old Testament books of Ezra-Malachi. They will also study the following issues and comparative religions: spiritual gifts, the Reformation, Islam, Judaism, Hinduism, Buddhism & other Eastern religions, the Occult, Mormonism, and Jehovah's Witness.

## **Junior Theology: New Testament I** 11 121/122

Juniors will take an in-depth look at the Gospels. They will also study the following current issues, apologetics, and ethics: Messianic prophesies, the efficacy of Scripture, the life of Christ, suffering, the resurrection, evangelism, prayer, creation, the disciples, and Christian finance.

## **Senior Theology: New Testament II** 12 131/132

Seniors will take an in-depth look at the New Testament books of Acts – Revelation. They will also study the following current issues, apologetics, and ethics: marriage and family, a Biblical approach to the roles of men and women, abortion, euthanasia, homosexuality, media influence, life in the Spirit vs. life in the flesh, and the fruits of the Spirit.

## **Worship Arts** 10, 11, 12 193/194

This year-long course is designed for students who have a desire to be involved in and learn more about worship by using their given gifts and talents in worship. This course will require students to be involved in at least two chapels each month and one Sunday morning service at Mount Calvary Lutheran Church each month. In addition, students will study the practice and mindset of biblical worship, with a focus on the Psalms, Matthew, John, and other areas of scripture. Topics of study will also include church history, genres of worship, practical structure of worship, and basic technical set-up. **Prerequisite:** Audition and department approval required

# English

## **Foundations of English 9** 201/202

Students will be working primarily with novels through out this course. They will be working on developing critical thinking skills and comprehension skills. This is a slower paced class to work on skill that need enhancing for them to be successful in their future English courses. **Prerequisite:** Department recommendation based on placement test results.

## **Foundations of English Lab 9** 298/299

First semester will focus heavily on increasing knowledge skills in language and its correct usage. They will apply their grammar skills to small writing pieces. Second semester will be working on enhancing their writing skills into more developed multi paragraph essays and a research paper. **Prerequisite:** Department recommendation based on placement test results.

## **English I 9** 203/204

English 9 builds upon reading, writing, listening, speaking and critical thinking foundations established in 8th grade. Included in this course are thematic literature collections related to personal experiences, journey of self and preparing for college and beyond. Reading comprehension strategies and college preparedness writing are emphasized through various writing styles. Active listening and speaking are practiced in formal and informal scenarios and a variety of media presentations are evaluated for social and cultural messages.

## **English I Honors 9** 206/207

Honors students will analyze various genre using higher critical thinking and reading skills at a faster pace. The student will use well developed writing skills while increasing knowledge of language and its usage. Freshmen focus on research writing and in depth literature analysis. **Prerequisite:** Teacher recommendation required and maintain a 3.0 GPA in the class.

## **English II 10** 213/214

**HONORS:** 216/217

The development of writing by American authors is studied relative to simultaneous periods of growth and change in the history of our nation. Students read typical works of poetry, drama, fiction, and nonfiction from each major era. Vocabulary building is stressed. Composition skills are emphasized through numerous and varied writing activities. All sophomore level classes include verbal skill test preparation. Sophomores will be involved in writing meaningful research papers based on important social issues. Honors students will be required to complete additional projects and essays throughout the year. **Prerequisite:** English 1. **Honors Prerequisite:** Teacher recommendation required and maintain a 3.0 GPA in the class.

## **English III 11** 221/222

Students will be exposed to the development of writing by British authors relative to simultaneous periods of growth and change in the history our nation. Students read typical works of poetry, drama, fiction, and nonfiction from each major era. Vocabulary building is based on Greek roots and ACT Prep. Composition skills are emphasized through numerous and varied writing. All junior level classes include verbal skill test preparation. Juniors will be involved in writing meaningful research papers based on a specific topic chosen in class with the teacher. **Prerequisites:** English I and II.

**AP Language and Composition 11**

226/227

The AP English Language and Composition course aligns to an introductory college-level rhetoric and writing curriculum, which requires students to develop evidence-based analytic and argumentative essays that proceed through several stages or drafts. Students evaluate, synthesize, and cite research to support their arguments. Throughout the course, students develop a personal style by making appropriate grammatical choices. Additionally, students read and analyze the rhetorical elements and their effects in non-fiction texts, including graphic images as forms of text, from many disciplines and historical periods. Students enrolled in this class will be required to take the Advanced Placement Exam (additional fee required). **Prerequisites:** English II & teacher recommendation

**English IV 12**

231/232

This course is designed for college-bound students, and explores a wide variety of literature from all over the world. Seniors will engage in meaningful discussions, activities, and research-based writing that creates cultural awareness and understanding. Composition of a major research project based on career goals and possibilities will be an integral part of this course, as will continued refinement of grammar, writing, and Latin and Greek roots. **Prerequisites:** English I, II, III.

**AP English Literature and Composition 12**

238/239

This course will engage the student in careful reading and critical analysis of imaginative literature through close reading of selective British and American texts from the 16th to the 21st century. The student should be prepared to experience, interpret, and evaluate a few works well in preparation for a year end test possibly leading to college credit. Students enrolled in this class will be required to take the Advanced Placement Exam (additional fee required). **Prerequisites:** English I, II, III, and Teacher recommendation, and maintain a 3.0 GPA in the class.

**Communications 10, 11, 12**

290

This class will expose students to a wide variety of communications skills. These will include formal and informal speeches, improvisation, and skits. Students will have the opportunity to be engrossed in a performance-based class that is challenging and hands-on. **Prerequisite:** English I

***Electives:*****Journalism 10, 11, 12**

271

This one-semester course gives students a hands-on introduction to multimedia reporting. Students will be exposed to various mediums such as; text, still photography, video and video blogs, audio, podcasts, graphics and interactive online sites. Students will have the opportunity to work with journalistic organizations and journalists within our community, with a variety of assignments.

# Social Studies

## **Contemporary Issues 9**

370

The understanding of current events of our present society will make it much easier for our students to perceive the trends that will influence their lives tomorrow. This course surveys the issues and trends (economic, racial, religious, governmental, etc.) displayed in the media and other sources of information. Students actively participate in discussions, projects, cooperative teams, and problem-solving activities as they relate to current course content.

## **World History/Geography 10**

303/304

The political, social, cultural, and religious history of eastern and western civilization are studied in this year-long course. From creation to the twentieth century, the history of the planet Earth is studied to gain meaning for our lives today. This course also concentrates on the topographical, cultural, and economic characteristics of the various regions of the world. Geographic skills are emphasized throughout the course.

## **U.S. History 11**

313/314

This course covers the history of America dating back to the early explorers and takes us to the current headlines making news today. America's story will be viewed with a special focus on political, economic and diplomatic history.

## **AP U.S. History 11**

318/319

Advanced Placement U.S. History is a college level course. It is meant to introduce students to the major points throughout American History from the Colonial Period to the present day. Students are required to show competency by critically evaluating primary and secondary sources while gaining skills to be successful in college and on the AP Exam. These skills will be taught through interactive assignments, writing essays, studying primary source documents, and actively engaging in class discussions. Students taking AP U.S. History are required to take the Advanced Placement exam held in May. **Prerequisite:** Teacher Approval Required.

## **Government 12**

330

In this course, the student will study our national, state, and local governments. Basic principles underlying a democracy are examined with their application to the contemporary political life as seen by a Christian. The course also deals with the unique problems faced in democratic America. Current news events will be studied to see application of basic governmental principles. This course deals with the basic ideal of political behavior and the operation of American government. It includes such topics as political influence, citizen participation, political parties, the role of the President, and the decision-making process. An in-depth unit focuses on Arizona's history and constitution.

## **AP United States Government and Politics 12**

355

Advanced Placement United States Government and Politics, is a college-level course offered through the College Board's Advanced Placement Program. This course surveys the structure and function of American government and politics that begins with an analysis of the United States Constitution, the foundation of the American political system. Students study the three branches of government, administrative agencies that support each branch, the role of political behavior in the democratic process, rules governing elections, political culture, and the workings of political parties and interest groups. Students taking AP U.S. Government & Politics are required to take the Advanced Placement exam held in May. **Prerequisite:** Teacher approval required.

**Economics 12** 350

This course covers the basic concepts of economics: scarcity, the market system, business and its organization, production, supply and demand, money, banking, the business cycle, government involvement, competition, and trade. Varying viewpoints on current problems are presented, and opportunities are provided to practice economic skills.

***Electives:***

**Psychology 11, 12** 360

This is an overview class in which the basic foundations of psychology are introduced. Insight into behavior, the workings of the human mind, and ensuing relationships and actions are explored and stressed.

**History and Film 10, 11, 12** 390

This course will provide an introductory look at how Hollywood and History interact. A variety of historical time periods, settings, and film genres will be explored. This course is taught with an emphasis on the Christian perspective and how faith relates to the topics of both history and film.



# Math

## Note regarding honors math classes:

All honors level classes are for high-achieving math students. They will move at a faster pace, will be challenged with more rigorous problems, and cover extra topics.

Placement into an honors math class requires the recommendation of your previous math teacher, and the following grades in the previous math class:

Honors Class: A or B

Non-Honors math class: A

At the discretion of your teacher, students not meeting the above grade requirement may become eligible for honors on completion of a summer assignment, and satisfactory performance on a test about that assignment. See your math teacher for details.

---

## **Pre-Algebra** 9, 10, 11 403/404

Pre-Algebra is an introductory math course designed to prepare students to continue with Algebra and future years of mathematics studies. We will begin with an introduction to Algebra, but will also include rational numbers, ratios, graphing, and equations.

## **Algebra I** 9, 10, 11, 12 413/414

Algebra helps us solve problems efficiently. The value of Algebra as a real-life problem-solving tool will be introduced. Solving algebraic equations and graphing these solutions will be emphasized throughout the study of the algebraic process.

## **Geometry** 9, 10, 11, 12 423/424

**HONORS:** 426/427

Geometry is an overview of two and three-dimensional geometry. Use of geometric rules and formulas will be emphasized. This course will include topics such as Parallel lines, Polygons, Similarity, Pythagorean Theorem, Circles, Area, Volume, and Proof. **Prerequisite:** Algebra I

## **Algebra II** 10, 11, 12 433/434

**HONORS:** 436/437

Algebra II is an extension of Algebra I. This course moves forward by integrating into basic Algebra such topics as geometry, statistics, trigonometry, probability, matrix theory, relations and functions. Students will be asked to think critically at all times. **Prerequisite:** Geometry

## **Pre-Calculus** 11, 12 **HONORS:** 456/457

This course is a continuation of Algebra II, covering complex numbers, relations and functions, systems of equations, exponential and logarithmic functions, and trigonometry. Pre-Calculus is designed to prepare the student for Calculus. **Prerequisites:** An A or B in Honors Algebra II or an A in Regular Algebra II, and teacher recommendation

## **Calculus AB (AP)** 11, 12 **HONORS:** 466/467

Calculus AB is a course in single-variable calculus that includes techniques and applications of the derivative, techniques and applications of the definite integral, and the Fundamental Theorem of Calculus. Algebraic, numerical, and graphical representations are emphasized throughout the course. Students not participating in Dual Credit will be required to take the AP exam in May. (Additional Fee Required). **Prerequisites:** A or B in Honors Pre-Calculus and teacher recommendation. **Offered for Dual Enrollment Credit through Concordia University Nebraska.**

**Calculus BC (AP) 12****HONORS: 476/477**

AP Calculus BC includes learning topics covered in AP Calculus AB to a greater depth, plus includes a study of additional integration techniques; L'Hôpital's Rule; improper integrals; infinite series; and parametric, vector, and polar functions. Students not participating in Dual Credit will be required to take the AP exam in May. (Additional Fee Required). **Prerequisites:** AP Calculus AB and teacher recommendation. **Offered for Dual Enrollment Credit through Concordia University Nebraska.**

**Explorations in Mathematics 12****483/484**

This course is designed for seniors who seek a non-honors mathematics class to fulfill their high school graduation requirement. It is designed to prepare students for math after high school, both in college and in the workplace in a variety of fields. We will spend time reviewing math topics that typically appear on the SAT and ACT. We will then explore many different areas of mathematics, including critical thinking skills, logic, number theory, the metric system, consumer mathematics, probability, and statistics. Explorations in Mathematics is an approved math class by the NCAA Clearinghouse. **Prerequisite:** Algebra II or department approval

# Foreign Language

## **Spanish I** 9, 10, 11, 12

503/504

Spanish I is an introductory course into the Spanish language. Students will be building fundamental skills in listening, speaking, comprehension, reading and writing the Spanish language. Students will also be introduced to the Spanish culture through task-based activities, collaborative communication and authentic materials.

## **Spanish II** 10, 11, 12

513/514

Spanish II builds upon the skills and concepts taught in Spanish 1 with an emphasis on communication, building vocabulary and the linguistic structures of Spanish. Students will gain understanding of the Spanish culture and language through learning activities that enhance the language experience. **Prerequisite:** Spanish 1

## **Spanish III** 11, 12

523/524

Spanish III has been carefully designed to focus on successful communication through speaking, writing, reading and listening as well as thorough grounding in aspects of culture. Each unit embodies all of these standards. Unit activities blend different forms of communication and culture to ensure that the student meets all standards. Course strategies include warm-up activities, vocabulary study, reading, threaded discussions, multi-media presentations, self-checks, practice activities and games, oral and written assignments, projects, quizzes and exams. Learning activities in each unit are focused upon a specific theme. **Prerequisite:** Spanish I & II and teacher recommendation.

## **Spanish for Spanish Speakers** 9, 10, 11, 12

511/512

Spanish for Spanish Speakers is designed for students for whom Spanish is a native or heritage language. Students will develop their reading, listening, writing, and speaking skills in Spanish, as well as study Hispanic history and culture. Students will be introduced to the study of grammar and literature of the Spanish language through debates, oral presentations, demonstrations, speeches, and student lectures. Writing assignments for this course will focus on the advanced paragraph and the three paragraph essay and the differences between formal and informal language use. **Prerequisite:** Student must be a native or heritage speaker and have appropriate placement score or permission of the instructor.

# Physical Education

**PE 9** 550

Students will participate in a variety of individual and team sports, learning the basic rules and skills of each sport. These sports include but are not limited to soccer, football, badminton, basketball, volleyball, track, golf, weightlifting, president's fitness testing, and endurance fitness. This course is designed to begin a student's lifelong appreciation of physical activity.

**Advanced PE 10, 11, 12** 555

Students learn advanced concepts and strategies for a variety of sports. They will use teamwork and strategic planning to help accomplish specific objectives included in each of these sports. Each student is expected to participate at a higher expertise in those areas. This class will help students to develop their core body strength, balance, and coordination.

**Health 9** 560

Emphasis is on establishment of a lifelong wellness lifestyle that is based on a Christ-centered balance of intellectual, physical, emotional, and social needs. Students will learn nutritional issues and become familiar with basic First Aid. Course will include activities that promote a healthy lifestyle.

**Weight Lifting 9, 10, 11, 12** 575 or 576

This course begins as an introduction to weight training and moves to an intermediate level as the semester progresses. Students learn the basic core lifts and write their own specific workouts to strengthen their bodies in the individual's desired area. This course is highly recommended for all student athletes.

**Interscholastic Sports 9, 10, 11, 12** 580-589

*(1/4 credit per season, maximum of 1/2 credit per year, maximum career total of 1 credit)*

Students may earn 1/4 credit for each season of interscholastic sport, provided they are active participants in practices and games for the entire season. No more than one sport may earn credit per season. No more than 1/2 credit of credit for interscholastic sports may be used to fulfill the physical education requirement.

# Computers

## **Computer Technology** 10, 11, 12

611

This is an introduction to computer application software course that encompasses document processing, spreadsheets, and presentations, and typing skills. Students learn how to create and format flyers, research papers, resumes and cover letters as well as informal/ formal graphic presentations containing animation, sound, and data. Students will learn how to create, format, and edit spreadsheets and charts.

## **Intro To Coding** 10, 11, 12

650

Coding, the language of the future, is used in every piece of technology. Intro To Coding is intended for students with no previous background, and teaches how to code in a fun and accessible way. Through a series of learning “modules”, including example code, video tutorials, quizzes, programming challenges, and applied programming exercises, this course teaches the foundations of computer science. The course equips students with the programming fundamentals to learn any programming language.

## **Desktop Publishing** 9, 10, 11, 12

633/634

In Desktop Publishing, we will gain desktop publishing experience as we produce Valley Lutheran High School's yearbook, the Blazing Flame. We will use the Adobe InDesign desktop publishing software extensively throughout the year. We will also learn other critical skills necessary for the production of a yearbook, including photography, copywriting, copyediting, and page layout and design. **Prerequisite:** application and instructor approval required

## **Digital Imaging** 10, 11, 12

960

See complete listing in Visual Arts section. May be taken for fine arts or computer credit.

# Engineering

## **Intro To Engineering** 10, 11, 12

670

This course serves as an introduction to many of the standards, objectives, and skills to solve problems in real-world situations. Intro to Engineering is designed to cover a variety of modules that parallel engineering courses at the collegiate level. Students will learn and implement the steps in the design process, collaborate with peers to build, design, present and improve projects that mirror real-world engineering issues and collect and analyze data from their projects. There is also a section of the course dedicated to circuitry and making things move. The course serves as an introduction to many of the Engineering electives offered at Valley.

## **Rocketry** 10, 11, 12

671

Students will learn about the history of hobby and commercial rocketry by building and flying models that represent milestones in rocket design. Students will also learn design principles inherent in all model rockets by building, flying and recovering rockets that meet National Association of Rocketry (NAR) standards for safety and reliability. Each student will be required to build and launch at least 3 rockets of various designs. Rocket launch events will enable students to learn and practice safe and efficient launch protocols, consistent with NAR standards. Rocket teams that meet high standards of proficiency and have a willingness to compete may be invited to participate in the annual Team America Rocketry Challenge (TARC), an international rocketry event that tests a student team's engineering and technical abilities in a highly competitive environment.

# Music

## **Exploring Music** 9, 10, 11, 12 791

This one semester course is for any student (grades 9-12) who wishes to experience music in a variety of contexts. Utilizing a project-based approach, students will be exposed to composition, music and media, music history, world music, and performance. These projects will be designed by the students with direction and facilitation provided by the instructor. Individual and group meetings will occur regularly for students to bounce ideas off of the instructor as well as each other; creating a setting which allows them to consistently ask questions and explore what they are working on in the classroom. Students will have the opportunity to share their projects with the community in our concert settings that occur once per semester if they choose to do so.

## **Valley Chorus** 9, 10, 11, 12 711/712

This one year course is for any student (grades 9-12) who wishes to learn the art of musical expression with the voice. Utilizing the group setting of a choral ensemble, students will develop confidence and experience using their voices to make music with one another. Students will also be exposed to reading music notation and develop as confident singers in the realm of sight singing. Students will reflect on their development by individual conferences with the instructor once a quarter and group discussions after performances in chapel or concert settings.

## **Concert Choir** 10, 11, 12 733/734

This one year course is designed for students who wish to explore the art of choral music in depth through preprint music for performance. With an emphasis on creating an aesthetic experience for the audience and performers, students will continue to build on their confidence with group singing, sight reading, and challenging themselves with music across a variety of genres. This choir will prepare music for two concerts during the school year, church services (3 per semester), and a tour which will be taken every other year. Further depth of music theory as it relates to choral music will also be covered. **Prerequisite:** Private audition

## **Concert Band** 9, 10, 11, 12 758/759

This one year course is designed for students who wish to express themselves through participation in this instrumental ensemble. Depending on size and instrumentation, students will be exposed to music from different eras and genres. Students will also work to grow as expressive players on their instrument and explore with how to provide aesthetically pleasing performances for themselves and the community. They will have the opportunity to participate in two concerts during the school year and even in chapel as the situation allows. **Prerequisite:** A private meeting with the instructor.

## **Beginning Guitar** 9, 10, 11, 12 741

This one semester course is for any student (grades 9-12) who wishes to explore the world of playing guitar. Students will engage with the instrument in a variety of ways and learn the varying styles and techniques for utilizing the guitar in both individual and group settings. The students will set individual goals for themselves for the semester and work with the instructor to figure out how to plan and meet their intended goal. Students will be able to express themselves in the concert at the end of the semester in either individual or collaborative settings. A combination of direct instruction and individual exploration will be utilized.

# Science

## **Integrated Science 9**

801/802

During this important prerequisite for all other science classes at Valley Lutheran High School, students will accurately describe what is meant by the "nature of science" by learning and applying the history and philosophy of science consistently throughout the year as they learn fundamental concepts in chemistry and physics. The year will begin by examining aspects of the Nature of Science through a series of discrepant events, to help students change commonly held misconceptions and paradigms about the scientific enterprise, how scientific knowledge is generated, and what it takes to be a good scientist. Students will, within the context of the Nature of Science, investigate, describe and analyze the structure and properties of matter, describe and compare objects in terms of mass, density, scale, and volume, explain how visible changes in matter are related to atoms and molecules, describe how changes in matter are related to changes in energy, and describe how matter and energy are conserved in physical and chemical changes. They will also describe and explain how and why things around us move the way they do, explain basic concepts related to gravitational force, and explain and describe how lift is generated and how things fly. Much of this is done through a wide variety of nearly daily labs and classroom activities, and culminates in the end of the year with a forensics unit.

## **Biology 10, 11, 12**

803/804

Biology is the study of living things. This course introduces students to the created living world and is designed to build a basic understanding of microbiology, genetics, zoology, and botany. Students in Biology are encouraged to appreciate life as a marvelous work of a wise Creator. Students will develop an understanding of science as a tool for comprehending the Natural World. This course is a graduation requirement, and fulfills a lab requirement.

## **Honors Biology 9**

806/807

Biology is the study of living things. This course gives students an in-depth look at the created living world and is designed to build a thorough understanding of microbiology, genetics, zoology, and botany. Students in Honors Biology are encouraged to appreciate life as a marvelous work of a wise Creator. Students will develop an understanding of science as a tool for comprehending the Natural World. This course is a graduation requirement, and fulfills a lab requirement.

**Prerequisite:** Placement Exam.

## **Environmental Science 10, 11, 12**

843/844

What are the conditions necessary for a living planet? What principles guide how non-living and living things operate on Earth? In what ways do people depend on our planet's processes and resources? These questions and more like them are addressed in Environmental Science. We will also try to understand the fullness of God's Earth and humankind's place in Creation. Special emphasis is placed on discovering how people have impacted the Earth and how these affect our present and future. In spite of much "bad news" about the environment, we will explore ways in which people can act as responsible caretakers of Earth's resources and what it means to be agents of reconciliation to all of the Creation. **Prerequisites:** Biology, Algebra I

## **Chemistry 10, 11, 12**

823/824

Chemistry is the study of stuff: the matter that makes up our world and the universe. Students in Chemistry learn how matter is classified, how it changes and how chemists use notation to document changes. Chemistry is a laboratory science; students will become familiar with basic chemistry notation, measurement, calculation, lab procedures and safety. Chemistry is a fundamental science. Success in chemistry is important to college-bound students, and essential for students who intend to pursue further studies in the natural sciences. Instructor Approval Required. **Prerequisite:** Algebra 1 and teacher approval.



**Physics – Honors 12**

836/837

Physics is the study of how matter and energy are related and how they interact. In Physics, students explore some of the most fundamental questions of science, such as: How can we “know” anything with certainty? What is matter? What is energy? What causes things to move? How can we measure and quantify (put into numbers) ordinary events? What is the universe like? Students in Physics will spend much of their time learning by doing: measuring, manipulating, seeing and thinking through how the physical world works. **Prerequisites:** Algebra II and teacher approval

**Advanced Placement Biology 11, 12**

856/857

Advanced Placement Biology is designed to be the equivalent of a two-semester college biology course usually taken by biology majors during their freshman year. AP Biology is an *elective science course* for students who are highly motivated and have a strong interest in science. Major topics of study include biochemistry, cellular biology, organismal diversity, heredity, and evolution. As in a college biology course, the AP Biology course is designed to have both a lecture and a lab component. Labs conducted by AP Biology students are the equivalent of those experienced by college biology students. Students enrolled in this class are required to take the Advanced Placement Exam in May (Additional Fee Required). **Prerequisite:** Biology and teacher recommendation. **Corequisite:** Chemistry.

**Advanced Placement Chemistry 11, 12**

866/867

This course provides students with a college-level foundation to support future advanced course work in chemistry. Students cultivate their understanding of chemistry through inquiry-based investigations, as they explore topics such as: atomic structure, intermolecular forces and bonding, chemical reactions, kinetics, thermodynamics, and equilibrium. **LABORATORY REQUIREMENT** This course requires that 25 percent of the instructional time engages students in lab investigations. This includes a minimum of 16 hands-on labs (at least six of which are inquiry based), and it is recommended that students keep a lab notebook throughout. **Prerequisite:** Chemistry. **Corequisite:** Algebra 2.

# Visual Arts

## **Introduction to Art** 9, 10, 11, 12 940

This one semester course is designed to give incoming students a foundation in order to prepare for further exploration of the arts. Students will work through the basic elements of art and design through drawing, painting, and printmaking. They will also gain a view into how the elements of art have been used in art history. This course is a prerequisite for any future art classes.

## **Drawing I** 10, 11, 12 951

Drawing focuses on black and white or monochromatic rendering from life, pictures, masterworks, and imagination. This course is designed to develop higher-level thinking with an emphasis on studio production. Some art criticism, art history, and aesthetics may be included. **Prerequisite:** *Introduction to Art*

## **Drawing II** 10, 11, 12 954

Drawing II provides for further development of the concepts taught in Introduction to Art and Drawing I with more intense study of composition and elements/principles of design as applied to the two dimensional form. Some art criticism, art history, and aesthetics may be included. **Prerequisites:** Introduction to Art and Drawing I.

## **Painting** 10, 11, 12 952

Painting includes wet and dry color media with processes such as transparent and opaque painting focusing on the properties of color. Techniques with color media mixing and application will be covered. With an emphasis on studio production, this course is designed to develop higher-level thinking skills. Some art criticism, art history, and aesthetics may be included.

**Prerequisite:** *Introduction to Art and Drawing I.*

## **3D Design** 10, 11, 12 953

3D Design will explore a variety of mediums including papier-mâché, plaster, metal and mixed media. Possible other mediums may be introduced. Emphasis will be on basic design elements, function, aesthetics, creativity and craftsmanship using essential vocabulary and exploring art history from various perspectives. This course will also develop a student's ability to analyze space and form relationships within a three dimensional piece of art. **Prerequisite:** Introduction to Art

## **Studio Art** 12 955

This one semester course is intended for the aspiring fine arts major who have plans to continue their education in an art school or college. Each student will be assessed on an individual basis at the beginning of the course. Following this assessment the student will be mentored on an individual and group basis in order to prepare a portfolio displaying a breadth of media, subject matter, design approaches and concept. **Prerequisite:** Four Visual Art Courses, and teacher approval.

## **Digital Imaging** 10, 11, 12 960

In this project based course, students master technical skills as well as experiment with alternative approaches and materials as they compose unique digital artwork with Adobe Photoshop Elements. Several of the assignments will concentrate on a specific theme or problem. Additionally, students will develop a portfolio that demonstrates quality, breath, technical skill, and an expressive voice. May be taken for computer or fine arts credit.

# Miscellaneous Courses

## **Freshman Seminar 9**

050

Freshman seminar is designed to provide students with the necessary skills to be successful students. The course includes an exploration of effective habits, learning styles, study skills (including reading, note taking, organization, time-management, class participation, motivation and listening). In addition the class will include a unit on planning for college. Students will also practice writing skills.

## **Teacher Aid 11, 12**

099

(1/4 credit – 1 semester course)

Students serve as aides for faculty members by mutual agreement. Student responsibilities are determined by the teacher, and evaluation is on a pass/fail basis. **Prerequisite:** Teacher approval required.

# Interim

Knowing that education also takes place outside the classroom, the Valley Lutheran High School faculty has designed Interim. Interim is an exciting one-week learning experience offered between the third and fourth quarter of the school year. Each student will register for one course to be taken during the week. Courses in past years have included:

Outdoors in Arizona

Computers, Computer Games, Computer Crime... Past, Present, Future

Mission Trip to Mexico

Service with a Smile

Fishing

Trip to Europe

History of Baseball

Adventures in Photography

Hiking the Grand Canyon

Serious Bowling

Phoenix Staycation

Winter in Northern Arizona

Surf and Serve

Stay Green, Stay Cool, Stay Local

Way North Arizona Excursion

Philippines Mission Trip

Hiking Arizona

Ambassadors in Training

Each year new and exciting courses are added and old courses are improved and offered again. Most courses, but not all, will have additional fees required. Students can earn  $\frac{1}{4}$  credit towards graduation for each interim course completed. Interim has become a fun and exciting educational experience for both students and faculty.

# Graduation Requirements

## Class of 2019 and 2020

Theology	4 units
English	4 units
Social Studies	3 ½ units
Mathematics	4 units
<i>Students must successfully pass Algebra 2</i>	
Science	3 units
<i>One (1) unit must be Biology</i>	
Foreign Language	2 units
Physical Education	1 unit
Health	½ unit
Electives	3 ½ units
Computers	1 unit
Fine Arts	1 unit
Freshman Seminar	½ unit
<hr/>	
Total	28 units

## Beginning with Class of 2021

Theology	4 units
English	4 units
Social Studies	3 ½ units
Mathematics	4 units
<i>Students must successfully pass Algebra 2</i>	
Science	3 units
<i>One (1) unit must be Biology</i>	
Foreign Language	2 units
Physical Education	1 unit
Health	½ unit
Electives	3 units
Computers	1 unit
Fine Arts	1 unit
Freshman Seminar	½ unit
Engineering	½ unit
<hr/>	
Total	28 units