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GILMAN SCHOOL
COURSE OF STUDY: GRADES 9 - 12
2017 – 2018

In each of his first two years at Gilman, a student must carry the equivalent of six full-credits from courses that meet in the first three periods of the day. For his junior and senior years, he must carry a minimum of five full-credits from these courses. One credit is awarded for the completion of four years of athletics. Thus Gilman students who follow the standard curriculum will have acquired a minimum of twenty-three credits by the end of their senior year.

The basic minimum requirements are as follows:

- English: must be completed during each semester of high school
- History: World Cultures in 9th grade; European Civilization in 10th grade; US History in 11th grade
- Modern or Classical Language: must complete Level III; three consecutive high-school years of the same language
- Athletics: must be enrolled for four years; seniors may take a season off
- Art History/Music History: a required course for sophomores unless waived (see below)
- Mathematics: must complete Precalculus
- Science: Physics or Physics (Honors) and an additional lab science course (Chemistry or Biology)
- In addition, students must complete a total of six credits in Math and Science

Students may choose from a wide variety of courses to complete their required courses of study.

Gilman is a member of Global Online Academy. Juniors may register for a sixth course with Global Online Academy. Seniors may register for a fifth (or sixth) course. Please see Mr. Heubeck for details.

In addition to Gilman’s requirements, the State of Maryland requires a student to take 21 academic credits for graduation.

Fifty hours of Community Service must be completed at one location within any twelve-month period prior to the start of senior year.

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9TH GRADE: Freshmen take six courses that meet in the first three periods. Every freshman must take English, Mathematics, World Cultures, Physics, and Modern or Classical Language (Arabic, Chinese, French, Greek, Latin, Russian, or Spanish). For their sixth credit, students choose from Science (Robotics), History (American Government), Mathematics (Baseball & Statistics), Art (Drawing/Painting I, Photography, Pinhole to Digital, or Sculpture), or a second language. Freshmen also take mandatory (non-credit) Health & Guidance and Freshman Fifth courses that meet during the fourth and fifth periods.

10TH GRADE: Sophomores also take the equivalent of six courses that meet in the first three periods. In addition to continuing with Mathematics and Modern or Classical Language, most sophomores take the three-credit Humanities sequence, with parallel courses in English, European Civilization, Art History and Music History. Those students who elect to take a second language or continue their work in the visual arts are exempted from the Art/Music History requirement. Most of the art students and randomly selected members of the two foreign language students will be chosen to enroll in a double credit/two period course European Humanities in lieu of English and History, which covers literature, art history, music history, and the history of ideas. Sophomores generally complete their Science requirement by taking Chemistry or Honors Chemistry.

11TH GRADE: The standard load for juniors is five major courses, but more than half of the class takes six. All juniors continue with English, Mathematics, and Modern or Classical Language, and they all take United States History. Most juniors can expect that they will take either English or History at BMS or RPCS. Most juniors choose to continue with Science (usually either Biology or Honors Biology). Juniors may also select from a wide array of on-campus elective courses or a course at Global Online Academy.

12TH GRADE: Seniors must take five courses that meet in the first three periods each semester; a few students take more. Seniors must take an English elective each semester. Seniors have many options available for arranging a rich program from a wide variety of tri-school electives. They may also take a course at Global Online Academy. Their advisor and the College Counselors will help guide them toward wise selections. Schedules that do not include courses from the five major academic disciplines (English, math, science, modern and classical language, and history) will receive special scrutiny. With special permission, a senior may do independent study with a Gilman teacher, or he might take an approved course at a college. Courses taken at educational institutions other than Gilman, Bryn Mawr and Roland Park must be paid for independently and thus represent costs beyond the Gilman tuition.

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Acceptance into an honors or an Advanced Placement course is based on a careful departmental evaluation of the individual student. Specific criteria vary by department; most take into account, for example, the boy’s strengths and weaknesses, his prior performance in the department, and the overall rigor of his proposed schedule.

Credit for a full year course is only issued after the successful completion of the full year. No partial credit is issued.

Several senior level courses include a service component; please read the course descriptions carefully.

Courses not listed BMS (Bryn Mawr) or RPCS (Roland Park Country School) are offered on Gilman’s campus. Courses are year-long unless otherwise noted.

ATHLETICS

Throughout a student's Gilman career, he is required to participate in athletics as part of Gilman's curriculum. In the Upper School, he must participate in either interscholastic or intramural athletics each season. Under some circumstances, special permission may be granted for arrangements outside of the School's on-campus curriculum. The Director of Athletics must approve all special requests. In addition to special requests, a senior may elect to take one season off during the 12th grade year if he, athletically, is a student in good standing.

Boys in Upper School athletics receive school credit (one-quarter credit for three seasons) and a pass/fail grade on final report cards for their participation/attendance in each season. Boys who fail to participate or to attend the required number of meetings have the option of following several paths to successfully complete the year. In the interscholastic program, the coach and the Director of Athletics determine satisfactory participation. In the intramural program, the coach, the Director of Intramurals, and the Director of Athletics determine satisfactory completion of a season. Boys failing to make up the INCOMPLETE by the end of the year as described below would be given an F.

In the intramural program, there are two types of absences, excused absences (E) and unexcused absences (U). Boys who miss intramurals and are given an E through the Dean's Office and may make up this time in one of three ways. They may meet with a teacher either before school, usually during the week from 7-8 a.m. Boys may also chose to do their make up on Fridays from 4-5 p.m. with the teacher who is responsible for Friday make-up time. Both of these "make-up" opportunities need to be arranged in person with the teacher prior to the day and time the boy desires to make up his athletic commitment. The third option is to complete his required athletic commitment in the period of time between seasons for the Fall/Winter and Winter/Spring seasons. The amount of time between seasons varies but tends to be approximately two weeks. Specific dates will be announced each year. Boys who have failed to meet these requirements will receive an incomplete on their report cards at the end of the semester. In addition, during each season, a letter will be sent home to alert parents when the boy has accumulated approximately 50% of the absences he can accrue during any season, and another letter will be sent home just before the boy has run out of any flexibility with regard to attendance. The boy's advisor will also be notified as to his situation in athletics. Incompletes that are not improved to a passing grade by the end of the year must be made up in the above-mentioned ways or prior to the spring athletic assembly. Failure to correct any incompletes received at any time during the year will result in a boy not receiving credit for the course; this will require the boy to attend a summer session to remove the failure.

The other type of absence, unexcused (U), will be determined by the Dean's Office and will result in a slightly different consequence. These still count as absences from athletics, but they are not able to be made up and will go directly into the School's discipline system (subject to detentions) as would a cut from any other school commitment. In athletics boys may have both E and U absences, but the difference is that U's cannot be made up. A boy acquiring too many of these to pass the requirement for participation/attendance would be forced to go to a summer session unless he had other E absences that he could make up which would allow him to meet the participation/attendance requirements for that specific season.

Boys who attend school but are unable to participate in athletics due to sickness or injury must check in with the training room staff and receive a daily satisfactory completion assessment or be excused from athletics from by the Head Trainer. Failure to do so will result in a boy receiving a U for unsatisfactory attendance for the day. The Head Trainer will supervise appropriate rehabilitation or exercise for these boys based on their medical profile and until they are able to resume normal activities.

Our offerings are as follows:

FALL

INTERSCHOLASTICS

V, JV, & F/S Football
V, JV, & F/S Soccer
V & JV Cross Country
V & JV Volleyball
V & JV Water Polo

INTRAMURALS

Tennis
Soccer
Frisbee
Flag Football
Crew (by demand)
Martial Arts

WINTER

INTERSCHOLASTICS

V, JV, & F/S Basketball
V & JV Wrestling
V & JV Swimming
V & JV Hockey
V & JV Indoor Track
V Squash

INTRAMURALS

Basketball
Running
Soccer
Fitness
Rugby
Acting
Yoga

SPRING

INTERSCHOLASTICS

V, JV, & F/S Lacrosse
V, JV, & F/S Baseball
V & JV Track
V & JV Golf
V & JV Tennis

INTRAMURALS

Aquatics
Crew (by demand)
Frisbee
Softball
Table Tennis
Fitness
Volleyball

AT21 ATHLETIC TRAINING

Semester II

This course offers a hands-on, yet academic approach to the techniques and practices of an athletic training clinic. Open to all classes, but priority is given to seniors.

CLASSICS

Gilman School has a tradition of excellence in ancient languages. The mission of the Classics Department is to inspire and to help each student to construct their own *monumentum aere perennius*. We recognize that students bring unique skills and interests to the department, which we try to match by offering Latin at the standard and honors levels, Greek, and courses in ancient history and literature in translation. While some students use Latin and Greek to fulfill the school's language requirement, many others take Latin or Greek as a second language. History, the fine arts, science, the Romance languages, and English all enjoy certain common bonds with the Classics, and in Classics courses at Gilman that affinity is underscored wherever possible.

Departmental approval (Mr. Broadus) is required for enrollment in an honors or an Advanced Placement course.

Ancient History

ANCIENT GREECE

Semester I

Greek History from the Bronze Age through the Death of Alexander: It is customary to divide Greek history into the prehistoric and historic periods with the break coming at 776 BCE, the date of the first Olympic Games and the era immediately following the writing of the Homeric epics. The course initially will focus on the former period with a concentration on the Mycenaean and Minoan cultures. The latter period will include as its nucleus characters and events whose presence contributed to both the Golden Age of Greece and the Hellenistic period culminating in the death of Alexander the Great.

ROMAN REPUBLIC

Semester II

This course explores Roman history from the birth of the monarchy in 753 B.C.E. through the rise of Augustus. Particular attention is paid to the foundation myth, the republican constitution and political system, Roman conquest and imperialism, the civil war, and the Augustan political settlement.

Greek:

GREEK I: INTRODUCTORY

Beginning with the Greek alphabet, the student gradually gains sufficient fluency to translate first sentences, then paragraphs of Greek prose. Grammar, inflection, and vocabulary are emphasized to provide a secure base for reading passages from Plato and Xenophon.

GREEK II: INTERMEDIATE

After an intensive review of first-year material, the student proceeds to the translation of Xenophon and/or Plato, with extensive practice in sight readings from other authors. Lectures on Hellenic literature and civilization are interwoven into the course to provide a background for the student.

GREEK III ADVANCED

GREEK IV ADVANCED (Honors)

In successive years either Book I of the Iliad with selected passages from the remaining books or Euripides' Medea provides insight into the nature of epic and dramatic poetry. Related lectures on archaeology, mythology, and scansion help the student explore the wide spectrum of our classical heritage.

Latin – Standard Sequence:

LATIN I: INTRODUCTORY

Intended for students who start with Latin in the 9th Grade. Introductory Latin is planned as a sequential program, with the emphasis evenly distributed among three areas: development of a basic vocabulary, knowledge of inflection, and understanding of syntax.

LATIN II

Intended for students who have completed the Latin program in the Middle School or have completed Latin I; this course is the normal sequel to the introductory program.

LATIN III

This course continues the regular sequence in Latin. After completing a thorough review of syntax and inflections, students read selections from Roman authors.

LATIN IV

LATIN V

The vast variety of writings left by authors of both the Golden and Silver Ages of Latin literature provide unlimited material for study. This course will focus on three or four examples each year who are representative of the classics as the literary ancestors and models of modern European and English literature. Students will be asked not only to extract the essence of thought contained in each chosen Latin masterpiece but also to appreciate the artistic qualities which make it a work of enduring worth and a source of enjoyment. Since the authors taught will vary annually, this course may be repeated for credit.

Latin – Honors Sequence:

LATIN II: CAESAR (Honors)

This course provides an accelerated program for a selected group of highly motivated second-year pupils. The material of the course is essentially similar to that outlined for Latin II but is presented at a more rapid pace.

LATIN III: OVID (Honors)

Prose composition and Ovid are the mainstays of the Latin III program. After spending the first four cycles of the year reviewing morphology and syntax, students read selections from Ovid's *Metamorphoses*. Students translate literally into English, demonstrate a mastery of grammatical structures and vocabulary, analyze, interpret, and discuss these selections. Stylistic analysis and interpretation are integral parts of this course and develop from a student's ability to read the Latin in the original. Longer prose compositions will continue to reinforce understanding of morphology and syntax. The final cycles are dedicated to preparation for the SAT II.

AP LATIN: CAESAR AND VERGIL

Students gain appreciation of literature, both poetry and prose, as a work of art through their study of Vergil's *Aeneid* and Caesar's *Gallie War*. To accomplish this, they must develop their abilities (a) to translate, to read, and to comprehend Latin through mastery of vocabulary, morphology, and syntax, (b) to read Latin aloud with attention to linguistic, artistic, and metrical qualities, (c) to understand the interaction of the works with references to Roman culture, history, and mythology and to discuss with understanding the image of Roman identity that the texts project, (d) to identify and to elucidate an author's use of stylistic features and rhetorical strategies, (e) to demonstrate and to share their understanding of the texts, and (f) to develop skills and strategies to succeed on the Advanced Placement exam.

LATIN V: LYRIC POETRY (Honors)

Selected poems of Catullus and Horace are translated with special emphasis placed on creative interpretations and critical analysis. In addition, the student learns the scansion of such meters as hendecasyllabic, Alcaic, Sapphic, and Asclepiadean with particular attention to the oral reading of these meters. Through creative and collaborative projects, students explore the poets and their work.

Literature in Translation:

These courses cannot be used to fulfill the foreign language requirement.

CLASSICAL DRAMA

Semester I

The Classical Drama course will provide a survey of ancient Greek drama and the society that produced it. The course will examine a representative sample of the major plays of the tragedians Aeschylus, Sophocles and Euripides, as well as the comic playwright Aristophanes. In addition, modern adaptations of certain tragedies will be read. Among the topics considered will be: the tragic and comic festivals, the origin and nature of Greek theater, ancient theatrical production techniques, myth and tragedy, and the legacy of Greek tragedy in the modern world through film adaptations. Plays to be read include the *Oresteia*, *Bacchae*, *Antigone*, and *Frogs*. Time permitting, the comedy *Menaechmi* by the Roman playwright Plautus will also be read. Film adaptations of nine of the plays will be viewed. These include *Mourning Becomes Electra* by Eugene O'Neill, the *Antigone* by Jean Anouilh, and *A Funny Thing Happened On the Way to the Forum* (with music and lyrics by Stephen Sondheim and a book by Burt Shevelove and Larry Gelbart.). (This course may be taken for English credit.)

CLASSICAL MYTHOLOGY

Semester II

Focusing on the literary tradition of Greek and Roman mythology through extensive readings of the translations of Roman and Greek mythological sources, the course will feature both comparative and interpretive approaches, as well as evidence from art and archaeology. Lectures will include insightful discussions of classical myths in their historical and cultural settings, as well as their survival in literature, art, music, and film. (This course may be taken for English credit.)

ECONOMICS AND FINANCE

A.P. ECONOMICS

Year

(BMS)

This full-year course examines economic theory in preparation for the Advanced Placement Microeconomic and Macroeconomic Exams. The study of microeconomics will include product and factor markets and the role of the government in promoting efficiency and equity in the economy. Macroeconomic study will emphasize measurement of national income, the public sector, economic growth and international finance and trade. Research projects will stress the application of economic theory to specific issues. Students are required to do summer reading preceding the course and must take the Advanced Placement Examination in the spring. Please see Mr. Broadus for departmental approval.

MATHEMATICS OF FINANCE

Semester I or II

(RPCS)

Want to learn something that you can start using right away and continue using the rest of your life? Then learn the fundamental language and framework of personal financial decision making and gain the tools necessary to approach any situation involving economics and money. Topics include the compounding and discounting of interest rates and their applications, such as mortgages, credit cards, college saving and retirement planning; the analysis of financial statements, both of public and non-profit entities; and the attributes of financial instruments, both debt and equity related. In addition, students investigate the risk vs. reward relationship inherent in any financial transaction. Mathematical tools, such as exponential growth and decay, logarithms, ratio analysis and statistics are used to help make financial decisions and understand the foundational concepts of economics. Please note that the course is not about investing. Class materials include a text, various articles from the business press, internet sources and corporate filings. Outside speakers are invited on a regular basis.

ENTREPRENEURSHIP

Semester I

(BMS)

Students in this class will learn the process of launching a startup company while focusing on end-user experience and product design. Upon successful completion of this course, students will be able to conceive of the idea for a useful product or service, write a business plan, do market research, and have a basic understanding of the patent process. The course culminates with students pitching their ideas before a panel of experts for feedback and review.

ENTREPRENEURSHIP: THE STARTUP EXPERIENCE Semester II

This course provides real world, hands-on training on what it's like to start a real company. This class is not an exercise on how smart you are in a classroom, or how well you use the research library to size markets. And the end result is not a business plan or a simple VC presentation. This is a practical class –essentially a lab, not a theory or “book” class. Our goal within the constraints of a classroom and a limited amount of time, is to create an entrepreneurial experience for you with all of the pressures and demands of the real world in an early stage startup. This is a blended course, combining classroom instruction, on-line materials, and working with a mentor. Students are required to take part in the 2-day Startup Experience workshop in December prior to starting the class.

ENGLISH

Gilman School's English Department offers discussion-centered courses in literature and writing that equip students with analytical and communication skills while fostering a love of reading and literature.

Our curriculum seeks to balance a traditional education in canonical texts with exposure to more contemporary works and a diversity of cultural voices and perspectives. We encourage our students to “read as if for life,” as Charles Dickens says, developing empathy and moral convictions through a personal engagement of the literature. Gilman students learn to identify, appreciate, and interpret literary devices, rhetorical techniques, and elements of style employed by authors.

The English Department centers the development of analytical skills upon the close reading of literary texts. Our faculty recognizes, however, that written language is not the exclusive vehicle of ideas; therefore, many of our courses introduce media literacy skills by engaging and interpreting visual images, film, and other forms of media. Certain courses, most notably the European Humanities Curriculum in the sophomore year, feature interdisciplinary analysis, asking students to read literature in the context of its contemporary history, philosophy, art, and music.

The Upper School English Department's teaching of writing and the organization of ideas begins with mastery of the paragraph, moving toward argumentative essays, eventually incorporating research, development of a distinct voice, and an awareness of stylistic techniques. We encourage self-evaluation and promote student ownership over progress through such instructional methods as portfolio development, regular student-teacher conferencing, and metacognitive exercises. Through the Gilman Grammar and Syntax Foundation program in the Freshman, Sophomore, and Junior years, we develop in our students a practiced ability to compose sentences that are varied in style, grammatically correct, and properly punctuated. Many courses offer opportunities for creative and personal writing, and students interested in pursuing literary arts may elect to take creative writing courses, including those taught by the Tickner Writing Fellow, in the upperclassman years.

While the individual members of the English Department adhere to this philosophy in common, they enjoy autonomy in executing its goals, using various instructional techniques and with individual emphases as befits their own particular areas of specialization.

A Note on AP and Tracking: Our program seeks to prepare students for the rigors of a college English curriculum, and we confidently encourage upperclassmen to take the AP English Literature or AP English Language examinations. However, we do not offer a specified AP English course in order to afford our faculty the flexibility to design courses and curriculum that take advantage of individual creativity and expertise. Because we appreciate having a diversity of perspectives and experiences in our class discussions, we do not separate students into tracks. However, the department makes use of various resources, including the Tickner Writing Center and online grammar and punctuation modules, to provide students with the support they need to succeed in a rigorous curriculum.

Seniors may not repeat a creative writing course to fulfill their graduation requirement in English.

9th Grade Course -- Required

NINTH-GRADE ENGLISH

The ninth grade English course at Gilman focuses on the power of story while also developing essential skills - close and thoughtful reading as well as clear and concise writing. Through discussion, students and teachers wrestle with the important questions and overarching themes raised by the books they are reading. Students are encouraged to become attentive and reflective readers. Emphasized is the experience of embracing the life of another through imagination in order to develop empathy. Literature studied varies from teacher to teacher, although typically, works by Shakespeare and Dickens are included. The course also teaches grammar and vocabulary skills, and paragraphs and essays are cited according to the MLA (Modern Language Association) style of documentation.

10th Grade Courses -- Required

TENTH GRADE ENGLISH

In the tenth grade, students read literature in an interdisciplinary context, linking with the History Department's European Civilization course. In this way, students develop the ability to draw connections between a work of literature and its contemporary *zeitgeist* in terms of social conditions, philosophical concerns, economic changes, and artistic movements. In addition, the English 10 course pairs canonical works with more contemporary texts, deepening students' understanding of timeless themes while giving voice to diverse perspectives. In terms of writing, the course begins with intensive training and practice in close reading of literary texts, then later adds interdisciplinary elements and scholarly research. Highlights of the course include the Shakespeare Festival (all students perform scenes from the play we study in class) and the Artifact Paper (an interdisciplinary essay analyzing primary sources from history, literature, and art).

Most of the visual art students and randomly selected members of the two foreign language students will be chosen to enroll in a double credit/two period course European Humanities in lieu of English and History,

TENTH GRADE ENGLISH: EUROPEAN HUMANITIES

Students who are selected for this option will study a survey of the history of ideas from the Ancient Greek world to the Twentieth Century. The major periods that we will cover are the Greek World, the Roman World, the Medieval World, the Renaissance, the Enlightenment, The Industrial Revolution, and finally the Modern World. We will focus on the commanding ideas typical to each period: the conception of human nature, the relationship between the individual and society, and the connection between man and the natural world. We will study how these ideas are reflected in a culture's literature, art, and music. Our central goal will be to define the moral, political and philosophical principles that uphold civil society.

11th Grade Course -- Required

ELEVENTH GRADE ENGLISH

(BMS, GILMAN, RPCS)

The eleventh grade curriculum maintains the focus on fundamental skills but features intensive experience with more demanding reading and writing requirements. The course will primarily focus on the American Experience, attempting to define what is American and how we can come to know such a thing through our literature. The course intends to work closely, both thematically and chronologically, with the material in students' American History classes. Works by such authors as R.W. Emerson, Nathaniel Hawthorne, Mark Twain, F. Scott Fitzgerald, Ernest Hemingway, and Arthur Miller, as well as the poetry of Whitman, Dickinson, and Frost, among others, will shape the reading matter of the course. Additionally, the work of more contemporary authors, poets and essayists will be included. Students will refine their analytical skills through discussion and composition, with emphasis on the process of drafting, editing, revising, and proofreading. They will also spend time working on creative writing, with special attention to the genre of the personal essay. The study of grammar and vocabulary will also continue, and students will write a critical research paper according to MLA documentation.

Juniors may elect to take additional courses from the selection of on-campus senior electives, if space is available. Students may elect to take the Advanced Placement exam in English Language and/or English Literature in May.

12th Grade Course Electives – First Semester:

AFRICAN-AMERICAN LIT

Semester I

This course offers a study of African-American culture, as it relates to living in the multi-racial United States, through literature produced by 20th century African-American writers. In addition to dynamic discourse, students will enhance their personal library on this topic. Works from Wright, Hurston, Hansberry, Fuller, Wilson, Hughes, and others are selected.

AMERICAN LITERATURE OF THE 60s

Semester I

A Revolution in the Air: American Literature of the Sixties -- Rising from the reverberations of Allen Ginsberg's great *Howl*, the sixties were a decade of revolution, protest, polarization, liberation, experimentation, and promise. The fear of nuclear annihilation and the paranoia of the Cold War permeated the American psyche. The civil rights movement gave voice to disenfranchised African Americans and fueled the movement for women's liberation. The conflict in Vietnam, raging violently in the East, was broadcast nightly on American television. The New Left protested for a new form of politics while the counterculture encouraged the youth of America to expand their consciousness. In all, the sixties were a wide-spread convergence of the political, the personal, the philosophical, and the artistic. Through the study of such writers as Ginsberg, Kerouac, Atwood, Mailer, Vonnegut, Plath, Friedan, Pynchon, King, X, Thompson, Baraka, Sexton, Kesey, Wolfe, and others, students will analyze how literature and other forms of art from the sixties reflect that turbulent and often romanticized decade.

APPLIED PHILOSOPHY

Semester I

Applying Philosophy to Modern Global Issues is a multi-media, multi-disciplinary course which builds an ethical foundation on which students can make moral judgments about the most pressing and entrenched social issues which challenge the twenty-first century: inequality, poverty, and political oppression. This class will be taught in coordination with Global Online Academy's offering of the same course. (This course may be taken for English or history credit.)

AWARD WINNING LIT

Semester I

Award Winning Novels Since 2000: This course will explore four award-winning novels published since 2000. In reading these novels, the class will discuss how each of these texts is both inextricably linked to the new millennium and, at the same time, steadfastly bound to the timeless question of what it means to be human in a changing world. In addition to the core texts, the course will explore the post-2000 zeitgeist of the English-speaking world, how prestigious literary prizes are awarded, and how modern literary criticism plays a role in determining which texts are worthy of our collective reading time.

CLASSICAL DRAMA

Semester I

Please see the description in the Classics section. (This course may be taken for English credit.)

CHILDREN'S LITERATURE

Semester I

(RPCS)

Exploring Adult Themes in Children's Literature -- Since the last half of the 18th century, children's literature has offered adult writers a forum to explore the imaginative world of childhood. It has also provided a way to nurture, educate and entertain both young and old alike for many generations. In this course, we will consider themes that shape our notions of justice, good and evil, and right and wrong. By reading several selections from well-known authors, we will explore the historical development of children's stories and consider the cultural context and parallelism of tales from around the world. Students will write several critical essays in response to the readings and will also have an opportunity to write their own fairy tale or children's story. Readings may include selected tales

from The Norton Anthology of Children's Literature, Charlotte's Web (White), The Hobbit (Tolkien), A Wrinkle in Time (L'Engle), Alice in Wonderland (Carroll), among others.

CHINA AND MODERN EAST ASIA

Semester I

Please see the description in the history section. (This course may be taken for English or history credit.)

COMING OF AGE LITERATURE

Semester I

(RPCS)

The liminal space between childhood and adulthood is imbued with equal parts mystery, confusion, revelation, and transformation. In this course, we will read a variety of voices, from a range of cultures and backgrounds, as authors inhabit the space of the bildungsroman, or coming-of-age story. We will analyze, discuss, and write about the moral and psychological changes faced by characters in their search for identity, truth, and meaning. The course will culminate in a modern bildungsroman project, in which students will tell the stories of their own journeys into adulthood. Texts will include Kazuo Ishiguro's *Never Let Me Go*, Jonathan Safran Foer's *Extremely Loud and Incredibly Close*, Sandra Cisneros' *The House on Mango Street*, as well as selected poems and short stories. We will also view and analyze films like Richard Linklater's *Boyhood* and Mike Nichols' *The Graduate*.

CREATIVE WRITING

Semester I

Taught by the Gilman Writing Fellow, this course is an intensive workshop in creative writing. Because each new Fellow will design the curriculum according to his or her interests and talents, the course content is variable; it will include elements in both fiction and poetry, and may cover playwriting. Students should expect to write daily, read the works of accomplished writers, and participate in critiques of one another's writing in workshop format. Only students who enjoy reading and writing and who are willing to work hard to improve their writing should consider taking this course. Students may enroll in only one creative writing course.

DANTE

Semester I

In this course, we will read closely and with care *The Divine Comedy* by Dante Alighieri. In addition, we will accept the challenge of also letting "Dante read us." Other complementary authors include C.S Lewis, Sam Keen, Dorothy L. Sayers, Barbara Reynolds and Harry Chapin.

DISASTER LITERATURE

Semester I

(RPCS)

In southern California an illegal immigrant reaches for the American dream and a better life for his family. A young American soldier home from Iraq receives a hero's welcome during the Super Bowl in Dallas, Texas. An adolescent boy from the Dominican Republic tries to build a life on the outskirts of Manhattan. Through short novels and a collection of interconnected short stories, this course examines the thin line between a shining idea and a brilliant disaster. Texts include Billie Lynn's *Long Half-Time Walk* by Ben Fountain, *A Clockwork Orange* by Anthony Burgess, and *The Tortilla Curtain* by T.C. Boyle and *Drown* by Junot Diaz.

HOLOCAUST STUDIES

Semester I

Please see the description in the history section. (This course may be taken for English or history credit.)

IDENTITY LITERATURE

Semester I

(BMS)

The purpose of this course is twofold. The first purpose is to explore the history and literature of racial passing during the Jim Crow Era of segregation in America in the early twentieth century. During that time, unknown numbers of African American individuals "passed" for white in order to escape the social and legal oppression of the realities of segregation. We will study novels and stories from that era as both literary and cultural texts to explore these narratives of loss and the ways they continue to impact what it means to be a person of color in America. From these stories, we will also explore our second purpose: to consider the ways that identity – as it functions individually and collectively – might function both to reveal our true selves and also, at times, to conceal those selves. Students will also be invited to explore their own identities through a variety of lenses. Texts may include *Passing* by Nella Larsen, *Covering* by Kenji Yoshino, *The Brief Wonderful Life of Oscar Wao* by Junot Diaz, and selected short stories from writers like Jhumpa Lahiri, Annie Proulx, and Junot Diaz.

IMPERIALISM

Semester I

(RPCS)

In the early twentieth century, more than half of the world's surface and population fell under the control of an imperial power. Many European nations established far-flung networks of colonies that contributed to their economies, militaries, national identities, and culture. However, imperialism was not limited to Europeans; China, Japan, India, and other nations all have imperial pasts, and the United States has recently borne charges of imperialism as well. This course will take a long view of empires in history and literature, but will focus on the "new imperialism" of the nineteenth and twentieth centuries, including through the lens of imperial fiction written in the era and after the fact. Readings – from *Heart of Darkness* to *Sherlock Holmes* – will be complemented by interdisciplinary studies in philosophy, art, and film. (This course may be taken for English or history credit.)

IRISH LITERATURE

Semester I

(RPCS)

From the urban streets of Dublin to the wild cliffs of Moher, Ireland has entranced modern travelers from all over the world. However, it is almost easy to forget the devastation of the 19th century famine, the violence of the Easter Rising, and the crushing poverty that the creation of the Irish Free State did not assuage. This course will examine the wit and terror, myth and reality in modern Irish literature including plays, poetry, short stories, and novels. We will explore the varied representations of Ireland and consider the responsibility writers have to comment on and depict political and historical events. Texts may include: *The Importance of Being Earnest* by Oscar Wilde, *Playboy of the Western World* by J.M. Synge, *Cathleen Ni Houlihan* and selected poems by W.B. Yeats, *The Dead* by James Joyce, selected short stories by Claire Keegan and other Irish women writers, *Angela's Ashes* by Frank McCourt.

LEADERSHIP LIT

Semester I

Literature, Leadership, and Character: What does it mean to have character? What does it mean to be leader? In this course, we will consider the relationship of character and leadership through the study of literature, seizing the opportunity to learn from the journeys, triumphs, and failures of leaders represented in fiction, nonfiction, and drama from around the world and across time. Through off-

campus engagement with local leaders in fields such as education, politics, business, medicine, and the arts, we will explore the real-world relevance of the literature we study and also reflect upon the diversity of leadership styles and approaches in Baltimore.

LITERATURE OF INDIA

Semester I (BMS)

Journey to India: Literature and Culture of the Indian Subcontinent -- Each class will begin with a brief exploration of Indian culture. We might listen to music, view art and architecture, explore history and religions, or sample Indian food or masala chai. This immersion into Indian culture will help us understand the complex, beautiful literature we will read. Our texts will include short stories and novels from contemporary Indian writers, some who emigrated to the West and others who remain in India. We will explore how colonialism and emigration affected the culture and literature of India, how the importance of the family differs significantly from the United States, and how all of these factors, including gender and class shape identity. Assignments will include reading quizzes, graded Harkness discussions, and several written assignments of varying length. All written assignments will be analytical in nature, though some assignments will have an option with a creative component.

READING AND WRITING FICTION

Semester I

The Reading/Writing Fiction elective will focus primarily on contemporary short stories and how they are constructed. The students will learn to read with the writer's eye. Students also will write their own fiction. Class sessions will involve analyzing the style of stories from The Scribner Anthology of Contemporary Short Fiction both in a journal and in discussion, doing writing exercises, and responding to student writing in a workshop format. Homework will involve plentiful reading, both in the anthology and in a writing text, doing writing exercises, writing fiction, and responding in writing to student stories. The final evaluation will be a portfolio of student writing. This is obvious, but perhaps worth saying, the course is designed for students who like to read and write fiction!

READ/WRITE SHORT FICTION

Semester I (RPCS)

F. Scott Fitzgerald famously said, "The reason one writes isn't the fact he wants to say something. He writes because he has something to say." Writing fiction is an opportunity both to express your own beliefs and to create people and places and experiences far removed from your own reality. In this course, students will engage in daily writing exercises to practice various fundamental techniques and to generate ideas for longer pieces of writing. Additionally, students will learn the process of formal workshoping as a means for discussing, gaining feedback upon, and publically sharing their work in a safe and respectful setting. For inspiration throughout the semester, we will read both classic and contemporary short stories, as well as selections from Stephen King's brilliant book on craft, *On Writing*. The course will culminate in the creation of a portfolio of short stories.

THE SCANDAL OF ULYSSES

Semester I

The Scandal of *Ulysses*: Among the Western literary canon's most challenging and rewarding books, James Joyce's *Ulysses* employs revolutionary narrative techniques while responding to the timeless themes and motifs of *The Odyssey* and *Hamlet*. Students of this course will engage central human issues of family, religion, heroism, prejudice, and charity as they follow the wanderings of Stephen Dedalus and Leopold Bloom through the city of Dublin on June 16, 1904.

TERROR LITERATURE

Semester I (BMS)

Terror in American Literature -- One of the less studied traditions in American Literature is the unnamed fear that accompanies many of the facets of America that we consider most unique. Have we always been afraid of what we might be on our way to becoming? Students will read and write with the aim of defining and exploring the different elements that make up an American sense of terror. We may begin with close analytical readings of colonial preacher Jonathan Edwards and short fiction by Nathaniel Hawthorne and Charlotte Perkins Gilman, before encountering longer works by Shirley Jackson and Stephen King. We will also consider films to appreciate how these elements of terror cross the boundaries between mediums. Summer reading consists of two short stories by Edgar Allan Poe: "The Tell-Tale Heart" and "The Masque of the Red Death."

WRITERS IN REVOLT

Semester I

Writers in Revolt: Response and Rejection -- How writers respond to the conditions of their time will be the focus of this course. Readings will be drawn from British and American fiction and will include works by Melville, Chopin, Ellison, Steinbeck, Kesey, Orwell, and Waugh. In part, we will explore the role of the rebel and anti-hero in literature.

12th Grade Course Electives – Second Semester:

AFRICAN-AMERICAN WOMENS' LITERATURE

Semester I (RPCS)

Since the early writings of women in bondage, African-American women writers have explored what it means to be black, female, and American. It is at the intersection of these three identities that African-American female writers have found their voices and questioned the meaning of feminism, "The American Dream", cultural identity, self-pride, and self-acceptance, from a multi-faceted perspective. As the landscape of cultural identity in America has changed, so has the writing of these women. In this course, we will explore how the writings of African-American women have evolved over time as well as tackle the themes that run throughout the span of this literature, questioning not only what it means to be both black and female from a historical perspective, but within our modern American society as well. Works might include Dorothy West's *The Living is Easy*, Alice Walker's *The Color Purple*, Octavia Butler's *Kindred*, Gloria Naylor's *Linden Hills*, and April Sinclair's *Coffee Will Make You Black* as well as poetry from Gwendolyn Brooks, Rita Dove, Phillis Wheatley, Maya Angelou, Lucille Clifton, and Nikki Giovanni.

AMERICAN INDIAN STUDIES

Semester II (BMS)

The Trail of Tears is just a page in a textbook for most high school American history students, but this course will focus on the human experience of American Indians through the lens of contemporary American Indian literature. We will discuss the realities and repercussions of the historical and systematic oppression of indigenous peoples as well as the socio-economic consequences in contemporary indigenous cultures through the novels, stories, and poetry of writers like Leslie Marmon Silko and Sherman Alexie. Text may include *Fools Crow* by James Welch, *Ceremony* by Leslie Marmon Silko, *Tracks* by Louise Erdrich, *Tanto and the Lone Ranger Fistfight in Heaven* by Sherman Alexie, and the poetry of Joy Harjo and N. Scott Momaday. (This course may be taken either for English or History credit.)

CLASSICAL MYTHOLOGY IN LITERATURE**Semester II**

Please see the description in the Classics section. (This course may be taken for English credit.)

CORMAC MCCARTHY**Semester II**

In the violent, bleak, and morally complex worlds imagined by Cormac McCarthy one is left wondering: What is moral? What is immoral? What is good? What is evil? As McCarthy's characters navigate the morally complex landscapes of the past, present, and future, we are left to question the very foundations upon which our civilizations and individual lives are founded. In the first half of this course, students will read and examine the foundational authors of moral philosophy: Plato, Aristotle, Aquinas, Hobbes, Kant, Nietzsche, Mill, Rand, and Russell. In the second half of the course, students will apply the philosophy and theory learned in reading and interpreting major works by Cormac McCarthy: *Child of God*, *Blood Meridian*, and *No Country for Old Men*. Through the study of philosophy and literature, this course aims to help students better answer the fundamental philosophical question: How should I live?

CREATIVE WRITING**Semester II**

Please see the description in 12th Grade Course Electives – First Semester.

DETECTIVE FICTION**Semester II****(BMS)**

The Search for Truth: This course will explore the ways in which detectives are involved in understanding the nature of human connections and social constructs. The nature of authority, in particular, seems to merit close scrutiny in the gritty, corrupt worlds created by many of our best detective writers. We may begin with a close reading of Baltimore's own Edgar Allan Poe before moving on to analysis of the fertile post-war writings of Dashiell Hammett and Raymond Chandler, along with Jonathan Lethem's recent take on the genre, *Motherless Brooklyn*. Students should expect to write in a variety of styles about both literature and film.

DICKENS**Semester II**

This course will introduce the student/READERS to Charles Dickens, one of our especially devoted "literary parents." David Copperfield will be the main novel we will read with attention and care. In addition, after we spend time with David, the contemporary novel, Nobody's Fool by Richard Russo, will help us attempt the challenging task of grappling with that provocative yet ever-elusive idea/category, *DICKENSIAN*.

GAY/LESBIAN LIT**Semester II**

The objective of this course is to immerse students in gay texts and explore fundamental questions about sexual orientation, gender identity, prejudice, and the universality of being human – what we all share despite our sexual preference(s). This is a discussion-based course, so all students must be willing and able to engage in frank dialogue regarding any and all course-related questions and subject matter. An open mind is essential. In addition to participating in class discussions, students are expected to write several critical essays and participate in a variety of small group projects – including class presentations.

GOTHIC LITERATURE**Semester II****(RPCS)**

Feminist Gothic Literature: Some critics define Gothic literature by the time period in which it was written; others view it through the lens of specific plot elements, images, and literary tropes. With the growth of feminist theory in the latter half of the twentieth century, scholars noticed, and wrote extensively about, the fact that many of the most gripping and terrifying works of Gothic literature and art were created by women. What do haunted houses and things that go bump in the night have in common with the experience of being female, particularly in the pre-ERA era? How do these so-called "haunted" spaces connect to the psychological space of the feminine mind? Through reading and viewing a variety of fiction, poetry, psychological theory, and horror films, we will examine how female writers use Gothic elements both to entertain and to wrestle with what it means to be a woman. Literary selections include *The Yellow Wallpaper*, *Jane Eyre*, *Frankenstein*, *The Haunting of Hill House*, as well as the writings of Dickinson, Woolf, O'Connor, Oates, Freud, and Jung, among others.

GRAPHIC NOVELS**Semester II****(BMS)**

Pictures Worth a Thousand Words: Graphic Novels as Literature of Identity -- This course will focus on the genre of graphic novels. We will examine how visual images affect and influence our reading and understanding of texts and how we tell stories. Questions we may consider include: How do we read a visual text? What do we gain through a visual novel? Is anything lost from the traditional novel? Why have graphic novels become so popular? Why are they called graphic novels and not comics? Is there anything about the graphic novel that lends itself to the exploration of minority identities? We will read a wide range of texts examining various identities, such as race, religion, gender, and sexuality. We will begin our study by examining the genre of graphic novels through Scott McCloud's *Understanding Comics*. Primary texts may include: *Fun Home*, *American Born Chinese*, *Maus*, *Ghost World*, and *Persepolis*. Final projects may include a paper on a graphic novel not read in the class or the creation of a graphic novella using software such as Comic Life.

HEALTHCARE LIT**Semester II**

Writing About Healthcare and Medicine: In this course we will explore literatures from around the world that illuminate the heart of healthcare and medical practice. More specifically, we will examine the stories of doctors and healers, patients and the sick, as well as the efforts of governments and organizations to serve the infirmed and solve epidemics. We will study the work of fiction writers, memoirists, playwrights, and journalists, and students will produce their own writing about healthcare and medicine. Through off-campus engagement with local healthcare leaders we will also explore the real- world relevance of the literature we study and reflect upon the diversity of healthcare professionals, issues, and initiatives right here in Baltimore.

LITERATURE CIVIL RIGHTS**Semester II**

This course will examine the most important and influential rhetoric and literature from the American Civil Rights Movement. Students will study the art of rhetoric and apply what they learn to significant speeches, sermons, demonstrations, poetry, music, and literature from The Movement in an effort to understand why particular texts/speeches were so influential. The culminating project

for the course will require students to research a modern day civil rights issue, come up with a position, write a speech that utilizes effective rhetorical devices, and deliver that speech to the class in a way that persuades and inspires. Students will also write frequently about the speeches, poetry, and literature they read for the course.

LITERATURE OF MADNESS

Semester II

(RPCS)

What is madness? What makes a person “go insane?” How much of “craziness” is constructed? This course will explore the diverse representations of madness and mental illness in both literature and film. By examining an assortment of novels, poems, and movies, students will explore how depictions of madness vary in regards to time period, gender, race, and class. Texts and films may include: *King Lear* by William Shakespeare, *A Beautiful Mind* by Sylvia Nasar, *Wide Sargasso Sea* by Jean Rhys, *The Bell Jar* and selected poems by Sylvia Plath, *Girl Interrupted* by Susanna Kaysen, *Gaslight* (1944), *A Woman Under the Influence* (1974), and *Black Swan* (2010).

LITERATURE OF THE MIDDLE EAST

Semester II

(RPCS)

What is the Middle East? A complex and conflicted region of the world, it is a place often deeply misunderstood by Americans and Europeans even as we become increasingly dependent on and frustrated by our relations with countries like Iraq, Afghanistan, Iran, and more. Together, we will use literature and current events to better understand not only the clashes of today, but their roots in a part of the world characterized by incredible cultural, religious and linguistic diversity. Readings in poetry, fiction, memoir, and graphic novels as well as film viewings will help us explore topics such as community, identity, gender norms, tradition and will include authors like Orhan Pamuk, Khaled Hosseini, Rumi, Heather Raffo, Edward Said, and Yehuda Amichai, among many others.

MEMOIRS OF EXPATS IN PARIS

Semester II

Such prominent intellectuals as James Joyce, Ernest Hemingway, Picasso, and Gertrude Stein appear as characters in each other’s memoirs of their Parisian experience, offering divergent portrayals of themselves and each other. Through our comparison of such memoirs as Hemingway’s *A Moveable Feast*, Stein’s *The Autobiography of Alice B. Toklas*, and McAlmon’s *Being Geniuses Together*, this course will explore the personal relationships and aesthetic values that formed in and around Shakespeare & Company Bookstore, the headquarters of the Lost Generation in Paris.

NARRATIVE TECHNIQUE IN DRAMA AND FILM

Semester II

This course is designed for students interested in writing, and in theater and film studies. The focus in this class will be on analyzing storytelling techniques in plays and films, learning and becoming fluent with the vocabulary of playscripts and screenplays, exploring the dramatist’s and the screenplay writer’s craft, and studying plays and films from a writer’s point of view. The works studied will include both classic and contemporary plays and both classic films from the Golden Age of Hollywood and from modern cinema. In our study, we will take into account the contributions made to the storytelling of a particular play or film by other collaborative artists such as the director, designers, and actors, and evaluate those contributions in terms of an overall understanding and appreciation of the work as a whole. The class will be discussion based.

NON-FICTION WRITING AND RHETORIC

Semester II

(RPCS)

The ability to write powerfully opens many doors and helps the educated achieve their dreams. From politicians and professors to entrepreneurs and engineers, those who excel professionally often distinguish themselves through writing. This workshop-based course, rooted in the wisdom of William Zinsser, teaches students to write about their world with “clarity, brevity, simplicity, and humanity.” Students produce several pieces including a short biography, a critical review, a travel piece, a lyric essay, and a formal argument. Instruction places a strong emphasis on revision, and the course uses portfolio method of evaluation that encourages risk-taking and rewards effort.

POVERTY IN LITERATURE

Semester II

Picturing Poverty in History, Film, and Literature: We will study the ways that poverty has been depicted in various media from the nineteenth century through to the present. We will learn how to determine the various political perspectives suggested in the works of novelists, photographers, social scientists, historians, and film makers. Readings will include sections from Dickens’ *Oliver Twist* and *Hard Times*, Stephen Crane’s *Maggie*, Nicholas Lemann’s *The Promised Land*, Richard Wright’s *Native Son*, Elliott Liebow’s *Talley’s Corner*, August Wilson’s *Jitney*, and David Simon’s novel for television *The Wire*.

READ/WRITE POETRY

Semester II

(RPCS)

According to William Butler Yeats, “Out of the quarrel with others we make rhetoric; out of the quarrel with ourselves we make poetry.” Because of its raw and personal nature, poetry is one of the most intimidating, yet fulfilling, art forms. In this course, we will delve deeply into the reading, analysis, and writing of a variety of forms, including ekphrastic, formal, narrative, and free verse poetry. In this course, students will engage in daily writing exercises to practice various fundamental techniques and to generate ideas for longer pieces of writing. Additionally, students will learn the process of formal workshopping as a means for discussing, gaining feedback upon, and publically sharing their work in a safe and respectful setting. Throughout the Semester, we will read poems by contemporary poets including, among others, Elizabeth Bishop, Phillip Larkin, Adrienne Rich, Mary Oliver, Louise Gluck, Seamus Heaney, and Billy Collins. This course will culminate in the creation of a sizeable portfolio of completed poems.

TERRORISM STUDIES

Semester II

(BMS)

Please see the description in the history section. (This course may be taken for English or history credit.)

URBAN STUDIES

Semester II

Please see the description in the history section. (This course may be taken for English or history credit.)

WORLD WAR I

Semester II

Please see the description in the history section. (This course may be taken for English or history credit.)

HEALTH & PEER EDUCATION

9th Grade Courses -- Required

FRESHMAN FIFTH

Year, no credit

5th period

Once a cycle all freshmen meet with a small group of peers to discuss some of the challenges of transitioning to upper school. The class is facilitated by upperclassmen (“Senior Brothers” and “Peer Educators”) who are trained and supervised by the School Counselor to presents topics ranging from decision making, to time management and balance, to cyber safety, to dealing with a myriad of pressures that upperschool presents. This “mini advisory” of freshmen and their “big brothers” forms during orientation in late summer and stays together throughout freshman year as a source of information, support and a place to build connections and friendships.

HEALTH & GUIDANCE

Year, no credit

4th Period

This required ninth grade course meets during the fourth block. On alternate cycles, this course introduces students to the basic principles of health and helps student develop knowledge and skills to take responsibility for their own health. Because behavior patterns that contribute to significant adult health issues are established during youth, the course addresses issues such as nutrition and physical activity. Students will also learn about infectious diseases and the immune system. In general, the course is designed to motivate students to maintain or improve their health status, prevent disease and reduce risky behavior. Every other cycle (alternating with the Health component) the course focuses on supporting ninth graders with their transition into the upper school. The format is discussion based and the course is facilitated by school counselors as well as 11th grade peer educators. Topics include dealing with loss and transition, stress and anxiety, healthy choices and decision making, changing relationships with friends and family, setting and realizing goals. Students will be expected to reflect seriously or their experience and to participate fully and sincerely in the class discussion.

11th Grade Course -- Elective

SENIOR BROTHERS

Year, no credit

5th Periods

Seniors in this course check-in with a group of 8-10 freshmen for the first 20 minutes of one 5th period each cycle as a part of the “Freshmen Fifth” program. During these check-ins, Seniors will serve as “big brothers,” getting to know their freshmen brothers well and sharing with them some of the wisdom they have learned over the years. Seniors Brothers will also be expected to serve as mentors and roles model with their “Freshmen Brothers” around school throughout the year.

PEER EDUCATION

Year, no credit

4th and 5th Periods

Peer Educators are 11th grade student role models who facilitate the Freshmen Fifth program by sharing their experience and wisdom with 9th graders. Peer Educators are on teams which teach four lessons in the fall and four in the spring, as well as meet each cycle with a section of Freshmen Fifth. Peer Educators need to commit to training retreats in August and January, one 4th & 5th period training session and one Freshmen Fifth period each cycle. The course is limited to 25 juniors who, if the course fits into their schedule, will also need to submit an application and demonstrate the skills and attitude needed for the program.

HISTORY

To satisfy the Gilman School requirements in history and religion, all students must complete World Cultures in the ninth grade year, European Civilization (or Humanities) in the sophomore year, and United States History in the junior year. Freshmen, juniors, and seniors may choose from among a variety of elective courses.

Departmental approval (Mr. Baum) is required for enrollment in an honors or an Advanced Placement course.

9th Grade Course -- Required

WORLD CULTURES

This required course for ninth graders focuses on the history of the world’s major cultural traditions. It investigates the relationship and interplay between the religious, economic, social, political, and aesthetic systems in which the world’s religions were founded and are currently being practiced. Readings will include a collection of sacred, biographical, and fictional texts set in historical and contemporary contexts.

9th Grade Course - Elective:

AMERICAN GOVERNMENT

Intended primarily for freshmen, but open to juniors and seniors, this introductory course examines the three branches of the Federal Government in their contemporary and historical context. The format of the course is discussion, and students are expected to demonstrate an understanding of the reading assignments and an awareness of each author’s interpretation. In addition, each student will make several oral reports. Grading is based on the student’s performance on book reports, oral reports, class discussion, and tests. American Government is open to freshmen, juniors, and seniors.

10th Grade Course - Required

Most of the visual art students and randomly selected members of the two foreign language students will be chosen to enroll in a double credit/two period course European Humanities in lieu of the following course. Please see the description in the English section.

EUROPEAN CIVILIZATION

Intended for tenth graders only, and designed to run parallel to the tenth grade courses in English, Art History, and Music History, this course will survey major intellectual, social and political themes in the development of European civilization from the ancient Greeks to the present day. First and foremost, this course will present a history of ideas. Students will read selections from a wide variety of authors and explore how ideas relate to politics, literature, art, and music. Most readings will come from Perry's Sources of the Western Tradition, but students also will encounter literature from the past and historical writing by contemporary scholars.

11th Grade Course -- Required

UNITED STATES HISTORY

(BMS,GILMAN, RPCS)

This course, taught at Gilman, Bryn Mawr and Roland Park Country, surveys the history of the United States from colonial times to the post-World War II era. While readings and specific assignments will vary from teacher to teacher, all require analytical papers, essay tests and extensive readings, including primary sources.

12th Grade Course Electives -- Year:

AP EUROPEAN HISTORY

(RPCS)

AP European History is back. Learn about Europe from approximately 1450 to the present. You will investigate the content of European history for significant events, individuals, developments. This is your chance to delve more deeply into some of the topics you learned about in World History. Some of the themes explored throughout the course are the interaction of the various regions and countries in Europe, the interplay between poverty and prosperity, institutions of power, and the individual's role in society.

HISTORY OF SCIENCE (Honors)

Revolutions of the Mind: Topics in the History and Philosophy of Science is a year-long course which explores both the development of the scientific tradition through the ideas and people who revolutionized the way we understand our world and the intellectual impact of scientific thought on society, politics, and philosophical speculation in the ancient and modern world. The course begins by looking at the early foundations of the scientific outlook through ancient Greek, Roman, and medieval scientific texts, making cross-cultural comparisons with the Chinese and Arabic traditions. We will then examine the intersections between the Scientific Revolution and the political revolutions of the seventeenth and eighteenth centuries, the radical promise of Darwinism for the nineteenth century, and the collapse of scientific certainty with the emergence of quantum mechanics and relativity theory in the twentieth. The course concludes with a look at the philosophical implications of cutting-edge theories of the late twentieth and early twenty-first century. Course readings include selections from: Aristotle – *Physics*, Nicholas Copernicus - *De revolutionibus*, Galileo Galilei – *Dialogue on the Two World Systems*, Rene Descartes – *Le monde*, Isaac Newton – *Principia mathematica*, Charles Darwin – *On the Origin of Species*, Albert Einstein – *Theory of Relativity*, David Bohm – *Wholeness and the Implicate Order*, The Dalai Lama, *The Universe in a Single Atom*.

US SINCE '45 (Honors)

This elective course covers the history of the United States from 1945 to the present by investigating the forces of the last fifty years that have shaped the present. We will spend relatively equal time on foreign and domestic policy with a particular focus on political history. Homework readings will be a mix of monographs, a textbook, and primary sources.

12th Grade Course Electives – First Semester:

AFRICAN-AMERICAN HISTORY

Semester I

This course will focus on and then attempt to synthesize three different types of investigation. One will be experiential – off campus and in Baltimore City. A second will survey the ideas of prominent black leaders of the 20th century. The third will engage students in controversial topics facing our society today. Students should expect to involve themselves fully in all activities – interaction with people outside our school community, reading, discussion and writing. (h) (Encounter option available)

AMERICA IN CIVIL WAR

Semester I

(RPCS)

The sesquicentennial of the Civil War has revived questions of what its causes were and what its legacies have been. Reflecting historical scholarship, the debates around these questions have not only covered the traditional focus on battles, but have also raised issues of gender, family life, race relations, politics, religion, the economy, and public memory. This elective will aim to have students learn about the Civil War in such broader dimensions. Students will guide the course as much as the instructor by being amateur historians examining sources in pursuit of their own interpretations. In particular, they will make extensive use of the *Valley of the Shadow*, an award-winning digital archive. Debates, seminar-style discussions, and student presentations will be core components of class activities. Where possible, field trips to Civil War sites and use of area experts as guest instructors will also be utilized.

AMERICA IN THE WORLD (Honors)

Semester I

(BMS)

This course combines history, political science, and international relations to investigate the major themes of U.S. foreign policy from the end of the Cold War to the present day. Organized topically rather than chronologically, the class explores the most pressing issues in U.S. foreign policy such as the Iran Nuclear Treaty, U.S.-China relations, the Wars in Afghanistan and Iraq, and the fight against ISIS by exploring how recent historical actors and events have led up to and created each current problem. Simulations, debates, and discussions give students exposure to multiple perspectives on each issue, allowing them to formulate their own educated opinions and to understand better the complex process of U.S. foreign policy decision-making.

APPLIED PHILOSOPHY

Semester I

Please see the description in the English section.

BALTIMORE STUDIES

Semester I

(BMS)

Baltimore Issues: Charm City – Down to “The Wire”? -- In 2013, crime statistics ranked Baltimore as the 7th most dangerous large city in the United States on various national charts. It had the third highest homicide rate in the nation. Baltimore has been called the “heroin capital of the United States,” on an ABC television documentary and by previous guest speakers in this class. Inadequate public education has plagued the city for decades. The illegal drug trade has created a cycle of poverty drowning some of Baltimore’s best neighborhoods. Focusing upon the Baltimore Riots of 1968, desegregation, poverty, crime, and the influence of illegal drugs, students will examine the impact of these issues and how they have changed the city of Baltimore in the past fifty years. Through readings, discussion, projects, research, and guest speakers, students will explore the recent history of Baltimore and its potential for change.

CHINA AND MODERN EAST ASIA

Semester I

After the cataclysms of revolution and war in the twentieth century, the East Asian region in general, and China in particular, has reemerged as one of crucial importance in the modern world. The purpose of this course is to examine the evolution of East Asian history and culture, so we can develop an understanding of how the region evolved to the one we see today. The course will focus primarily on China and Japan since the nineteenth century, with occasional forays into the Koreas and Southeast Asia. As this course may be taken for history or English credit, there will be extensive discussion of fiction, including the novels *To Live* by Yu Hua and *Kokoro* by Natsume Soseki, and several short stories by East Asian authors. (This course may be taken for English or history credit.)

CONTEMPORARY PUBLIC POLICY

Semester I

This course will explore in some depth the major public policy issues that emerge in the fall of 2007. By examining specific issues and opposing viewpoints that currently engage our attention, students should be better able in the future to exercise their duties and rights as fully informed and engaged citizens. Daily and careful reading of print media, class discussion and a series of analytical papers will be the principal activities of the class.

CRIMINAL LAW IN THE UNITED STATES

Semester I

(RPCS)

"You have the right to remain silent. Anything you say can and will be used against you in a court of law." With television shows ranging from *CSI* to *Law and Order* and even *Cops* dominating air waves, Americans have come to know these words well. We have a fascination with crime, the criminal, and the criminal law process. This course will address big questions - what is crime? who decides? how is the law enforced? what are the rights of defendants and why are they so strongly valued as to be enshrined in our Constitution? We will look into specific scenarios - can a school search its students' lockers? what are an individual's rights when pulled over at a traffic stop? to what extent can one use self-defense as a defense in court? when and how is an insanity plea used? What is required for the death penalty to be given as a sentence? What are the rights of and resources available to victims of crime? We will also learn about the criminal law system by using local resources, including educational visits with attorneys, and field trips to courthouses and detention centers. Finally, we will end the course with a discussion on crime and the application of criminal law in Baltimore, looking into the prevalence of gangs and corruption, and the seeming inequities in how and on whom the law is applied.

GLOBAL PERSPECTIVES: LAW

Semester I

(BMS)

Justice in the Eyes of the World: Legal systems play a key role in the development of national identity, politics, culture, and history. How have countries with different types of governments, cultures, and social norms handled thorny legal problems? How did Sharia Law, Common Law, and the Napoleonic Code develop into major systems of today. Does Saudi Arabia treat divorce cases differently than Great Britain? Are you as likely to be arrested and held without charges in Japan as you are in Russia? We will explore the laws and rulings in these nations through case studies, films, articles, research, guest speakers, and discussion. The countries we will be studying may include the following: Saudi Arabia, Great Britain, South Africa, Russia, Japan, and the United States.

HOLOCAUST STUDIES

Semester I

This course will guide students' investigation of the events surrounding the Nazi destruction of European Jewry during World War II. As students study the evolution of the 'Final Solution,' they will consider the history of anti-Semitism in Europe, the role of anti-Semitism in the nature of the Nazi regime, and the contingencies which shaped Nazi anti-Jewish policies. At the heart of this analysis will be a close study of the key events which transformed persecution into genocide during World War II. The Holocaust Museum will be an important resource during this process. During the final section of the course, students will explore the difficulties of finding meaning in the memory of the Holocaust by encountering memoir, fiction, essays and films with Holocaust themes. (This course may be taken either for English or history credit.)

IMPERIALISM

Semester I

(RPCS)

Please see the description in the English section. (This course may be taken either for English or history credit.)

INTERNATIONAL RELATIONS SINCE 1945

Semester I

(RPCS)

This course will examine the modern historical era from the Cold War to the New World Order. We will focus on regional issues such as: Europe from the Cold War to the European Economic Community; Vietnam; the Middle East from the formation of new nations to the current crises; Africa from decolonization to present concerns including the end of Apartheid, AIDS, civil war and genocides; Latin America's struggle for political and economic stability. The course will also examine global issues such as terrorism, landmines, population and food crises and refugee crises. Subject matter will be presented using a variety of materials including journals, current periodicals, film and online sources.

12th Grade Course Electives – Second Semester:

AP COMPARTIVE GOVERNMENT & POLITICS

Semester II

(BMS)

This course will provide an introduction to major theoretical approaches to comparative politics and examine case studies of the political systems and processes of the following countries: China, Great Britain, Iran, Mexico, Nigeria, and Russia. The goal of studying these nations will be to allow students to compare and contrast political institutions across nations and draw generalizations on the basis of these case studies. Students taking this course are required to take the Advanced Placement Comparative Government and Politics Exam.

AP HUMAN GEOGRAPHY

Semester II

(BMS)

The purpose of the AP Human Geography course is to introduce students to the study of patterns and processes that have shaped our understanding of the use and alteration of the Earth's surface. Students will learn how to employ spatial concepts and landscape analysis to examine socioeconomic organization and its environmental consequences. Geographical relationships will show students how to assess and analyze how cultural values, political regulations, and economic constraints work together to create particular landscapes. Ultimately, this course will not only give students a basis for locating and describing regions of the Earth, but seeing those regions as interconnected and as objects of analysis and exploration in a world which is ever-changing.

AP US GOVERNMENT & POLITICS

Semester II

(RPCS)

Every fourth year, Americans are thrilled, entertained, or alienated by the process of selecting the person who will occupy the central position of leadership in our nation. While most Americans today seem apathetic about their government, there still exists a certain magnetism to what goes on in Washington. The study of government and politics is the study of power – who has it, how to get it, and how it is used. Such a study necessitates a closer look at our institutions, the people who govern them, and the policies they institute. In preparation for the AP exam, topics covered include a review of the constitutional underpinnings, especially civil liberties; the role of the media, parties, and lobbyists in our political system; how Congress and the Courts work; and the power of the Presidency. Our focus will be mainly contemporary, emphasizing the policies of the current administration. Finally, there will be a summer reading component.

AMERICAN INDIAN STUDIES

Semester II

(BMS)

Please see the description in the English section.

HISTORY OF ANTI-SEMITISM

Semester II

(RPCS)

Why the Jews? Why is there so much hatred in the world? What is it about Jews that people hate? Why have a group of people been discriminated against as long as history has been recorded? These are just some of the questions that will be discussed in this course. We will trace the history of Anti-Semitism from the time of the Roman Empire to today. Specific topics will include the Roman period, Early Christian church and the Jews, Jews in the Middle Ages, Martin Luther and the Jews, the rise of Political Anti-Semitism in the 1800s, and Anti-Semitism in the 20th Century including an examination of Post-Holocaust Anti-Semitism.

LEADERSHIP IN HISTORY

Semester II

(RPCS)

Lessons from historical leadership -- Starting from George Santayana's premise that "those who do not learn from the past are doomed to repeat it," this seminar will examine the lessons to be taken from leaders in both the recent and distant past. How did leaders like Mohandas Gandhi and Michael Collins mobilize independence movements? How did ancient Romans and modern Britons administer multi-ethnic empires? How have female leaders responded to traditional or recent challenges to their authority? Perhaps as importantly, what lessons can we glean from past failures, and how can we use them to shape the future? Course topics will range from the ancient to the contemporary world and will include aspects of economics, sociology, and philosophy.

TERRORISM STUDIES

Semester II

(BMS)

Terrorism in the Modern World -- This course combines history, political science, and literature to examine the role that terrorism has played in the modern world. We will begin with an overview of the many ways people have defined terrorism and a brief narrative of terrorist groups and actions since the French Revolution. The core of the course will focus on a series of literary and historical case studies illustrating the motivations, tactics, and outcomes of terrorists around the world since 1945. Students will conclude the class by applying the knowledge they gained through the case studies by evaluating various strategies for fighting terrorism and creating their own counterterrorism proposal. (This course may be taken for English or history credit.)

URBAN STUDIES

Semester II

This course investigates the evolution of American attitudes and policies toward urban poverty in the 20th century by studying the work of novelists, social scientists, historians and journalists. In addition, students will participate in an experiential program in which they will work as tutors or aides in the Baltimore Public School system. (This course may be taken for English or history credit.)

WORLD WAR I

Semester II

This course will examine the Great War through the prisms of literature and history. We will delve into the political, social, and cultural ramifications of American life during this period. Students will be expected to study and understand the personalities that shaped the events and ultimate outcome of this epic struggle as well as the actions and reactions of the American people. By the end of the course we will have examined: the use of propaganda by the American government; the depiction of the war in popular culture. (film, posters, theatre, pamphlets, poetry, literature); questioned the origins and nature of the war and its effects on American society; worked with primary and secondary materials to develop their own interpretations; researched and interpreted one aspect of the era of World War I in depth, reflected in an oral (and possibly artistic) presentation and a paper. (This course may be taken either for English or History credit.)

WORLD WAR II: A GLOBAL HISTORY

Semester II

World War II continues to maintain its fascination, even though nearly seventy years has passed since its conclusion. The purpose of the course is to provide a chronological overview of the event, examining both the European and the Asian theaters of the war. We

will spend a significant amount of time tracing the origins of the war, especially the root causes in the World War I settlement and the rise of Nazi power in Germany. During the war itself we will focus on the major strategies pursued by the leading powers in the war, as well as particular topics like the use of strategic bombing in the war, culminating in the atomic bombings of Hiroshima and Nagasaki. Class materials will include significant use of documentaries and feature films, to help students understand how the war was experienced by the participants themselves, and how the war is perceived today.

MATHEMATICS

The Gilman Upper School Mathematics program presupposes a firm foundation in first-year algebra in the 8th grade. The graduation requirement is three years of mathematics, which is math through MA 51, pre-calculus with trigonometry. This minimum program should enable Gilman students to continue their study at the college level. Our program also attempts to meet the needs of exceptionally talented students with a strong interest in mathematics with an honors sequence which offers an accelerated and enriched program which prepares for the Advanced Placement examinations in AB Calculus, BC Calculus, and Statistics. For those students who complete this honors program in less than four years, the Mathematics Department will offer instruction in additional topics to the extent that staffing and scheduling permit.

Departmental approval (Mr. Gouline) is required for enrollment in an honors or an Advanced Placement course. The Mathematics department encourages movement between honors and regular classes as appropriate. In order to ensure that students are successful in their course placement, we have found that the following guidelines are appropriate. In order to move from a regular to an honors section, a student must complete the year with at least a 92 average in the regular sections with grades over 90 on both the midyear and final exams. They must also have a recommendation from their teacher that they possess the proper work habits and a talent for problem solving.

9th Grade Courses -- Required

ALGEBRA II

This course, which is usually taken by 9th graders, presents topics in number systems, functions, systems of equations and inequalities, quadratics, exponentials and logarithms, plus additional topics as time allows.

ALGEBRA II (Honors)

This is the first level in the Honors sequence and presupposes a commitment to take the A.P. exam in the 12th grade. The course is accelerated and enriched and includes, in addition to the topics covered in MA11, rational and irrational functions, polynomial theory, and other topics as time allows.

9th Grade Course – Elective:

BASEBALL AND STATISTICS

The vision for this course is to explore baseball and statistics. Most boys are familiar with baseball and have watched or played it for years. There is a great opportunity to explore many concepts of elementary statistics through the lens of baseball. Baseball offers us an opportunity to explore the following concepts of mathematics/statistics: distributions, probability, graphs, expectations. We will also explore how the game has changed through the years and get an introduction to programming in R, a statistical software package widely used in baseball analysis.

10th Grade Courses -- Required

GEOMETRY

This full-year course in Euclidian geometry is designed for the average 10th grade student.

GEOMETRY WITH TRIGONOMETRY (Honors)

This course covers all traditional topics of Euclidian geometry with special emphasis on definition and formal proof. It will include a study of non-Euclidian geometry and as time permits a portion of trigonometry with an emphasis on applications.

11th Grade Courses -- Required

PRE-CALCULUS

This course continues the study of Algebra II through polynomials, systematic counting and probability.

The course also presents a full study of Trigonometry. Some work with sequence and series and some math modeling is presented. PREREQUISITE: Algebra II and Geometry.

AB PRECALCULUS (Honors)

This unifying theme in this course is that of a function. Topics covered include polynomials, transformation of functions, exponential and logarithmic functions and trigonometry. An extensive look at trigonometry is taken before ending the year with a look at the foundations of calculus, including the concept of a limit and an introduction to the derivative.

BC PRECALCULUS (Honors)

This course devotes the first Semester of the year to studying functions of both finite and infinite mathematics. Emphasis is placed on the traditional pre-calculus topics including selected topics from Trigonometry, the inverse trig functions, polar coordinates, polar forms of complex numbers, vectors and other topics to prepare for calculus. The second Semester of the course introduces differential

calculus and applications of the derivative to prepare students to enter the AP Calculus program the next year; this course is a prerequisite for AP BC Calculus.

11th Grade Course – Elective:

AP STATISTICS

Please see the description below.

12th Grade Course Electives -- Year:

CALCULUS

(BMS, GILMAN)

The emphasis of this course is for students to be able to select and apply Calculus concepts in the context of problem-solving. The course will strengthen the algebraic underpinnings of Calculus and re-examine advanced Pre-Calculus skills as it explores such Calculus topics as limits, continuity, differentiation, and integration.

AP AB CALCULUS

(BMS, GILMAN, RPCS)

The syllabus follows the guidelines of the Advanced Placement exam in AB Calculus. After a study of functions and their inverses, limits, and continuity, the focus of the course is the introduction of differential and integral calculus and its applications such as max/min problems, related rates, curve sketching, areas, and volumes. All students are expected to take the A.P. exam.

AP BC CALCULUS

(BMS, GILMAN, RPCS)

This course completes the study of the syllabus for the AP exam in BC Calculus begun in MC52. The course begins with a review of the derivative and its applications. The course then covers additional applications of differential calculus, the definite integral and its applications, computation of antiderivatives, series, and Taylor's formula, and some work on solving simple differential equations. All students are expected to take the AP exam.

AP STATISTICS

(BMS, GILMAN, RPCS)

Designed for students who will be pursuing a variety of college majors. Statistics is a branch of mathematics that almost all students will find to be very useful. Topics in both descriptive and inferential statistics are covered, as well as ideas concerning probability. Some of the data needed is collected by students, and other information may be gathered from newspapers, government databases, medical data, political and environmental surveys, and other sources. Some simulations and many uses of computer software and graphing calculator applications are included. There is emphasis on the interpretation of statistical results as well as the predictive power of statistics.

NUMBER THEORY

Number Theory is the study of the most basic properties of the whole numbers. Its goal is to answer questions like "How many prime numbers are there? How many ways can you factor a whole number? How can you find the greatest common divisor of two numbers?" On the other hand, Cryptography is the study of how to send information that can be read only by the intended recipient. One of the remarkable discoveries of the 1970's was the discovery that these two seemingly unrelated disciplines were in fact entwined and that safe and secure cryptographic methods required the use of number theory. The purpose of this class is to provide an introduction to number theory, an historical overview of cryptography and then discuss how the seemingly abstract methods of number theory have profound application in cryptography.

12th Grade Course Electives – First Semester:

CALCULUS I

Semester I

(RPCS)

This course provides a rigorous analytical introduction to the techniques of differential calculus. The use of the limit to define a derivative is developed, along with techniques of differentiation and applications of the rate-of-change. In addition, the geometrical interpretation of the derivative will be explored. Students will explore topics via the use of technology and writing. Symbolic reasoning will be heavily emphasized. Calculus is designed to prepare students for success in a rigorous, theoretical college-level calculus course.

DISCRETE MATH

Semester I

(BMS)

Discrete Mathematics for the Humanities and Social Sciences -- If you have ever thought, "When will I ever use this math?", then this is the course for you. Discrete Mathematics has applications in a wide and diverse range of interesting fields, including architecture, interior design, art, business, transportation and scheduling, politics and government, city planning, international policies, economics, sports, entertainment, and computer security. In this course, topics covered will include matrices and Markov chains, graph theory, linear programming, optimization, voting methods, game theory and fairness, and codes and cryptography. Students will be researching new mathematical ideas and practicing new mathematical techniques, as well as completing projects and written assignments to investigate specific applications of discrete mathematics.

STATISTICS

Semester I

(RPCS)

Everyone is bombarded daily by charts and graphs, by data, by polls, by results of studies, and by assertions and claims made by people wanting to sell us things or convince us of something. The ability to sort out what's dubious (or even pure nonsense) from important and meaningful insights not only enlightens people, it allows them to make good decisions as consumers, as parents, and as citizens. This course is not only a math course but also a course in critical thinking and civics that will prepare students for greater success in this age of information. The course will concentrate on methods of proper data analysis using investigative tasks and a final project. Topics include basic data analysis, curve fitting, data collection and probability.

MULTIVARIABLE CALCULUS (Honors)**Semester I****(BMS)**

This course is a continuation of the study of functions begun in the B and C Semesters of Advanced Placement Calculus. The course focuses on applications and extensions of topics covered in BC, and it is designed to provide closure to some of those topics while, at the same time, preparing students for their uses and applications in both the theoretical and applied mathematics the students will see in college. Topics include the mathematics of vectors with dot and cross products, graphing functions in three dimensions, partial derivatives, and methods to locate extrema and saddle points on surfaces. If time permits, there will be an investigation of multiple integrals to calculate area, volume, surface area, and arc length in three dimensions. PREREQUISITE: AP BC Calculus.

12th Grade Course Electives – Second Semester:**STATISTICS****Semester II****(RPCS)**

Please see the description under Semester I. This course cannot be repeated.

STATISTICS AND DATA ANALYSIS**Semester II****(BMS)**

Have you ever wondered about the quality control and variability when you purchase a cup of coffee from a vending machine? What about the normal limits of blood pressure or the birth weights of babies? Why do some people have a good idea about whether their poker hand can be a winner? Should you play the lottery? When a political poll is taken, sometimes it successfully predicts the outcome of an election, and sometimes it is wrong. Why? This class is a project based inquiry into the applications of statistics to the sciences and social sciences. A goal is to help students understand the statistics that they read about in the newspapers and magazines, be wise in interpreting the barrage of data that they hear about on the evening news, and appreciate how quality control, marketing, advertising, polling, environmental testing, lottery winnings, and card games work with data and prediction through statistics.

TOPICS IN COLLEGE MATHEMATICS (Honors)**Semester II****(BMS)**

This course is designed to enable students with significant interest, ability and preparation in mathematics to investigate some of the subject's elegant theoretical underpinnings. The class will introduce students to mathematical modeling -- the process of using mathematical structures (including equations, functions, geometric shapes, and matrices) to capture some of the aspects of the behavior of natural and human-made phenomena. Conclusions and results of this mathematics can help predict what will happen with the real phenomena. Mathematical modeling topics explored in the class will be selected from linear programming, iterated functions, regression analysis, difference equations, predator-prey models, traffic simulations, coding, apportionment, election theory, graph theory, and Markov processes. Besides mathematical modeling other topics could also include graph theory, Boolean algebras (with symbolic logic and circuit theory), and group theory. These topics are treated with a thoroughness and rigor matching that of a University level Mathematics major, and the course should provide a glimpse of the world of the working mathematician. PREREQUISITE: Successful completion of the first semester of AP AB or BC Calculus.

MODERN LANGUAGES

The goal of Language studies at Gilman is for students to attain proficiency across three modes of communication: Interpersonal, Interpretive and Presentational. Students will be able to understand, interpret and produce messages in the target language in relation to authentic materials drawn from a variety of backgrounds and contexts. Students will explore level-appropriate aspects of the following themes: World Challenges; Families and Communities; Personal and Public Identities; Contemporary Life and Science; Technology.

- Interpersonal: Students will be able to communicate with each other in speaking or writing using appropriate language depending on context.
- Interpretive: Students will be able to understand the meaning, intention, and tone of authentic written, audio and visual materials.
- Presentational: Students will be able to collaborate or work individually to present and create original, comprehensible and contextually appropriate material for specific audiences.

The Modern Language Department offers students the opportunity to complete their language requirement by choosing between Arabic, Chinese, French, Russian, and Spanish. A student must complete three consecutive years of the same language at the high school level.

Departmental approval (Ms. Trapp) is required for enrollment in an honors or an Advanced Placement course. Completing a summer reading assignment is required for most of these courses. This assignment is due on the first day of school. An assessment of the assignment, either oral or written, will be given in a subsequent class.

Arabic:**ARABIC I****(RPCS)**

Students in Arabic I develop a strong command of the Arabic script, mastering reading and writing the Arabic letters. Simultaneously, students build a basic conversational competence in spoken Egyptian Arabic, practicing their skills by watching videos and through daily conversations and skits with their classmates. Students develop comprehensive language skills (reading, listening, writing and speaking) through a variety of assignments and hands-on projects that draw on authentic material, introducing students to the richness and diversity of Arab culture. By the end of the year, students are able to express themselves confidently about a variety of topics related to their daily lives.

ARABIC II**(RPCS)**

In Arabic II students build upon their skills from Arabic I so that they can more fluently speak and write about themselves and their daily lives. Students develop the depth and breadth of their vocabulary through daily conversation practice and hands-on projects based on culturally authentic Arabic materials. Students develop their ability to speak in complex sentences to express and justify their

preferences. Students also expand their knowledge of the Arabic root system, using this knowledge to guess new vocabulary and use the Arabic dictionary.

ARABIC III

(RPCS)

In Arabic III, students continue developing their formal Arabic skills through reading authentic texts and writing journal entries and essays. An in-depth look at finer points of Arabic grammar allows the class to approach more and more difficult texts, including stories and poems. Students learn the vocabulary and structures necessary to express and defend their opinions. Students continue to engage in classroom speaking activities that remain essential for practicing and developing a wider range of vocabulary; these encompass debates, formal presentations and casual conversation. Students watch music videos, TV serials, and news reports in order to improve their skills listening to a variety of registers of Arabic and to expand their exposure to Arab culture.

ARABIC IV (Honors)

(RPCS)

Arabic IV students continue to develop the full range of language skills at a more advanced level, expanding the variety and difficulty of texts and audio-visual materials they encounter. As their exposure to Arabic texts expands, students begin to familiarize themselves with the vocabulary and grammar of formal Arabic, exploring the commonalities and differences between written and spoken varieties of the language. Students also learn to use the Arabic dictionary. Now that students have mastered the basic skills necessary to write essays and letters, they work on writing in an idiomatic Arabic style using good connectors. They are able to discuss a variety of topics, even unfamiliar ones, expressing and justifying their opinions. Students' understanding of the distinction between formal and colloquial Arabic is further refined; they are able to switch as necessary between the two idioms with minimal mixing. The thematic focus of the course is now driven by the curiosity and interest of the students themselves as they take ownership of their language skills. Students must interact with native Arabic speakers outside of the school community, in person or through the internet, bringing their skills from the classroom into the real world.

Chinese:

CHINESE I

(RPCS)

The objective of this course is to enable students to use simple Chinese in common daily settings through studying the fundamentals of Mandarin pronunciation, grammar and character writing. Cultural knowledge related to lessons will be introduced to enrich understanding and generate interest in learning this language.

CHINESE II

(RPCS)

This course aims to reinforce the fundamental elements that students have learned and to extend the student's ability to communicate using a variety of language structures. In addition, students will broaden their vocabulary base and will learn to discuss aspects of Chinese culture, such as hospitality and etiquette, cuisine and holidays, in the target language.

CHINESE III

(RPCS)

This course emphasizes the acquisition of more sophisticated structural and grammatical concepts and idioms. Students refine their skills through activities such as writing stories, performing dialogues, and presenting on cultural topics. The goal is to increase proficiency in spoken and written language.

CHINESE IV

(RPCS)

Chinese IV students will work on enhancing interpretive skills, both interpersonal and presentational. The course is designed with a cultural framework, including topics such as Chinese holidays, cuisine, lifestyle, education, geography, etc. Students will prepare written responses and oral presentations on a variety of themes and do listening exercises in class. Class discussion will be integrated into each unit.

CHINESE V

AP CHINESE

(RPCS)

This course is a combined course that meets the needs of those in Chinese V, but also prepares AP students to meet the primary learning objectives of the AP exam. Chinese V students will continue honing their interpretive skills, both interpersonal and presentational. Students will prepare written responses and oral presentations at an advanced level on a variety of themes and do advanced listening exercises in class. AP students in the course will learn about a variety of cultural topics, but emphasis will be placed on preparing for the AP exam, in terms of both content and skills. Thematic units follow the Chinese V curriculum, but AP students are expected to acquire extra vocabulary and idioms, as well as apply their skills to authentic materials. AP students will also be tested in a format similar to the AP exam. Chinese V meets 6/10 and AP Chinese meets 7/10 cycle days.

French – Honors Sequence:

INTRODUCTORY FRENCH

(BMS)

This beginning level course is designed for those students who have had little or no French. This class strives to meet the learning needs of a broad range of students. Along with the use of a traditional textbook, the material presented in class includes very up-to-date online audio and video exercises which the students can also access at home. In class, students will work on learning and mastering the material through a variety of energetic and engaging activities that focus on speaking, listening, reading and writing. Students will learn the present tense, including the command form, of regular and irregular verbs; the passé composé; the alphabet and numbers; time; adjectives and adjective agreement; and vocabulary related to school, family, the home, shopping, eating, and travel. Assessment is based on the students' performances in the four areas of speaking, listening reading, and writing.

FRENCH II

This course is the standard sequel to the introductory course and is intended for those students who are entering in ninth grade with some preparation. Students will consolidate their knowledge of French grammar, vocabulary, and phonetics through the exploration of

thematic material. They will widen their appreciation of, and engagement with, the cultural, political and social particularities of Francophone life. Two principal themes will be: the city (from a broad human geographical perspective) and the environment (from a global perspective, drawing on situations from a range of Francophone countries). Students will demonstrate their understanding and ideas through regular, short composition assignments, and conversational and presentational activities appropriate to this level. Underpinning these cultural explorations will be a focus on the key areas of grammar that will enable them to discuss in the longer-term any number of subjects. In particular, a mastery of the pronoun system as well as a deepening and widening of their understanding of tense-aspect-mood in the language will ensure that they are well placed to tackle material in future years. Students will master commonly used core vocabulary, including adverbial expressions, in order to communicate effectively in full sentences across a range of discussion topics. Lastly, the students will improve their accent and intonation with regular recording opportunities being used to measure and celebrate progress across the year.

FRENCH III

French III is an intermediate level course, which builds on and sharpens the interpersonal, interpretive, and presentational communication skills that students acquired in French II. The class is conducted almost entirely in French. Students will broaden their cultural base by studying themes and vocabulary that deal with personal relationships, living spaces and family dynamics, media, political and social issues, research and progress. They will also study, compare, and contrast the history and culture of various francophone areas of the world through reading and listening to authentic media. The goal is for students to move beyond concrete topics that deal with the individual to issues important to today's globalized world. Students will demonstrate the acquisition of grammar and vocabulary through projects, presentations, debate and essays. The process of writing will be stressed as students learn to create more coherent and fluid essays. Orally, students will be able to effectively participate in predictable and concrete exchanges. Along with the class textbook and the accompanying online resources, students will have opportunities to acquire more vocabulary and grammar through songs, poems, short stories, and excerpts from media sources. In February, students watch and discuss "Entre les Murs", an award winning full length feature film. Required Summer Assignment.

FRENCH IV

FRENCH V

French is the primary vehicle for classroom communication in this advanced intermediate class. The focus is on oral communication, which will allow students to further develop their ability to voice their opinions, make cultural comparisons, and creatively express themselves in French. There is a thorough review of verb tenses, both the indicative and the subjunctive mood, along with building a rich vocabulary that includes contemporary slang and conversational expressions gleaned from short stories, poems, music, comic series, Astérix and Tintin, and some feature-length films. Students will acquire an understanding and appreciation of the culture and history of French overseas domains, French Polynesia, and French Indochina. Students will improve their writing skills through the completion of essays, their listening comprehension through movies, short videos, live news reports, and various on-line authentic audio broadcasts, their reading through short stories, news reports, poems, and literary excerpts. Students will watch and discuss four feature-length films: Jean de Florette, Manon des sources, La Haine, and Indochine. Towards the end of the year, each student will choose a francophone country and create a presentation that deals with the culture, history, ecology, and politics of this country. The material taught will vary annually. Juniors who signed up for French IV, may repeat French V for credit. Assessments will include vocabulary quizzes, debates and class discussions, film critiques, oral presentations and essays. Required Summer Assignment.

FRENCH V

(BMS)

The French Woman through the Ages and in the Contemporary World Year -- In this course we will explore the representation of women in the Francophone world. Readings, films, and songs will provide students with opportunities for discussion of women's roles, challenges, and opportunities in the francophone world, and will be the basis upon which we conduct cross-cultural comparisons. We will begin our inquiry by looking at multiple points of view on the properties of the "feminine" and how it relates to the "masculine". Do the new iPhone advertisements target a specific gender? What does body language reveal about women and men? We will analyze women through thematic lenses, organized into units, including "Rites de passage," "Les 'belles rebelles': la mode et la femme," and "Les femmes et le pouvoir de l'imagination." In the second semester, we will study women's francophone film, advertisements and literature from outside of the "hexagon," paying particular attention to questions of immigration, feminine identity, and westernization. This is a year-long course and may not be dropped at the end of the semester.

FRENCH V

(RPCS)

Francophone Culture and Conversation Through Cinema -- This course will concentrate on improving conversational skills through the study of various aspects of French and Francophone cultures and history as represented in the cinema. The course will examine to what extent various cultural aspects of the given Francophone country are accurately represented in each film studied and will also attempt to compare these cultural aspects to current events in the United States and the world. Conversation and vocabulary acquisition will be based on the situations and vocabulary presented in the films. The course will also examine how accurate subtitles are and what is lost in the necessary steps of translating the spoken word into short written sentences that will fit on the screen. Assessments will include vocabulary quizzes, debates and round table discussions, film critiques, oral presentations, and essays.

French – Honors Sequence:

FRENCH II (Honors)

This course builds on students' studies in middle school. Students will advance their knowledge of French grammar, vocabulary, and phonetics. They will widen their appreciation of, and engagement with, the cultural, political and social particularities of Francophone life. Two principal themes will be: the city and the environment. Students will demonstrate their understanding and ideas through regular, short composition assignments, and conversational and presentational activities appropriate to this level. Underpinning these cultural explorations will be a focus on the key areas of grammar that will enable them to discuss in the longer term any number of subjects. In particular, a mastery of the pronoun system as well as a deepening and widening of their understanding of tense-aspect-mood in the language will ensure that they are well placed to tackle material in future years. They will master commonly used core vocabulary, including adverbial expressions, in order to communicate effectively in full sentences across a range of discussion topics. Students will improve their accent and intonation with regular recording opportunities being used to measure and celebrate progress

across the year. Lastly, honors students are expected to acquire a wider understanding of stylistic and pragmatic choices in the language. They will learn about the subjunctive mood as well as relative pronouns in order to develop more nuanced and complex writing and speaking. Assessments for honors students are more rigorous and demanding than those for the regular track. Likewise, more is expected of students when it comes to written work, classroom participation, and presentations in terms of quality and quantity.

FRENCH III (Honors)

French III-Honors is the prerequisite for the French AP Language and Culture course. It is an advanced intermediate level course, which builds on and sharpens the interpersonal, interpretive, and presentational communication skills that students acquired in French II. The class is conducted entirely in French and there is greater rigor in terms of the pace of the class and expectations for student work than French III. In contrast to regular French III, Honors students will employ critical thought in comparing and contrasting cultural perspectives and issues that are important to today's globalized world. Students will continue to improve their listening, speaking, writing and reading skills as they tackle a variety of authentic resources that include short stories, poems, songs, online publications, videos, news broadcasts, and a feature-length film. In projects, presentations, debate and essays, students will demonstrate the acquisition of a variety of advanced grammar and vocabulary. An emphasis will be placed on the process of writing with the goal of students refining their writing skills in order to create more coherent and fluid essays. Required Summer Assignment.

AP FRENCH LANGUAGE

The AP French Language and Culture course is a college-level course intended for students who have demonstrated the enthusiasm and aptitude for material presented in French III H or French IV courses. A grade of 86% or higher in these two courses or the approval of the Department Chair is a prerequisite for the AP French Language and Culture course. The course will be conducted entirely in French. Along with a review of advanced grammar using lessons from the workbook, *Cours Supérieur*, students will focus on practicing and gaining confidence in the interpersonal, interpretive and presentational modes of communication. This course takes on an interdisciplinary approach and will be structured around six themes as outlined by the College AP Board: Global Challenges, Science and Technology, Contemporary Life, Personal and Public Identities, Families and Communities, and Beauty and Aesthetics. Using two books recommended by the AP College Board, *Allons au-delà* and *Preparing for the AP Exam*, students will engage in authentic reading and audio sources. They will sharpen their critical communication skills in French and they will make connections between the francophone world and their native culture. After Students take the AP exam at the beginning of May, they will see an award-winning feature length film, "Ridicule", that takes on an historical theme. They will then create a digital movie based on their choice of a cultural theme studied during the year. Summer reading and assignment are required.

FRENCH SEMINAR (Honors)

(RPCS)

This senior elective is designed to introduce advanced students to the formal study of a representative body of literary works in French. Students will examine some of the most intriguing points of intersection between literature (drama, prose and poetry), cinema and history. They will engage in lively discussions, debates and skits based on a variety of themes, such as the nature of the hero/heroine and the reasons protagonists are often forced to adopt a "double identité" while also examining the various aspects of French history and culture that influence these themes. Course material will include French and Francophone works from writers such as Voltaire, Césaire, Zobel, Maupassant, Molière, Camus and Rostand. Poets may include Baudelaire, Apollinaire, la Fontaine, Senghor and Damas. The class will be conducted in French in a manner which enables students to maintain and increase their already advanced level of fluency. Students will be assessed primarily on reading comprehension, class discussion and oral presentations, and critical essays. Summer reading is required. (Prerequisites: AP French Language or French V)

Russian:

RUSSIAN I

(RPCS)

This course introduces the Cyrillic alphabet, the fundamentals of Russian grammar, and vocabulary related to frequently-discussed, everyday topics. All four communication skills (listening, speaking, reading, writing) are used, enabling students to communicate using what they have learned through active class participation. In addition to reading text passages and watching videos from the textbook series, *Live from Russia!*, students are also exposed to authentic Russian literary works. Students are also strongly encouraged to take part in the Maryland Olympiada of Spoken Russian, an oral language contest held each March.

RUSSIAN II

(RPCS)

Students in second-year Russian continue to build on and refine their knowledge of Russian vocabulary and grammar, to the extent that they have begun to exhibit increasingly more instances of multiple-sentence- and paragraph-length discourse, and have also begun to cement their understanding and usage of Russian's six grammatical cases. In addition to the *Live from Russia!* textbook series, authentic films, recordings, prose, poetry and newspaper/magazine articles are also used to build proficiency. Students are strongly encouraged to participate in the National Russian Essay Contest in November, as well as the Maryland Olympiada of Spoken Russian in March.

RUSSIAN III

(RPCS)

Third-year Russian students are increasingly able to describe both their world and the Russophone world in multiple-sentence- and paragraph-length discourse, and exhibit a much keener linguistic and cultural understanding of how the Russian-speaking world works. Typically, most students have begun to 'automatize' their usage of Russia's six grammatical cases, and are more adept at describing events with respect to proper verbal aspect. This course continues to use the *Live from Russia!* text series, as well as other authentic literary and cultural resources. Students continue to be encouraged to take part in our state and national Russian language contests.

RUSSIAN IV (Honors)

(RPCS)

This course seeks to refine all language skills, with a continued emphasis on higher-level proficiency in Russian. An ongoing grammar review occurs in an environment that places special emphasis on composition and conversation. In addition to continuing their study of Russian with the *Live from Russia!* series, students integrate their language skills with a broader knowledge of Russian culture

through masterpieces of literature and cinema. The Practice AP Prototype exam in February helps to prepare students for the three-hour, Internet-based written AP Prototype examination that they will sit for later in the spring. An additional component of the AP Prototype exam is an 'oral proficiency interview' held over the telephone. As during their previous years of study, all students are encouraged to participate in our state and national Russian language contests.

Spanish – Regular Sequence:

SPANISH I: BEGINNING

This is the first course in the sequence for students who are beginning with Spanish for the first time in the 9th grade. (Note: Most Gilman 9th graders enter with some preparation in Spanish and thus move directly into Spanish II or Spanish II (Honors).)

Spanish I is designed to teach beginning students to develop proficiency in listening, speaking, reading and writing in the target language, with an emphasis on developing proper intonation and pronunciation. The course presents meaningful vocabulary which relates to the students' daily life. Students learn to communicate effectively about familiar topics to them, such as their family, friends, neighborhood, personal interests, and school life. Students in Spanish I focus on mastering the present, present progressive, immediate future tenses, and the simple past. Students will learn about the Spanish-speaking world. They will focus on Mexico, the Caribbean and Central America. This course should inspire students to use their Spanish in meaningful ways. This course will expose and encourage the students to understand differences and appreciate differences of another culture. The students will be exposed to different accents that come from the textbook series. Students practice their Spanish by role-play, writing dialogues, answering questions orally and in writing. This course should allow students to form open ideas about the Latino and Hispanic culture.

SPANISH II

Spanish II is designed for students to continue to develop their oral, aural and written communication skills while deepening their cultural knowledge. Students will explore topics pertinent to today's globalized world, including health, technology and housing. Through projects, presentations and exposure to level-appropriate authentic resources, students will consider the relevance of these topics to their own lives while simultaneously expanding their knowledge of these issues within the greater context of the Spanish-speaking world. Throughout the course, new vocabulary will be introduced in context, including through short reading selections, original songs and excerpts from local and international media sources. Additional activities will provide students with opportunities to further refine their listening and reading skills. In terms of grammar, students will expand their knowledge of the preterit, examine the uses of the imperfect and focus on the relationship between these two aspects of the past. Towards the end of the course, students will begin to explore the difference between the subjunctive and indicative moods. The *process* of writing will be stressed as students edit their drafts through a systematic approach of peer review, teacher feedback, and self-correction. Orally, students will be able to effectively participate in straight-forward communicative tasks (ACTFL Intermediate Low range). Students will be assessed on their participation in class, homework, short essays, projects, quizzes and tests.

SPANISH III

Spanish III is designed for students to continue to sharpen their communication skills while broadening their cultural base. Spanish III students will analyze various topics relevant to today's globalized world, including the environment, urban life, health, the world of work and the arts. Through projects, presentations and exposure to level-appropriate authentic resources, we will consider these topics in relation to students' immediate lives while at the same time examining these issues within the greater context of the Spanish-speaking world. Throughout the course, new vocabulary and grammar will be introduced in context, including through presentation of short reading selections, original songs and excerpts from local and international media sources. Additional activities will provide students with opportunities to further refine their listening and reading skills. In terms of grammar, the focus will shift towards the subjunctive and imperative moods. Students will also delve further into the perfect tenses in both the indicative and subjunctive moods and the conditional and future tenses. In their writing, students will create more coherent and fluid texts through more sophisticated use of transitional phrases and relative pronouns. The *process* of writing will be stressed as students will respond to teacher feedback on early drafts and correct their own errors in final drafts. Orally, students will be able to effectively participate in predictable and concrete exchanges (ACTFL mid-intermediate range). Students will be assessed on their participation in class, homework, short essays, projects, quizzes, and tests.

SPANISH IV

Spanish IV is designed for students to continue to sharpen their communication skills while broadening their cultural base. Spanish IV students will analyze various topics relevant to today's globalized world, including the environment, urban life, health, the world of work and the arts. Through projects, presentations and exposure to level-appropriate authentic resources, we will consider these topics in relation to students' immediate lives while at the same time examining these issues within the greater context of the Spanish-speaking world. Throughout the course, new vocabulary and grammar will be introduced in context, including through presentation of short reading selections, original songs and excerpts from local and international media sources. Additional activities will provide students with opportunities to further refine their listening and reading skills. In terms of grammar, the focus will shift towards the subjunctive and imperative moods. Students will also delve further into the perfect tenses in both the indicative and subjunctive moods and the conditional and future tenses. In their writing, students will create more coherent and fluid texts through more sophisticated use of transitional phrases and relative pronouns. The *process* of writing will be stressed as students will respond to teacher feedback on early drafts and correct their own errors in final drafts. Orally, students will be able to effectively participate in predictable and concrete exchanges (ACTFL mid-intermediate range). Students will be assessed on their participation in class, homework, short essays, projects, quizzes, and tests.

SPANISH V: HISPANIC CIVILIZATION

Spanish Civilization is a course that provides an understanding and appreciation of the Spanish-speaking world (Hispanic America, Spain and the U.S.) through language, culture, history, social aspects, literature and art. The units in this course are geographically oriented, and they will focus on individual countries or particular Hispanic groups, as well as specific themes as traditions and values, national identity, personal beliefs, immigration, etc. The topics will make reference to both historic events and current events in order to have a better understanding of the Hispanic World. Writing skills will be practiced by the completion of compositions and short essays, and communication skills will be developed by class discussions, watching movies and short videos, and oral

presentations. Students will get familiarized with literary texts, movies, documentaries and periodicals. Structure will be also addressed by reviewing some of the grammar studied in Spanish IV and Honors Spanish III. The new material will cover reflexives with change in meaning, transitional expressions, subjunctive with adverbial and adjective clauses, imperfect subjunctive and *Si* clauses. We will also explain in more detail the uses for prepositions, relative pronouns, “*qué* vs. *cuál*, negative, affirmative and indefinite expressions, and diminutives and augmentatives. Technology will be a key part of this course. Audio and written activities will allow students to practice all the learning skills in class and outside of class. These resources also help the students improve their language skills, especially in terms of listening and understanding written texts. Students will improve their language skills and their understanding of the Hispanic world through the cultural contexts studied in class, as for example: readings on cultural themes, presentations on Hispanic countries and its traditions, famous people in history or at present, everyday things, current events, etc. Students will be provided with authentic materials, as watching films, news broadcasts or TV shows. Spanish is the primary vehicle for classroom communication.

SPANISH V

(RPCS)

This course is designed to further students’ progress in the development of the four language skills, while deepening their insight into Hispanic culture through exposure to works by modern writers of the Spanish-speaking world. Some authors include Pablo Neruda, Amado Nervo and Gregorio López y Fuentes. Students study works from artists such as El Greco, Salvador Dalí and Frida Kahlo. In addition, the important concepts of Spanish grammar are reviewed, including the subjunctive, pronouns, commands, and “*si*” clauses. Students will be assessed using a variety of methods including oral/aural assignments, presentations, dialogues, short compositions, and other displays. Students are expected to participate using the target language.

SPANISH VI: SEMINAR ON LANGUAGE AND CULTURE

The Seminar on Language and Culture is designed for those senior students who wish to continue to deepen their cultural and linguistic understanding of the Spanish-speaking world following AP Spanish Language or Spanish 4 (Civilization). Through study of a series of short and feature-length films, short stories, poems, plays and a short novella, as well as online publications, songs and podcasts, students will be exposed to a wide variety of rich, authentic cultural material from throughout the Spanish-speaking world while at the same time enhancing their reading, listening, and analytical skills. Students will also continue to develop both formal and informal written and spoken registers of Spanish through activities designed specifically to work towards mastery in each of these areas, including class discussions and debates and interactive, student-led lessons. In addition, students will strengthen their research skills via independent and collaborative projects. Course objectives include further stimulating student interest in Spanish and its many representative cultures while preparing students for college-level study in Spanish.

SPANISH VI: HISPANIC WOMEN WRITERS

(RPCS)

This senior elective course, conducted in Spanish, will focus on major female authors from Spain and Latin America throughout history. Some of the authors include: Sor Juana Inés de la Cruz, Alfonsina Storni, Julia Alvarez, Isabel Allende, and Esmeralda Santiago. A variety of genres and styles will be explored the first semester. The focus of the second semester work will be the contemporary novel. Students will present special projects and write compositions based on the literature. The course is intended to develop proficiency in Spanish through reading, writing, listening and speaking. Students in this class should already have a good command of Spanish grammar. Emphasis is placed on the continued acquisition of vocabulary. Some of the assessments include: oral presentations, individual oral interviews, and short papers comparing and analyzing texts. A variety of technologies, including films and recordings, will be used to aid with the study of the literature. Conversation practice is an integral part of the course.

Spanish – Honors Sequence:

SPANISH II (Honors)

This course is the standard sequel to the honors program in the Gilman Middle School or follows completion of LS02. Study of the basic elements of Spanish is completed. All classes are conducted in Spanish. NOTE: Summer Reading counts for 20% of the first marking period grade. Honors Spanish II builds on previously learned skills and emphasizes increased accuracy. Students will review basic material as agreement in number and gender, adjectives, present tense, past tense, irregular verbs, stem changing verbs, direct and indirect object pronouns, and verbs like *gustar*. The student will continue their progress toward mastery of that material, as well as begin to work with the imperfect vs. preterit, the future and conditional tenses, the perfect tenses and the subjunctive mood (present and present perfect). Several of the relative pronouns will be practiced too. Students will also learn when and how to appropriately use of commands, both formal and informal. The emphasis on vocabulary expansion and more advanced writing, listening and reading tasks will enable the students to better negotiate communicative tasks. Hispanic American and Spanish Culture is an important aspect in this course. Through the study of Honors Spanish II, students will gain a knowledge and understanding of the cultures and traditions in Hispanic America and in Spain. Students will improve their language skills and their understanding of the Hispanic world through the cultural contexts studied in class, as for example: readings on cultural themes, presentations on Hispanic countries and its traditions, famous people in history or at present, everyday things, current events, etc. Students will be provided with authentic materials, as watching films, news broadcasts or TV shows. Technology will be a key part of this course. Audio and written activities will allow students to practice all the learning skills in class and outside of class. These resources also help the students improve their language skills, especially in terms of listening and understanding written texts. Spanish is the primary vehicle for classroom communication.

SPANISH III (Honors)

Spanish III Honors is designed for students who have successfully completed Spanish II Honors and are looking to continue with the challenge of an honors-level language course with greater rigor in terms of the pace of the class and expectations for student work. The class is taught almost exclusively in Spanish and students are expected to make every effort to interact in Spanish in the classroom. The class is organized around a series of cultural topics, including art, heroes, indigenous tribes, science and technology, women of the Spanish-speaking world and fantasy and imagination. Students will broaden their cultural knowledge while refining their listening and reading skills as they tackle a variety of authentic resources, including short stories, online publications, brief videos and feature-length films. Students will employ critical thought in identifying and appreciating cultural perspectives from the Spanish-speaking world that may be different from their own. Vocabulary development will allow students to discuss personal relations, literature and art, popular culture, the economy, science and technology, daily life, leisure activities and travel. In terms of

grammar, students will review the indicative and imperative moods while focusing on key areas of difficulty for non-native speakers, including the Spanish pronoun system, prepositions and the many uses of 'se' in Spanish. Students will then move onto the subjunctive mood, reviewing its use in the present tense before working with the imperfect subjunctive and 'si' clauses. Throughout the course, the *process* of writing will be stressed as students will respond to teacher and classmates' feedback on early drafts of short essays and correct their own errors in final drafts. Students will be assessed on their participation in class, homework, short essays, projects, quizzes, and tests.

AP SPANISH LANGUAGE

The AP Spanish Language and Culture course takes on an interdisciplinary, thematic approach which engages student learning through the in-depth study of six principal themes: Personal and Public Identities, Families and Communities, Contemporary Life, World Challenges, Science and Technology and Beauty and Esthetics. The ultimate goal of the course is for students to be able to understand and make themselves understood in interactions with native speakers of distinct backgrounds in a variety of contexts. To this end, students will engage with authentic resources from throughout the Spanish-speaking world including on-line publications, newscasts, literary texts, essays, podcasts, songs and films. Additionally, student will make comparisons and connections between their native language and culture and that of diverse areas of the Spanish-speaking world, focusing on the products, practices and perspectives of the target cultures. Students will attain and practice multiple learning strategies including the use of context in interpreting texts, the synthesis of information from various sources (including graphs and visual media), the use of graphic organizers and effective paraphrasing. Grammatical and lexical topics will be focus on the difference between formal and informal registers and written academic language versus spoken colloquial language. Other such topics will be addressed as dictated by student needs. Instruction and class interaction will occur exclusively in Spanish. Students are required to take the Advanced Placement exam in Spanish Language. NOTE: Summer Reading counts for 20% of the first marking period grade.

AP SPANISH LITERATURE

This level of Spanish is designed to get students ready to take the AP exam in May. The students learn about the six thematic areas as prescribed by the AP Board: las sociedades en contacto: pluralismo racial y desigualdad económica, la construcción del género, el tiempo y el espacio, las relaciones interpersonales, la dualidad del ser, la creación literaria. The students come to understand authentic text in relations the historic time and the literary genres. Throughout the year the students gain a better understanding of the overarching themes and concepts that are found in the different texts that they read. Through a focus on essential questions students come to be more aware of the Spanish culture. The text that is used for this level is, "Reflexiones". Students are expected to take the Advanced Placement exam in Spanish Literature. NOTE: Summer Reading counts for 20% of the first marking period grade.

SPANISH FILM (Honors)

(BMS)

This course offers a view of modern-day Spain through cinema. During the first semester, we view films by award-winning Spanish directors as well as the hit series, *Cuéntame* to form a (*moving*) picture of what Spain was like after the fall of its great empire, during its civil war, and the 36-year dictatorship that fell in 1975. Second semester we will turn our energy to learning to be a more discerning audience as we view many modern day Spanish "Blockbusters". We will watch how Spain post-Francisco Franco becomes a liberated and liberal country, a cultural stronghold and popular tourist destination. This course is oriented towards improving oral and listening skills, but will also provide ample opportunities to refine reading and writing skills, making sure you are ready to take an advanced Spanish language class in college. Required Summer Assignment. (Prerequisites: AP Spanish Language or Spanish V with a minimum of 87% and teacher recommendation)

MUSIC

Music History 10th Grade Course -- Required

This course is required for all tenth students who are not continuing their study of visual arts or a second language.

MUSIC HISTORY

Year, half credit

This full-year, half-credit course is one component of the tenth grade Humanities course. The primary aim of this course is to introduce students to major developments in Western art music. As a component of the Humanities Program, this course will coordinate with the History Department's chronological survey of European culture, the Art Department's survey of Western Art, and the English Department's survey of Western Literature. Western art music will be studied in the context of moral, political, and philosophical principles of each period in Western history, and the survey will take students from Gregorian Chant, through Medieval, Renaissance, Baroque, Classical, Romantic, and Modern music, all the way to contemporary music and jazz. The course will also introduce students to the fundamental elements of music to enable students to listen to and discuss music (whether it be "Classical" music or pop music of their choice) critically and analytically.

Music Theory – Elective

AP MUSIC THEORY

(RPCS)

This year-long course is offered to the student who has achieved a mastery of basic music theory skills. We build on the fundamentals of music theory: note names and clefs, rhythm and meter, major and minor scales, intervals, and triads. This course will cover four part harmony, figured bass notation, scales and modes, modulations, cadences, and form. Listening to and analyzing major works are integral components of this course as well as ear training and sight-singing.

PERFORMING ARTS

Performing Arts: Music Courses -- Electives:

BAND (INSTRUMENTAL MUSIC)

Year, half credit

Period 5

This class incorporates the study and performance of various styles of instrumental music through a variety of performing media, critical listening, study, and analysis. There is a strong emphasis on practice and preparation. Class meetings take the form of intensive rehearsals where the student will develop musicianship through listening, study and performance, will study and perform significant repertoire for winds and percussion, will develop an awareness of and ability to express beauty, will pursue a standard of excellence in performance, will develop techniques for analysis through study and critical listening, will develop a sense of cooperation and flexibility by working with others towards common goals.

STRING ENSEMBLE

Year, quarter credit

Period 5

This class is offered to students with previous experience on a conventional string instrument. Whatever the level of proficiency, all members find new challenges and opportunities that will enhance their abilities as student musicians. Class members will study and perform inspirational music of varying periods. Students must have a foundation of technical skill that will enable them to develop leadership skills necessary to perform literature that may require smaller ensembles. Student involvement in concert and performance activities will be part of the grading process for this course. On occasion, there are special events, rehearsals or concerts during non-school hours.

GLEE CLUB (CHORUS)

Year, half credit

Period 5

The Glee Club is open to all students who enjoy singing. Emphasizing healthy vocal production (especially through the voice change) and cooperative learning, we will learn and perform music from a variety of musical periods and styles. Our immediate goal is to discover and develop the challenge and joy of ensemble singing; our long-term goal is to periodically share these accomplishments by performing at school and in the community.

BELL CHOIR

Year, quarter credit

Period 4 & 5

Handbells are enchanting to hear, but even more impressive is watching a 15 member ensemble handle 62 chromatically tuned bells covering over 5 octaves. This considerable coordinated effort involves ringing, plucking, malleting, shaking, damping, and a host of other techniques. The individual musicians synchronized their motions, creating the musical effect of a solo instrument. Bells are taught from the beginning level and no prior musical experience is required.

JAZZ BAND

Year, quarter credit

Period 5

The Jazz band course is an elective that offers students a chance to enhance their musical knowledge and skills by performing various styles of jazz music (swing, Latin, bebop, rock, etc.). Eligibility for the course is based on participation in the Concert Band and instrumental needs of the group (by audition). Students playing guitar, bass, piano, and drum set are the only exceptions to this prerequisite.

Performing Arts: Theatre and Drama – Afternoon Elective

WINTER ACTING

Trimester II, quarter credit Athletic Period

This course will offer students a comprehensive introduction to Acting. It will meet Monday through Thursday from 4:00 to 5:30 p.m. during the Winter Athletic Season. The course will be team taught by Mr. Rowell, Mr. Malkus, Mr. Spragins and Mr. Flint. The course will begin with sessions that introduce students to improvisational theatre games as well as voice and movement exercises. The focus of the course will shift midway to monologues and scene study which will introduce students to the development of a character. Students will also receive an introduction to technical theatre: scene and lighting design. A vigorous twenty minute warm up involving voice and movement will begin each class. The course will be taught on the Main Stage of the Alumni Auditorium and in the Black Box Theatre. We will move to Centennial Hall and the Stevens Room when conflicts occur. The course will conclude with a public performance for friends and family. Grades will be given for participation, attendance and successful completion of key projects.

Performing Arts: Theatre and Drama – Senior Electives

ADVANCED DRAMA

(RPCS)

Footlights Theatre Ensemble (FTE) is an auditioned theatre ensemble for Upper seniors at Gilman. A select group of student actors, designers, directors, stage managers and technicians are chosen to create a collective ensemble. Throughout the school year students attend professional productions of six plays and meet for discussions with professionals who have worked on the productions. The ensemble creates two productions each year performed in the Tyler Studio Theatre. First semester, ensemble members write, direct, design and perform a fully produced evening of one-acts. Second ensemble, the ensemble creates another production of their choosing. Every other year FTE takes part in an interdisciplinary production which tours abroad. RPCS students must be available for mandatory rehearsals during the last two weeks of August to prepare for RPCS' Opening Day Convocation (Gilman and Bryn Mawr students are exempt from this requirement.) There are limited out-of-class technical rehearsals for Tyler Studio productions. Students are required to participate in two main stage productions each year, for Gilman and RPCS students one of these productions must be at RPCS. (Admission by audition or portfolio review.)

CONTEMPORARY PERFORMANCE

Semester I

(BMS)

Engaging Contemporary Performance -- This course investigates new directions in contemporary performance with a focus on performance texts that explore aspects of social justice, including *The Laramie Project*, *My Name is Rachel Corrie*, and selected works by Anna Deavere Smith. Students will explore new approaches to creating performance pieces as performers and playwrights. Engaging Contemporary Performance will be a participatory, performance-based, "mixed-media lab" that may also include guest artists and video installation.

THEATRE HISTORY AND SONG PERFORMANCE

Semester II

(BMS)

History and Song Performance is the study of American Musical Theatre with a dual emphasis on its history and the performance art of song delivery. Specific attention is paid to the vocal development of the individual through private sessions offered twice during the semester. Students study the theory behind the construction of a musical line and the performance practices needed to connect with the audience emotionally during a performance. Students also study one musical for content, construction, and performance elements. The semester culminates with a recital of appropriate pieces of repertoire co-selected by the teacher and student and thoroughly studied and researched throughout the semester. Both new and experienced singers are encouraged to enroll.

PSYCHOLOGY

DEVELOPMENTAL PSYCHOLOGY

Semester II

(RPCS)

Developmental Psychology is the comprehensive study of the human developmental stages, from conception to adolescence, encompassing genetic, physical, cognitive, emotional and social factors. This course will have a strong focus on child development and students will have an opportunity for observation in the young classes at RPCS.

AP PSYCHOLOGY

(RPCS)

This course introduces students to the systematic and scientific study of the behavior and mental processes of human beings and other animals. Students are exposed to the psychological facts, principles, and methods associated with each of the major subfields within psychology. The course emphasizes the history of psychology as a science, the different theoretical approaches that underline explanation of behavior, and the contemporary research methods used by psychologists. A college level text is used and student assignments and grades are based on college level expectations. Please see Mr. Broadus for departmental approval.

SCIENCE

Gilman's science requirement is two full year courses of lab science although many boys take three, four, and sometimes more science courses. The normal sequence of courses is Physics or Physics (Honors) in ninth grade, Chemistry or Chemistry (Honors) in tenth grade, Biology or Biology (honors) in junior year, and electives in the senior year.

Departmental approval (Mr. Morrison) is required for enrollment in an Honors or Advanced Placement course. Many of the elective science courses have prerequisites; please review them carefully.

9th Grade Lab Courses

PHYSICS NINE

This lab course is an introduction to the physical world. All incoming 9th grade students will be exposed to a year's worth of Physics. The first semester is broken down into units covering kinematics in one dimension, Newton's Laws of Motion, Equilibrium, Conservation Laws, Circular Motion, Machines, and Work and Energy. The second semester will encompass discussions involving Electricity, Magnetism, Waves and Sound, Light and Color, and Matter and Energy. With each unit, the students will be expected to use logical thinking, algebra skills, and work independently as well as collaboratively in both lecture and lab settings.

PHYSICS NINE (Honors)

This lab course is offered to those students, by placement from their 8th grade science and math instructors, who have a deep interest in the sciences. This course covers many of the same topics as in the Physics 9 course, but in greater depth. Students enrolled in this course must be dedicated, insightful, and capable of applying more intricate math skills in their problem solving.

9th Grade Course -- Elective

ROBOTICS

This class is designed for ninth grade students especially interested in robotics, computer science, mechanics and engineering. During the first semester, students will design and build a robot, learn to program it in java, operate it and train with it in order to participate in the FTC challenge. This is a competition that attracts thousands of high school and middle school teams from around the world. Students will collaborate to understand the problem presented to them, come up with the best design and build a robot out of commercially available parts and raw materials. Students will also sharpen their oral and written expression to communicate their findings. Competitions take place over two Saturdays in January and February and students are required to attend. During the second semester, students will participate in smaller groups in other local robotics competitions with different platforms that put more emphasis on electronics. Note: the first semester may include 9th, 11th and 12th grade students. Since the FTC challenge is different every year, upper classmen may return and participate in the competition again under the course named Robotics II or Robotics III.

10th Grade Lab Courses

CHEMISTRY

This laboratory course is designed to introduce students to the fundamental concepts of chemistry. These include atomic theory, atomic structure, periodicity of the elements, molecular structure and behavior, stoichiometric interpretation of chemical reactions, gas behavior, reaction rates, thermodynamics, solution chemistry, and acid-base equilibrium. The course emphasis is on abstract and logical thinking.

CHEMISTRY (Honors)

This advanced level lab course is offered to sophomores who have successfully completed Honors Physics 9. The units covered will prepare students to take AP chemistry their junior year. This course is distinguished from the Chemistry course in its faster pace and depth of study, and additional units on acids, bases, and equilibrium.

11th Grade Lab Courses

BIOLOGY

This lab course is an investigation of the principles that govern the living world and an introduction to how scientists approach and answer biological problems. The first semester will engage students in the study of the major processes of life through a focus on human physiology. In the second semester students will study ecology and evolution with a macroscopic perspective. The ecology unit will include field studies and a focus on how humans impact the diversity of life. In the second semester students will develop a deep understanding for the evolutionary principles underlying the unity and diversity of life on earth.

BIOLOGY (Honors)

This lab course is an investigation of the principles that govern the living world and serves as an introduction to how scientists approach and answer biological problems. The Honors Biology curriculum provides the essential knowledge required to move on to AP biology. It offers an in-depth coverage of the most crucial half of introductory biology: the philosophy of science, biochemistry, the cell and how it harvests energy and reproduces, genetics and genomics, and evolution. This course is a prerequisite for AP biology, which picks up where this class leaves off. *Prerequisites:* Chemistry, Physics. May be taken concurrently with AP Chemistry.

11th Grade Electives -- Year

AP CHEMISTRY

As a second year chemistry course designed to build upon the successes and knowledge acquisition of first year chemistry. Specifically, AP chemistry designed to analyze chemistry using a mathematical perspective and is equivalent of a first year college general chemistry course. As such, the course is suitable only for high school students who exhibit high levels of commitment, motivation and academic maturity. Additionally, Gilman's AP chemistry course will be a standards-based blended learning environment. Students must demonstrate a standard of mastery learning on all assessments and labs prior to moving onto the next objectives. As such, students will have multiple opportunities to revise and resubmit work to achieve the set standards. Finally, this course is entirely accessible online, allowing students to determine their own pacing and knowledge acquisition in consultation with their teacher, culminating with sitting for the AP examination in early May and a two week end-of-year project for the final exam.

ENGINEERING

This junior/senior elective is a full-year course with no lab component. Topics covered will include fundamental engineering principles such as design process, material properties, load testing, static equilibrium, basic circuitry, and computer modeling. Students will practice hands-on engineering skills such as 3D printing, spreadsheet programming, data analysis, report writing, and professional-style presentations, all performed in a project-based team setting. Students will gain insight into STEM career opportunities via professional guest speakers and field trips. Class design projects will be geared toward competition in local STEM engineering contests. This course will inspire students to hone their skills in math and science through application to real-world design situations that will challenge their creativity while feeding their curiosity.

11th Grade Electives -- Semester

ROBOTICS II

Semester I

This semester class is designed for eleventh and twelfth grade students especially interested in robotics, computer science, mechanics and engineering. Students will design and build a robot, learn to program it in java, operate it and train with it in order to participate in the FTC challenge. This is a competition that attracts thousands of high school and middle school teams from around the world. Students will collaborate to understand the problem presented to them, come up with the best design and build a robot out of commercially available parts and raw materials. Students will also sharpen their oral and written expression to communicate their findings. Competitions take place over two Saturdays in January and February and students are required to attend. Priority will be given to students with a demonstrated interest in the field and former members of the robotics course and club. Note: the course may include students from all grades. Since the FTC challenge is different every year, upper classmen may return and participate in the competition again under the course named Robotics III.

12th Grade Gilman Lab Courses

AP BIOLOGY

AP Biology is a college-level lab course that uses the sanctioned AP curriculum and stresses four Big Ideas: 1. Evolution drives the diversity of life. 2. Biological systems utilize energy and molecular building blocks to grow, reproduce, and maintain homeostasis. 3. Living systems store, retrieve, and transmit information. 4. Biological systems interact in complex ways. The course has an emphasis on molecular and cellular biology, including the biochemistry of respiration, photosynthesis, DNA replication, protein synthesis, and genetics. It also emphasizes the process of evolution in creating the diversity of the life on Earth and the relationships between it. AP Biology constitutes the second in a two part series beginning with Honors Biology. *Prerequisites:* Honors Biology, Chemistry, Physics. May be taken concurrently with AP Chemistry or AP Physics.

AP CHEMISTRY

Please see the description under 11th Grade Electives.

ENVIRONMENTAL SUSTAINABILITY

According to the US Census Bureau, 7.3 Billion people inhabit the earth as of January 2017. A 2015 United Nations Report “World Population Prospects” estimates 9.7 billion people by 2050 and 11.2 billion by the end of this century. Consumption of Earth’s finite resources far exceeds human population growth. As a senior elective Environmental Sustainability will draw on the student’s prior knowledge of the core science subjects. The heart of the course will immerse students in environmental impacts and sustainable solutions related to four major concepts: Food, Water, Population, and Energy. Students will develop their understanding through discussion and reading from diverse sources including relevant journal articles, media articles, and books. Students will display their understanding through writing, individual and collaborative projects, and presentations within and beyond the classroom. Students will be expected to delve deeply into the core concepts with a view to developing perspectives, and a solution focused action plan, from apersonal to local to global scale.

12 Grade Course Electives -- Year

A.P. ENVIRONMENTAL SCIENCE

(BMS)

This course is designed to provide students with the scientific principles, concepts, and methodologies required to understand the interrelationships of the natural world, to identify and analyze environmental problems both natural and man-made, to evaluate the relative risks associated with these problems, and to examine alternative solutions for resolving and/or preventing them. Field and laboratory studies, experimental design and data analysis are essential components of the course. Students are expected to learn some material independently. Basic algebraic calculations, dimensional analysis and scientific notation skills to help solve problems will be required. The summer reading required for this course will be announced prior to the end of the current school year. All students must take the Advanced Placement Environmental Science Examination in the spring. (Prerequisites: Biology and Chemistry. AP Biology, Ecology, or Ecology of the Chesapeake Bay may not be taken concurrently.)

ENGINEERING

Please see the description under 11th Grade Electives.

NEUROBIOLOGY

Neurobiology studies the biological basis of nervous system structure and function. This senior elective will be taught in the style of a college seminar, and will cover topics ranging from cellular neurophysiology to development to gross nervous system anatomy and clinical correlates. While not a formal lab course, we will use models and demonstrations to introduce the student to the wonders of the brain. *Prerequisites:* Honors Biology, (any) Chemistry, (any) Physics. May be taken concurrently with AP Biology, AP Chemistry, or AP Physics.

AP PHYSICS C: MECHANICS

AP Physics C: Mechanics is a calculus based, college-level physics course, especially appropriate for students planning to major in physical science or engineering. The class is meant to be taken as a second course in physics. The course explores topics in mechanics such as kinematics; Newton’s laws of motion; work, energy and power; systems of particles and linear momentum; circular motion and rotation; and oscillations and gravitation. Students will be required to use derivatives and integrals throughout the course, so they must have taken or take concurrently AP calculus AB or BC. The course has a strong hands-on, lab component where the students will, not only analyze data, but also design their own experiments. Students enrolled in the course are expected to take the AP exam during the second week in May.

12 Grade Course Electives – First Semester

CIVIL ENGINEERING

Semester I

(RPCS)

In this course, students will explore one of the great challenges of modern urban planning: maintaining a safe and healthy watershed. Topics covered may include providing safe drinking water, developing infrastructure for water transport, and other ways humans impact the hydrology cycle. An emphasis will be on materials design, and major projects may include developing effective water delivery systems and manufacturing materials to improve water quality. (Prerequisites: Physics, Biology, and Chemistry.)

ECOLOGY

Semester I

(RPCS)

Chesapeake Bay Ecology and Environmental Policy -- This course provides a comprehensive survey of the ecological that govern the Chesapeake Bay and its watershed. Regular field studies occur in the local watershed of the RPCS stream and the Stony Run stream on the Gilman campus. Having gained an understanding of current conditions and their impact on the Chesapeake Bay, students will focus on environmental policy and propose ways to improve the Bay by governing human use of the local watershed and the bay itself. (Students may not enroll in AP Environmental Science concurrently.)

ENGINEERING ENERGERY (Honors)

Semester I

(BMS)

This is a project based course that requires independent research. Beginning with the historical and scientific basics of how energy is converted to various forms for use, students will work on group projects explore energy use for heating and electricity generation with experiments using solar cells, wind turbines and hydrogen cells. The engineering of efficiency and conservation of energy in green houses and utilizing biofuel will be analyzed. Students will create personal energy audits independently, will build the most efficient solar systems in groups and design the best wind blades for a wind turbine. Large projects will take the place of the final exam and will include additional topics as nuclear energy, geothermal energy, tidal and wave energy, smart grid technology and power transmission methods.

GENETICS/BIOTECHNOLOGY

Semester I

(RPCS)

This course provides the opportunity to complete advanced work in genetics. Topics covered include Mendelian inheritance, molecular biology, genetic engineering, population genetics, and evolution. The uses of biotechnology are a significant part of the course, along with regular study of the social, ethical, and legal implications of recombinant DNA.

(Prerequisites: Biology & Chemistry.)

NEUROSCIENCE: LEARNING AND THE BRAIN**Semester I****(BMS)**

studies suggest that students who understand something about brain function, the process of learning, and factors that affect it are better learners. A growing body of research demonstrates increasing awareness of the connection between education, the brain function, and cognitive neuroscience. This course will both introduced students to current neuroscience research and provide them with an important understanding of how humans learn, information that should be helpful to them as they move on to a more independent life in college and beyond. Course format will involve collaboration, project-based learning, communication and scientific skills such as data analysis, pattern recognition, and reading current scientific literature. Pre-requisites for course include completion of or concurrent enrollment in physics, biology, and chemistry. Course topics will include brain anatomy, neural networks, neuroplasticity, basic principles of learning, and the impact of emotions and stress on learning.

ROBOTICS III**Semester I**

This semester class is designed for twelfth grade students especially interested in robotics, computer science, mechanics and engineering. Students will design and build a robot, learn to program it in java, operate it and train with it in order to participate in the FTC challenge. This is a competition that attracts thousands of high school and middle school teams from around the world. Students will collaborate to understand the problem presented to them, come up with the best design and build a robot out of commercially available parts and raw materials. Students will also sharpen their oral and written expression to communicate their findings. Competitions take place over two Saturdays in January and February and students are required to attend. Priority will be given to students with a demonstrated interest in the field and former members of the robotics course and club. Note: the course may include students from all grades. Since the FTC challenge is different every year, upper classmen may return and participate in the competition again under the course named Robotics III.

12 Grade Course Electives – Second Semester**ANATOMY AND PHYSIOLOGY****Semester II****(RPCS)**

This course provides a survey of various systems of the human body with an emphasis on their physiology. The workings of the various organs and their interactions will be examined and extensive laboratory work will be completed, which may include dissections. (Prerequisite: Biology and Chemistry.)

APPLIED CHEMISTRY**Semester II****(RPCS)**

This course will provide the chance to apply concepts learned in a first year chemistry course to ‘real world’ problems. Following a review of basic chemical concepts, students will be introduced to applications and explorations such as those found in 2-dimensional art, the food industry, consumer products, and the production of common pharmaceuticals such as aspirin. Students will also have the opportunity to gain an understanding of how flavors and fragrances are created through an introduction to the analysis and practical uses of organic compounds.. (Prerequisite: Chemistry)

ENGINEERING PRINCIPLES**Semester II****(BMS)**

This course introduces students to a variety of engineering disciplines while encouraging student creativity and collaboration. Students will become acquainted with the foundations of technical drawing and will use their knowledge to prepare blueprints of their projects in the structural engineering unit. Students will develop an understanding of the properties of materials and the analysis of forces on a structure before embarking on their own design projects. Projects will include analyzing tall buildings, bridges, sails and flying structures. And these projects will introduce students to the iterative nature of the design process.

IMMUNOLOGY**Semester II****(RPCS)**

How does the Ebola virus differ from the common cold? What causes allergies? Why are some bacterial infections more difficult to cure than others? How do vaccines work? This course provides the opportunity to learn the answers to these and other related questions as it explores how the human immune system works. Students will study the processes used to identify and respond to pathogens, and they will gain hands-on experience through laboratory experiments such as the ELISA test.

SUSTAINABLE DESIGN**Semester II****(RPCS)**

The goal of sustainable design is to produce products, processes, and services in a way that reduces use of non-renewable resources, minimizes environmental impact, and connects people with the natural environment. Engineering is the interface between science, technology, and the economy. Economic considerations have always been an integral part of engineering design, and sustainable design incorporates environmental considerations into the equation. In this course, students will learn about sustainable design concepts such as Life Cycle Assessment – a technique to assess the environmental aspects and potential impacts associated with a product, process, or service by compiling an inventory of energy and material inputs and environmental releases. Projects may include designing model solar cars, wind turbines, and/or other alternative energy devices. Students will also focus on ways to make the RPCS campus a learning tool for the entire community.

TECHNOLOGY

Gilman seniors may elect to take various computer courses. Many classes in the Upper School curriculum incorporate computer technology as an integral part of the course.

Departmental approval (Mr. Campbell) is required for enrollment in an Advanced Placement course.

11th and 12th Grade Course Electives -- Year

The Bryn Mawr AP Computer Science course is a traditional course; the course at RPCS is an on-line course with a scheduled meeting time.

A.P. COMPUTER SCIENCE

(BMS)

AP Computer Science A (Java) -- This year-long course in computer science introduces students to computers and computer programming methodology, fundamental data structures, decision structures and compound statements. Students develop skills to design and implement computer-based solutions to complex problems and abstract dilemmas. A programming background is helpful but not necessary. Students must have consent from the Computer Science department. Students take the AP Computer Science exam in May. Macintosh computers are used.

A.P. COMPUTER SCIENCE

(RPCS)

While students meet at RPCS, this is an on-line course. AP Computer Science A is a problem-solving and programming-focused course using Java as the specific coding language. This year long course in computer science introduces students to computer programming methodology, fundamental data structures, program flow, and basic object-oriented data organization and management. Students develop problem-solving skills through application design, debugging, and altering code from existing applications. No prior computer programming background is required. Students take the AP Computer Science exam in May.

AP COMPUTER SCIENCE PRINCIPLES

(RPCS)

Computer Science Principles is a new College Board Advanced Placement course that is designed to introduce students to the central ideas and practices of computational thinking, and show how computing changes the world. Students will have the opportunity to use programming, computational thinking, and data analytics to create digital artifacts and documents representing design and analysis in areas including the structure of the Internet and how it works; algorithms; and the impact that these have on science, business, and society. Students are taught how to use computational tools and techniques including abstraction, modeling, and simulation to collaborate in solving problems that connect computation to their lives. The course is rigorous and rich in computational content, includes critical thinking skills, and engages students in the creative aspects of the field. This course emphasizes themes that help students build a solid understanding and facility with computing and computational thinking — knowledge that is important, if not integral, to being part of a well-educated and informed citizenry. Students take the AP Computer Science Principles exam in May. This course is suitable for students who have completed Algebra.

12th Grade Course Electives – First Semester

GRAPHIC DESIGN

Semester I

(BMS)

This semester course teaches students the basics of graphic design, including visual cohesiveness, layout, and color usage. Students will use these design concepts to create projects using the software applications Adobe Photoshop, Illustrator and InDesign. Over the course of the semester, students will develop a portfolio of pieces ranging from a book cover to a logo design to a magazine. This course will also cover basic advertising principles and teach students how to analyze print design. No previous art or computer knowledge is required.

PROGRAMMING iPHONE APPLICATIONS (Honors)

Semester I

(BMS)

This semester course will give students a foundation for programming apps on iOS devices: iPhone, iPod Touch, and the iPad. While this accelerated, honors course, assumes no background in computer programming, the course will move quickly to cover a wide range of areas relating to app development. Through the use of Xcode, Photoshop and other Mac software tools, students will learn a wide range of programming techniques, the foundations of Object Oriented Programming, and design strategies for aesthetically pleasing apps. This course does NOT require the students to have an iPhone, iPod Touch, or an iPad.

12th Grade Course Electives – Second Semester

INDUSTRIAL DESIGN

Semester II

(BMS)

noun, a person who constructs new ideas, often at the intersection of coding, design and new technologies, and who learns through doing. This project-based course will challenge students to develop innovative solutions to problems using technology. The steps in the design thinking process: research, ideate, develop, prototype, refine, and build will be central to the workflow of the class. Students will explore topics including programming, 3D printing, and electronics in a self-directed manner and will produce a project of their own design to be presented at a Maker Faire. They will contribute to the Maker community by documenting their progress and collaborating with other makers when appropriate.

MATLAB

Semester II

(RPCS)

MATLAB is a technical programming language and development environment currently adopted by more than 5,000 universities around the world and widely used in industry. MATLAB allows students to perform numeric computations, develop algorithms, and create their own data visualizations, enhancing their proficiency in problem analysis, problem solving, and solution design. Students interested in majoring in science, math, economics, and engineering fields in college should consider learning MATLAB now to help ease the freshman year transition. In this course, we will create scripts, programs, models, and simulations to accelerate students' mastery of MATLAB. Potential projects include: image processing, computer graphics, animation, data analysis, economics applications, sound file manipulation, scientific computations, and robotics. No prior computer programming experience is required. Former AP Computer Science or AP Computer Science Principles students, however, are also welcome. Software Required: MATLAB and Simulink Student Version; instructions for how to purchase will be provided.

ROBOTICS

Semester II

(BMS)

The Robotics course is designed to explore the past, current and future use of automation technology in industry and everyday use. While using the design process, students will learn to program their robots, build prototypes, and use simulation software to test their

designs all while documenting their work in their design journal. The class culminates with an in-class robotics competition that is focused around a specific challenge.

VISUAL ARTS

The objective of the Visual Arts Department is to acquaint the student with the realm of visual expression and understanding through a variety of course offerings. In Drawing, Painting, and Studio Art, the concepts and principles of two-dimensional design are covered. Emphasis is on both technical and aesthetic understanding. The program seeks to stimulate the imagination and develop creativity. The graduation requirement in Art is the completion of History of Western Art (FV31) to be taken during the 10th grade.

The College Board offers students the opportunity to gain Advanced Placement in Studio Art in many colleges and art schools. Students submit slides of original work to the College Board in May of the senior year.

Enrollment in any studio arts courses after the introductory course requires departmental approval (Mr. Connolly). Departmental approval is also required for enrollment in an honors or advanced placement course.

All of the studio art courses at RPCS require a one hundred and sixty dollar fee for supplies.

Art History 10th Grade Course -- Required:

This course is required for all tenth students who are not continuing their study of visual arts or a second language.

HISTORY OF WESTERN ART

(Year, half credit)

A required course for all tenth graders, this course offers an introduction to the visual arts with an emphasis on visual analysis of compositional form. As part of the tenth grade Humanities sequence, this course seeks to foster an understanding of art in historical and cultural context. The course is presented through slide lectures, discussions, and PowerPoint presentations. There will be a required museum visit.

Art History 11th Grade Course -- Elective:

A.P. ART HISTORY

This year-long course covers art in a chronological survey from the Paleolithic era through Postmodernism and prepares students for the AP Art History Exam. In addition to the study of the development of the Western tradition in art and culture, an effort is made to expand beyond the Western tradition. The first quarter covers the Mesopotamian era through Roman Empire. The second quarter focuses on Byzantine, Islamic, Medieval, and Early Italian works. The third quarter starts with Northern Renaissance, includes Italian Renaissance, and concludes with Baroque. The fourth quarter studies the Enlightenment, Modernism and concludes with Postmodernism and contemporary art. While studying this material, students do independent research on art production outside the Western tradition which they share with the class. Students develop critical thinking skills as they assemble interdisciplinary knowledge about art objects and move beyond first impressions to carefully constructed evaluations. A total of 8 field trips to local museums (the Walters Art Museum and the Baltimore Museum of Art) give students the opportunity to engage in the study of actual works of art. Goals for this course are for students to value the intellectual challenge of learning about many traditions and cultures, to visit art museums with regularity, to achieve a high degree of visual literacy, to understand the role art has played in history, and to consider the role it plays in contemporary society.

Art History 12th Grade Course -- Elective:

A.P. ART HISTORY

(RPCS)

Art History provides a vocabulary for understanding visual culture. Why do Americans use classical Greek and Roman architectural styles in many of their governmental buildings? How has image-based propaganda been used throughout history? How can works of art be used to tell stories of industrialization and technological innovation, religious beliefs and philosophies, political power and change, and cultural interactions? The revised AP Art History course explores human visual culture from prehistory to the present and from across the entire globe. Students will be asked to think about the nature and function of art as well as the processes of making art and how people have responded to art throughout history. In addition to short trips to museums and sites in Baltimore, there are two day trips planned during the year - one to Washington, D.C. and another to New York City.

Design and Wood-working -- Elective

DESIGN & WOOD-WORKING

(full year, half credit)

Period 5

This course is open to students of all four grade levels. It is possible for a student to take the course for two or more years for additional credit, as more is expected of him each subsequent year. Enrollment, however, is limited to 25 students each year. Students learn the basic skills of woodworking with hand tools and machines, and the elements and principles of design, through individual instruction, demonstrations, critiques, and use of the department's own reference library. Students must make up any scheduled classes that they miss because of athletic or other conflicts. They may work in the wood shop during their free periods (with our permission) in order to make up such classes. The format of the course is much like independent study in that there is much latitude in the range of projects students choose, limited only by the resources of the department, time, and the student's skill level. (Fee required)

Publication Courses -- Electives

GRAPHIC DESIGN

Semester I

(BMS)

Please see the description in the Technology section.

Studio Art: Ceramics Courses -- Elective

CERAMICS I

Semester I

(RPCS)

Developing Ideas and Creativity -- This course introduces the student to processes of working with clay. The emphasis is on mastering hand building and wheel throwing techniques, as well as surface finishing techniques. Students learn how to achieve specific visual and tactile effects through manipulation of clay and glaze. The focus is on composition and fine tuning of craft. The class balances a focus on sculptural and functional clay work. Students will learn real world applications of Ceramics, such as researching and mixing glazes and making work that can be used for eating, drinking, and baking. (\$80.00 fee required for course supplies.)

CERAMICS II

Semester II

(RPCS)

Developing Ideas and Creativity in Ceramics emphasizes strong concept, individual expression and creativity. Students begin the semester working in stoneware, earthenware, and porcelain. After the initial project, students choose to continue working in the clay of their choice. Students will complete projects that explore related pieces (sets of pieces shown together as a work), storytelling, stamp making, mold making and ways of manipulating clay and surface finishes to improve the structural and aesthetic quality of their artwork. Each student chooses a professional 3D artist or art movement to research, and each student designs original pieces that adapt some aspect of the researched work. Students learn to measure the specific gravity of glazes and the adhesive properties of repair of fired and unfired work. (Prerequisite: Ceramics I.) (\$80.00 fee required for course supplies.)

Studio Art: Digital Design Course -- Elective

DIGITAL 3-D DESIGN

From Virtual to Reality. This course is designed to introduce students to a variety of beginner 3-D modeling software so that students may become acquainted with the basics of digital modeling. As familiarity increases, students will delve into more nuanced programs. We will engage in projects not only from an artistic direction but also ideally from such disciplines as engineering, geology, environmental science, and architecture. Students will learn how to effectively use a 3-D printer to free their creations from the computer and bring them into reality. This will be a highly flexible program that allows for a myriad of skill sets. Much of the course work can be individually tailored to suit a particular student's abilities and passions.

Studio Art: Drawing/Painting Courses -- Electives

DRAWING/PAINTING I

The first semester of this course will deal with creative as well as technical skill development in drawing. A variety of materials will be handled, such as pencil, pen and ink, conte crayon and wash drawing. Problems will include composition, perspective, and tonal and contour drawing. The class will also work from live models. In the spring, this course will focus on both the creative possibilities in painting and the development of facility in oil paint and watercolor. Issues covered will include composition, color, and spatial relationships found in different types of painting. The course will explore landscape, still-life, portraiture and abstraction..

DRAWING/PAINTING II

This course is designed to allow students to continue with drawing and painting on a more advanced level. In this course we will continue to explore materials, subjects and techniques but as the first semester progresses students will be encouraged to develop a more personalized approach to the problem. The class will also work from live models. From mid-semester students will work independently to develop a personal body of work of their choice. In the second semester, the primary in class focus will be on observational work. As the semester continues students will be free to begin to explore a more independent direction in painting.

ADVANCED STUDIO ART III

This course is designed for students interested in developing a strong portfolio of independent work. In-class work will focus predominantly on observational work with subjects ranging from still life and landscape to portraiture and direct from life figure painting. In addition issues such as abstraction, appropriation and installation will also be covered. In conjunction with this there will be ongoing discussions about a broad range of contemporary issues in art making which should be taken into account as students consider a personal direction. During the second semester of this year long course students will work with increasing independence as they develop work for a concentration of their choice. This work will be included in year-end Student Thesis Exhibitions in the Clock Gallery.

STUDIO ART III: PORTFOLIO DEVELOPMENT

(RPCS)

Students will maintain a cumulative portfolio which includes work from class, a sketchbook/journal and related art experiences. The portfolio is a vehicle through which students can demonstrate their ability to handle visual arts media with a sense of quality, show a breadth of formal, technical and expressive experiences, and concentrate on a particular interest or problem. Students will continue to maintain a sketchbook/journal which incorporates personal expression through visual, collected and written commentary to employ as a reference and to generate future ideas. (\$160.00 fee required for course supplies.)

ADVANCED STUDIO ART IV (Honors)

This course is designed for students interested in developing a strong portfolio of independent work. In-class work will focus predominantly on observational work with subjects ranging from still life and landscape to portraiture and direct from life figure painting. In addition issues such as abstraction, appropriation and installation will also be covered. In conjunction with this there will

be ongoing discussions about a broad range of contemporary issues in art making which should be taken into account as students consider a personal direction. During the second semester of this year long course students will work with increasing independence as they develop work for a concentration of their choice. This work will be included in year-end Student Thesis Exhibitions in the Clock Gallery.

STUDIO ART IV THE AP PORTFOLIO

(RPCS)

The Advanced Placement program in Studio Art is intended for highly motivated students who are seriously interested in the study of art. Students should be made aware that AP work involves significantly more commitment than the typical high school art course. Students can submit one of three Advanced Placement Studio Portfolios – Drawing, Two-Dimensional Design, or Three Dimensional Design. The AP Portfolio consists of three sections – Quality, Concentration and Breadth. The Quality section provides the student the opportunity to show their actual ability and “permits the student to select the works that best exhibit a synthesis of form, technique, and content.” The Concentration section asks the student “to demonstrate a depth of investigation and the process of discovery.” And the Breadth section asks the student “to demonstrate a serious grounding in visual principles and material technique.” For the Quality section, the student sends in five actual artworks. For both the Concentration and Breadth sections, students submit twelve digital images each. The three sections are scored separately by different evaluators but are weighed the same. The three scores are then combined and the average becomes the score of the portfolio. It is advisable for all candidates to take supportive courses in History of Art and Photography. The majority of the portfolio is submitted online with digital images, and all knowledge of artistic trends, movements, methods of interpretation, and representation would be most beneficial. (\$160.00 fee required for course supplies.)

Studio Art: Photography, Digital, and Film Electives:

PINHOLE TO DIGITAL

Introduction to the art of photography. Students will explore a variety of photographic technologies in this introductory art course. Students will start outdoors with cyanotypes (blueprint process) on paper and fabric and move into the darkroom to make photograms. Next students will make and use pinhole cameras, then progress to the use of plastic cameras and 35 mm cameras with black and white film. Students will learn silver printing and experiment with alternative darkroom processes, which incorporates use of the digital darkroom. Finally students will use digital cameras and learn computer manipulation of images with Adobe Photoshop. The emphasis in this course will be on creative exploration of each process, amplified with instruction in the practice of that particular technology and its role in the history of photography. No background in photography is necessary nor is it necessary to own a camera to enroll in this course. Enrollment priority is given to freshmen.

PHOTOGRAPHY

Photography: Personal Directions. This studio course begins with a technical review of the fundamentals of photographic practice. Emphasis is then placed on the aesthetics of photographic vision and individual expressiveness. The format includes class demonstrations, lab work, field assignments and critiques. A few assignments will be completed in the wet darkroom, but most of the work will explore the conceptual and practical principles of digital photography, focusing on camera operation, studio lighting and the use of Adobe Lightroom and Photoshop. Specific assignments will strengthen each student’s ability to deal effectively with new subject matter in a meaningful and personal way. The final quarter culminates in an independent project, formulated by the student. Tenth graders (with the permission of the department chair) can enroll in this course if they have completed another studio arts course.

PHOTOGRAPHY II

Semester I

(RPCS)

While Introduction to Photography courses place emphasis on mastering technique, this course emphasizes strong concept, individual expression and creativity. Students can choose to work in film or begin working with a digital camera. Students will complete projects that explore related images (sets of images shown together as a series), storytelling, and ways of manipulating images in Photoshop to improve quality and to create layered photomontages. Visual Journal (Sketchbook) outside of class. (Prerequisite: Pinhole to Digital.) (\$80.00 fee required for course supplies.) (Students are required to supply a 35 mm SLR camera and/or digital SLR camera.)

PHOTOGRAPHY III

Semester II

(RPCS)

This course gives students the opportunity to delve into alternative processes such as photograms, double exposures, toy camera photography, use of alternative films and print alteration. Projects build upon the foundation established in earlier photo classes with further emphasis on risk-taking and the development of an individual voice. Visual Journal (Sketchbook) outside of class (Prerequisite: Photo II.) (\$80.00 fee required for course supplies.) (Students are required to supply a 35 mm SLR camera and/or digital SLR camera.)

FILM PRODUCTION

(full year, half credit)

Period 5

This course will offer students an introduction to the world of movie making and related fields. The course will consist of a series of projects through which the students will learn the skills necessary to produce short films. This course, while designed for students interested in movie making, will also touch upon ethics in filmmaking, film criticism, and film history. No prior experience is necessary and submission of certain projects to the Gilman Film Festival will be required. Enrollment priority is given to freshmen.

Studio Art: Sculpture Electives:

SCULPTURE

This course will introduce students to sculpture; exposing them to an array of processes, tools, and materials commonly used in sculpture. Students will develop an understanding for the interaction of forms within a space. Using basic sculptural processes and readily available materials such as concrete, plaster, metal, and wood, students will investigate three-dimensional ideas and translate them into works of art. Students learn the use and care of hand and power tools while working in a variety of sculptural processes such as mold making, casting, carving, and woodworking. The students explore the exciting work of many different artists to understand how they go through the process of designing, planning, and creating functional, site-oriented installations, and environmental art. Enrollment priority is given to freshmen.

SCULPTURE II

In this year long course, students are going to expand upon processes and materials that they learned about in Sculpture 1 as well as learn an overview of new processes, tools, and materials. Using basic sculptural processes and readily available materials such as concrete, plaster, metal, and wood, students will investigate three-dimensional ideas and translate them into works of art. Students will use these materials and processes to respond to assigned spatial problems in a creative manner.

SCULPTURE III

Sculpture 3 is for highly motivated students who are seriously interested in the study of art. Students will create their own thesis of sculpture work and will be developing their own artistic style through various solutions to self-created visual problems.