Welcome!

Why you need to read the rest of this syllabus...
You should consider this syllabus as a contract between you (the student) and the teacher. It includes all of the policies and procedures you need to know to successfully take this course, as well as the behavior that is expected of all students. Students with documented IEPs or 504 plans will be given accommodations appropriate for their individual plans. Contact the school’s Special Education department for more information.

Click the links below to jump to the section of the related section of the syllabus. Click the “<Back to top>” links to return to this list.

- Contacting the Teacher
- A Little about the Course
- Course Activities
- Course Policies
- Getting Help with Class Work
- Communication with Teacher and Classmates
- Due Dates
- Late Policy
- Academic Integrity (Cheating and Plagiarism)
- Attendance
- Teacher Availability and Communications
- Submitting Assignments and File Types
- Expectations of Difficulty, Participation and Time Commitment
- Grading Policy
- Grade Reporting
Contacting the Teacher
It is your responsibility to contact the teacher with any questions you may have. Don’t wait until the last minute—when a question arises, ask it early. When you have questions about course content or assignments, post them in the Teacher’s Office area. If you have private questions for me—for example, regarding a grade you received on an assignment—either submit those to me by kmail or through your Raise your Hand in your course. Alternately, you can also visit me during Office Hours, or call my office phone—see the top of the syllabus for this information. If technical difficulties prevent you from contacting me online, please call my office phone (listed above). If my number is long distance for you, leave me a message and I will call you back as soon as possible so I can pay for the call.

A Little about the Course
You can fill in this information for each course
Course Number: Course Name
See course descriptions and Scope and Sequence above
Course length:
Materials:
Prerequisites:

Course Activities
Course activities may include:
- Reading online text and transcripts
- Viewing moving and static images and streaming video
- Listening to audio recordings and pronunciations
- Watching linear and interactive animations and simulations
- Completing hands-on and virtual activities
- Participating in threaded discussions with teachers and fellow students in a section, cohort, or group
- Teacher announcements
- Completing online self-check exercises
- Reading and completing teacher-created instructional materials

Graded assignments may include:
- Online or paper-based worksheets and practice sets
- Quizzes
- Exams (unit, semester and final)
- Threaded discussions
- Essays, research papers, and other writing assignments
- Presentation
All graded assignments are either automatically scored by the K12 Learning Management System, or they are teacher-scored.
Course Policies

**Attendance and Activity**
Students are expected to log into this course daily. While the length of time that students spend working on assignments may vary, the expectation is that you will spend approximately 60 to 75 minutes on coursework each day.

**Daily Student Responsibilities**
Every time you enter the course and before completing any class work:

- **Read any announcements** I posted since the last time you entered the course.
- **Review the Calendar and/or Weekly Announcement** to see what lessons and assignments you are to complete that day.
- **Check out the What’s New list** at the bottom of the Course Home screen to see what’s gone on in the course since you last logged in.
- **Look at the Course Checklist** at the bottom of the Course Home page to review where you left off in the course content since you last logged in.
- **Complete all lessons and assignments** (both graded and nongraded) as indicated on your course calendar before the end of the day.
- **Submit assignments to me through the Dropbox** tool, unless they are scored by the computer. Assignments sent by email will not be accepted unless you’ve made prior arrangements with me.
- **Post any course questions** you have in the the Raise Your Hand area found in each unit and return later for the answer.

Before you log out of the course:

- **Make sure you have completed all of the work** for the day, including the nongraded lesson work.
- **Go to the Course Checklist and check off the sections** that you completed fully that day.

Getting Help with Class Work
This is going to be a challenging course. When you encounter difficulty with course content:

- **First**: Visit the Raise Your Hand area in the unit you’re working in. Check to see whether another student has asked the same question and whether I’ve already answered it. If not, then post your question and check back later. I will answer questions posted here at least twice daily throughout the day.
- **Next**: Come to ClassConnect for LIVE instructions or Visit me in Office Hours, each held once a week (See my schedule at the top of the syllabus).
- **If it is urgent or private**: Send me k-mail or contact me using the phone number or online screen name at the top of this syllabus.

Communication with Teacher and Classmates
Although you won’t be able to send k-mail to other students, you will be communicating with other students through the community area outside of the course and through threaded discussions within the course. In addition, students
often form friendships while in the course together. When this happens, students often share email addresses or instant message names.

**Some things to keep in mind when communicating with other students:**

- Respect the privacy and wishes of your fellow students.
- Flaming, spamming, bullying or other unwanted contact including inappropriate message content or attachments will be considered a breach of this policy. Infractions may result in disciplinary action by the school administration.

### Due Dates

The course calendar and my weekly announcements will list which lessons and assignments you need to complete each day. You’ll also find assignment due dates in the Course Details area of your student landing page and in the Course Checklist at the bottom of the Course Home page. It is important that you stick to the course schedule indicated on the calendar and in the announcements as well as the due dates for each assignment. Staying on schedule allows you to learn along with your classmates. This is especially important as we all learn together through the threaded discussions in the course.

### Late Policy—PLEASE READ CAREFULLY

Graded Teacher assignments are subject to the Late Policy. They must be completed and submitted no later than midnight the second Sunday following the due date for that assignment to receive full credit for the work that has been submitted. Anything for that week that is not received by that Sunday will be considered missing and a grade of zero will be entered for those missing assignments.

Students can still submit work that has had zeros entered.

Assignments not submitted by the due date are subject to late penalties as set by the late policy. The late policy is as follows:

- Week 1 Late: 90% of points
- Week 2 Late: 80% of points
- Week 3 Late: 70% of points

Please note: Computer Graded Assignments are NOT subject to the late policy. Do not password protect computer graded assignments after the assignment date. Under extreme circumstances, due date extensions can be granted on assignments – not past the late date. It should never be assumed that these will automatically be granted. Due date extensions must be requested before the due date of the assignment and on a school day. Requests received on or past the due date, or on a non-school day will most likely not be granted.

### Academic Integrity (Cheating and Plagiarism)

Students who submit work as their own, when it is not wholly and completely their own, are guilty of cheating and/or plagiarism and will receive a grade of zero on the entire assignment.

Assisting other students in cheating or plagiarism is also considered academic dishonesty and students who do this will receive a grade of zero on their assignment submission as well.
The first time a student fails to cite the source of information in an essay or research paper, he/she will be advised of proper citation methods. Further infractions will result in the student receiving a grade of zero on the item or assignment.

Students who are found guilty of cheating or plagiarism more than once will be referred to the school administration for breach of the school’s Behavior Code.

I may use a technology that helps to prevent cheating for some tests. Before these tests, you will be prompted to install a small piece of software on your computer. You will be required to install this piece of software before taking the assessment. Once you access the test, you will be unable to copy, paste or open new browser windows or programs during the assessment. If you experience any difficulty, contact K12 Customer Care for assistance. Contact me immediately if Customer Care cannot resolve your issue.

Attendance
Regular and daily attendance is required:

- You must log into the course and complete the scheduled work every school day.
- Unless otherwise specified, course log in is required even when assignments occur offline as you are expected to review any updated announcements, What’s New items and threaded discussion responses daily.
- You should expect to spend 60 to 75 minutes each day reading, responding, and completing other activities both online and offline.
- If you know you will not be able to log into the course on any given day, please contact me immediately by k-mail. If you encounter technical difficulties, contact me by phone. If you do not contact me before missing an activity, you can expect to hear directly from me.
- Students who continually fail to enter the course and show progress will be referred to the school administration.

Teacher Availability and Communications
After the first two weeks of school, you’ll have a lot more freedom in your daily schedule. This goes for teachers as well! This means that, although we’re both working in the course every day, we may be working at very different times of the day. When you and I happen to be online and working at the same time, I might not be immediately available. Most of my day is spent responding to student questions in the Raise Your Hand area, grading and returning assignments, and answering k-mails and phone messages. Feel free to contact me when needed, but please understand that I might be in the middle of one of these tasks, or helping another student at the time. You may need to leave me a message if you call, or wait for a short time to receive answers online. Of course, I am always available during my office hours, which are listed at the top of this syllabus.

I will read and respond to questions in the Raise Your Hand areas of the course several times throughout the day. You can expect an answer to a question posted in this area in less than one school day. Email questions and phone messages will be returned no later than one school day.
If you would like to schedule time for a private conference, please request these at least three to five days before the day you are available. The more notice you provide me, the more likely I can be available at a time that is best for you and/or your parent/learning coach.

**Submitting Assignments and File Types**

**Names of files you submit** Files you submit to me through the Dropbox tool should have a filename that indicates which assignment it is, followed by your first initial and last name. You may wish to use “U” and “L” to indicate which unit and lesson it is, or simply shorten the actual title of the assignment. Some examples include “U4L3RSmith” (unit 4 lesson 3 for Robert Smith) or “PersuasEssyRSmith” for Robert Smith’s Persuasive Essay.

**Always use the Dropbox** I will only accept teacher-graded assignments submitted through the Dropbox tool. Assignments sent to me through k-mail or email will be returned to be submitted through the Dropbox. If for some reason you are unable to submit assignments through the Dropbox, or assignments you submit are not being returned to you, contact me immediately. We will make alternate arrangements for you to get the assignments to me for grading.

**File type and size** At all times, attempt to keep the size of files you submit less than 3 MB. Unless otherwise indicated in the assignment directions, the only file types you should submit to me are .doc, .txt, and .tif. Assignments in other formats will be returned for resubmission.

**Doc Sharing** There is an area in our course called Doc Sharing. I will occasionally upload documents to this area for you to download for use in class. Students can also upload files to this area. Please refrain from uploading files there unless you have asked my permission first. Students who upload files without permission will be referred to the administration for breaking the school’s Acceptable Use Policy.

**Expectations of Difficulty, Participation and Time Commitment**

Students often find that going to school online takes longer and is more difficult than going to school in a traditional setting. Be prepared for this course and online schooling in general to be a little more difficult than you might expect. If you are not spending at least 60 minutes on this course each day, you’re probably not doing enough to pass the class. If this is happening, make an appointment to meet with me or visit me in Office Hours so we can review what you are doing each day. If you need help in working out a personal schedule, staying motivated or creating an effective home learning environment, contact your advisor. This person is an expert at helping students with these concerns!

**Grading Policy**

In the Course Home on the left-side of the course is an item titled Grading Information. In it you will find a summary of the graded assignments and assessments for this course. You will notice that some types of assignments are worth more points, overall, than others. For example, it is very possible to take only computer-scored quizzes in this course and get an A on each one, but still fail the course. This would happen because computer-scored quizzes make up a small percentage of the total points in the course.

When an assignment is to be submitted to me as an electronic file, I will only accept these through the course Dropbox. If you have technical difficulties using the Dropbox, contact me immediately to make other arrangements.
I will grade and return all teacher-scored assignments within three school days and sooner whenever possible. When these assignments are returned, you are expected to open them and read the feedback I provide directly in the files. Use this feedback to improve your work on future assignments.

**Threaded Discussions**
Grades are based on quality and timeliness. Responses should be well-written (Use the spell check tool.) and clearly address the issue being discussed. Stay on topic.
Threaded discussions usually last about three days. You are expected to respond to the original question or prompt on the first day, then read and respond to others’ postings on the second day. On the third day, you should respond to others’ responses to your original post.

**Grade Reporting**
Your gradebook will always display points earned vs. point’s possible as well as percentage grades. I will also provide letter grades that correspond to the percentage grades.
Assignments will be graded and (in most cases) returned to you in three school days. Grades will appear in your online gradebook, and feedback to your work will most often be included directly inside the files that I return to you.

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<table>
<thead>
<tr>
<th>CATEGORY</th>
<th>Initial Response to Prompt</th>
<th>Reply to Peers – 1st Round</th>
<th>Additional Reply to Peers – 2nd Round</th>
<th>Content</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Responded to the instructor's topic on time.</td>
<td>Responded to two peer postings on time (within two days).</td>
<td>Responded to at least one more peer on time.</td>
<td>High-quality content that reflects good conceptual understanding and completion of assigned coursework.</td>
</tr>
<tr>
<td></td>
<td>Responded to the instructor's topic one day late.</td>
<td>Responded to two peer postings one day late (within three days).</td>
<td>Responded to one more peer one day late.</td>
<td>Coherent content that reflects basic understanding of most content introduced in the course.</td>
</tr>
<tr>
<td></td>
<td>Responded to the instructor's topic two days late.</td>
<td>Responded to one peer posting on time (within two days).</td>
<td>Responded to one more peer two days late.</td>
<td>Acceptable understanding of content with some minor misconceptions related to course content.</td>
</tr>
<tr>
<td></td>
<td>Responded to the instructor's topic more than two days late.</td>
<td>Responded to one peer posting one day late (within three days).</td>
<td>Responded to one more peer more than two days late.</td>
<td>Marginal understanding of content with obvious misconceptions related to course content.</td>
</tr>
<tr>
<td></td>
<td>Did not respond to the instructor's topic.</td>
<td>Did not respond to any peer postings.</td>
<td>Responded to none of the peers who have posted comments to you.</td>
<td>Content does not demonstrate understanding of course content.</td>
</tr>
<tr>
<td>Quality Post</td>
<td>Student’s comments add significantly to the discussion by suggesting other solutions, pointing out problems, or even respectfully disagreeing. Student also substantiates any comments made with reasoning or source citation.</td>
<td>Student’s comments add moderately to the discussion by suggesting solutions, pointing out problems, or even respectfully disagreeing. Student does not substantiate any comments made with reasoning or source citation.</td>
<td>Student’s comments add minimally to the discussion. Student does not substantiate any comments made with reasoning or source citation.</td>
<td>Student’s comments do not add to the discussion. Posting is simple: &quot;I agree&quot; or &quot;Yes&quot; or &quot;No.&quot;</td>
</tr>
<tr>
<td>Appropriate Length = 30–75 words of well-written text</td>
<td></td>
<td></td>
<td></td>
<td>Student did not participate at all in the threaded discussion.</td>
</tr>
</tbody>
</table>
Texas Course Content - HS
All Courses are approved by SAC and the Texas Virtual School Network. NCAA approved courses will be designated with an asterisk (*)

*English 1 103 Comprehensive
*English 1 104 Honors
*English 2 203 Comprehensive
*English 2 204 Honors
*English 3 303 Comprehensive
*English 3 304 Honors
*English 4 403 Comprehensive
*English 4 404 Honors
*AP English Language & Composition 500
*AP English Language & Composition 510
*Algebra I
  Geometry 202 Core
  *Geometry 203 Comprehensive
  *Geometry 204 Honors
  Algebra II 302 - Core
  *Algebra II 303 - Comprehensive
  *Algebra II 304 - Honors
  *PreCalculus-Trig 403
*Math Models
*AP Calculus 500
*AP Statistics 510
*Integrated Physical and Chemistry
*Biology 203 Comprehensive
*Biology 204 Honors
*Chemistry 302 Core
*Chemistry 303 Comprehensive
*Chemistry 304 Honors
*AP Chemistry 510
*Physics 403 Comprehensive
*Physics 404 Honors
*AP Physics 520

*Environmental Science 010
  Astronomy
  World Geography Studies
  World History 102 Core
  *World History 103 Comprehensive
  *US History 313 Comprehensive
  *US History 314 Honors
  *AP US History 500
  *Economics 413
  *AP Macroeconomics 520 (Spring only)
  *US Government 403
  *AP US Government 510 (Spring only)
  *Spanish I 100
  *Spanish II 200
  *Spanish III 300
  *AP Spanish 500
  *French I 110
  *French II 210
  *French III 310
  *AP French 510
  *Latin I 130
  *Latin II 230
  *German I 120
  *German II 220
  *Mandarin I
  *Mandarin II
  Psychology
  *AP Psychology 540 (Spring only)
  Sociology
  Computer Science 1 (Computer Literacy Sem 1) 010
  Computer Science 1 (Computer Science Sem 2) 036
AP Computer Science
Art Appreciation (Fine Art) 010
Money Matters 030
*Journalism 010
*Communication Applications (Speech) - 020

Music Appreciation
Health 010
Reading Application and Study Skills (Reaching your Academic Potential) 040
Physical Education
ENGLISH COURSES

English I - Literary Analysis and Composition I

PEIMS Course Title/Number: English I/ 03220100
Course Code: ENG-103V1TX-K 8
Course Requirements/Prerequisite Requirements: Intermediate English A and B, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive Literary Analysis and Composition (English I)
This course challenges students to improve their written and oral communication skills, while strengthening their ability to understand and analyze literature in a variety of genres. They read a broad array of short stories, poetry, drama, novels, autobiographies, essays, and famous speeches, sharpening the close reading and critical analysis of classic works of literature and helping them appreciate the texts and the contexts in which the works were written. Students broaden their composition skills by examining model essays in various genres by student and published writers. They hone their writing skills through in-depth planning, organizing, drafting, revising, proofreading, and feedback. They build on their grammar, usage, and mechanics skills with in-depth study of sentence analysis and structure, agreement, and punctuation, reinforced by online activities. Student vocabularies are enhanced through the study of Greek and Latin root words, improving students’ ability to decipher the meanings of new words.

Materials provided by K12 – Classics for Young Readers, Volume 8; Classics for Young Readers, Volume 8: An Audio Companion; BK English Language Handbook, Level 1; Vocabulary from Classical Roots, Book C; The Narrative of the Life of Frederick Douglass, An American Slave, by Frederick Douglass; Anne Frank: Diary of a Young Girl, by Anne Frank; Romeo and Juliet, by William Shakespeare

Materials required by the student – none

Course description: Honors Literary Analysis and Composition (English I)
This course challenges students to improve their written and oral communication skills, while strengthening their ability to understand and analyze literature in a variety of genres. They read a broad array of short stories, poetry, drama, novels, autobiographies, essays, and famous speeches, sharpening the close reading and critical analysis of classic works of literature and helping them appreciate the texts and the contexts in which the works were written. Students broaden their composition skills by examining model essays in various genres by student and published writers. They hone their writing skills through in-depth planning, organizing, drafting, revising, proofreading, and feedback. They build on their grammar, usage, and mechanics skills with in-depth study of sentence analysis and structure, agreement, and punctuation, reinforced by online activities. Student vocabularies are enhanced through the study of Greek and Latin root words, improving students’ ability to decipher the meanings of new words.

Also added are the Honors projects. In Semester 1 it is Unit 9: Honors Project 2: Descriptive Essay -Students read three literary models and then write their own descriptive essay, demonstrating their advanced composition skills. Students
respond as both a reader and as a writer to model descriptive essays: Hamlin Garland's "A Night Ride in a Prairie Schooner"; an excerpt from Walden by Henry David Thoreau; and Pilgrim at Tinker Creek by Annie Dillard. They look at character; events; problem/conflict; resolution of conflict; theme; language; tone; voice; and purpose. Then students choose a topic for their descriptive essay; determine purpose and audience; brainstorm and develop details; and determine a pattern of organization. They write a descriptive essay about a place, using a tone, style, and voice that communicate the meaning of that place. In Semester 2 it is Unit 10: Honors Project: Novel Choice - Students read an additional novel of their choice from an approved list. Choices include Animal Farm by George Orwell, Jane Eyre by Charlotte Bronte, Lord of the Flies by William Golding, A Separate Peace by John Knowles, A Tale of Two Cities by Charles Dickens, To Kill a Mockingbird by Harper Lee, and The Yearling by Marjorie Kinnan Rawlings.

Course Scope and Sequence

Semester 1

Unit 1: Autobiographically Speaking
Students read four different memoirs and explore the kind of language those authors use to make the experiences come alive for the reader.

- Semester 1 Introduction
- What is Autobiography?
- "A Cub Pilot"
- From "Barrio Boy"
- “No Gumption”
- From I Know Why the Caged Bird Sings

Unit 2: Memoir
Students get hands-on practice with the memoir form. They analyze Mark Twain's "A Cub Pilot" from the perspective of a writer. Then students go on to plan and write a memoir based on a personal experience.

- Looking at "A Cub Pilot" with a Writer's Eye
- Planning a Memoir
- Memoir Techniques and Planning
- Writing a Memoir
- Revising a Memoir
- Proofreading and Publishing a Memoir

Unit 3: Short Stories
Students identify elements of a short story and analyze how authors use each element to create powerful and profound effects on a reader with a limited amount of prose.

- "The Glass of Milk"
- "Gumption"
- "To Build a Fire"
- "The Secret Life of Walter Mitty"
• "The Piece of String"
• Reflect and Review
• "The Tell-Tale Heart"
• "The Lottery"
• "The Lady or the Tiger?"

Unit 4: Argument
Students read a model argument and analyze it. Then, they conceive, plan, draft, revise, proofread, and publish an argument of their own.

• What Is an Argument?
• Choosing a Topic and Gathering Information
• Planning and Organizing the Argument
• Recognizing Logical Fallacies and Emotional Appeals
• Writing an Argument
• Revising an Argument
• Proofreading and Publishing an Argument

Unit 5: To Everything There Is a Season
Students read several poems that deal with the seasons. They focus on the issues these pieces address, the feelings they convey, how the ideas relate to specific times of year, and imagery and symbolism that poets use.

• “Spring and Fall”
• "in Just-" and "July"
• “To Autumn”
• "It Sifts from Leaden Sieves" and "The Snow-Storm"

Unit 6: Novel Choice
Students read a novel of their choice from an approved list. Choices include Animal Farm by George Orwell, Jane Eyre by Charlotte Bronte, Lord of the Flies by William Golding, A Separate Peace by John Knowles, A Tale of Two Cities by Charles Dickens, To Kill a Mockingbird by Harper Lee, and The Yearling by Marjorie Kinnan Rawlings.

• Read Novel Choice

Unit 7: Literature Semester 1 Review and Test
Students take computer-scored and teacher-graded exams to demonstrate mastery of the objectives from this semester.

Unit 8: Honors Project 1: Antigone
Students read the ancient Greek play Antigone. They explore the conflict between Creon and Haimon, examine themes of loyalty and tyranny, analyze the importance of the play's setting in influencing the way characters think and behave,
and identify choices and possible consequences of those choices. They communicate these ideas through a final written project that shows original thought, critical analysis, and the ability to support their conclusions with examples from the text.

- Read *Antigone*

### Unit 9: Honors Project 2: Descriptive Essay
Students read three literary models and then write their own descriptive essay, demonstrating their advanced composition skills. Students respond as both a reader and as a writer to model descriptive essays: Hamlin Garland’s "A Night Ride in a Prairie Schooner"; an excerpt from *Walden* by Henry David Thoreau; and *Pilgrim at Tinker Creek* by Annie Dillard. They look at character; events; problem/conflict; resolution of conflict; theme; language; tone; voice; and purpose. Then students choose a topic for their descriptive essay; determine purpose and audience; brainstorm and develop details; and determine a pattern of organization. They write a descriptive essay about a place, using a tone, style, and voice that communicate the meaning of that place.

- Seeing with the Mind's Eye: Beauty
- Seeing with the Mind’s Eye: Nature
- Seeing with the Mind's Eye: Wonders
- Planning a Descriptive Essay
- Recognizing Descriptive Language
- Writing a Descriptive Essay
- Polishing a Descriptive Essay

### Semester 2

#### Unit 1: Two Great Speeches
Students read and listen to Abraham Lincoln’s “Gettysburg Address” and Dr. Martin Luther King Jr.’s “I Have a Dream.” Then they create a speech of their own, on a topic of importance to them. They plan, take notes, and write the speech, then practice and deliver it to an audience.

- Analyzing a Speech: A President Speaks
- Analyzing a Speech: A Civil Rights Leader Speaks
- Planning a Speech
- Writing a Speech
- Practicing and Revising a Speech
- Delivering a Speech

#### Unit 2: Student Choice Autobiography
Students have their choice of the following autobiographies: *Anne Frank: The Diary of a Young Girl* or *Narrative of the Life of Frederick Douglass*. They read the autobiography and check their comprehension by analyzing character, setting, theme, point of view, tone, mood, and motif.

#### Unit 3: Research Paper
In this unit, students learn about the process of writing a research paper. Students complete substantial research and prepare their research paper through prewriting, drafting, and revising phases.

- What Is a Research Paper?
- Finding Information
- Taking Notes
- Organizing the Information
- Conference Day
- Writing a Research Paper
- Creating a Works Cited Page
- Revising a Research Paper
- Proofreading and Publishing a Research Paper

Unit 4: Voices and Viewpoints
Students explore how each of the poets espouses a particular view that conveys the theme of a poem. They also examine the effects of sound qualities (including rhyme scheme and meter) in these poems.

- "The Rainy Day" and "Invictus"
- "We Real Cool" and "The Negro Speaks of Rivers"
- "Mending Wall"
- Shakespeare's Sonnets 18 and 29

Unit 5: Literary Essay About Theme
In this unit, they choose one poem they have read and will plan and write a short essay analyzing its theme.

- What Is a Literary Essay About Theme?
- Planning a Literary Essay About Theme
- Writing a Literary Essay About Theme
- Revising an Essay About Theme
- Proofreading and Publishing a Literary Essay

Unit 6: Romeo and Juliet
Students read William Shakespeare’s Romeo and Juliet. They explore the ways in which Shakespeare weaves a heartbreaking story around the events of the title characters’ star-crossed love. Students focus on Shakespeare’s language, the memorable characters he creates, and the themes that recur throughout the play.

- Read Romeo and Juliet

Unit 7: Poetry of Ideas
Students read poetry that explores some of life’s big ideas—greatness, war, honor, and courage.

- "Will There Really Be a Morning?" and "I Dwell in Possibility"
- "Ozymandias"
- "Do Not Go Gentle into That Good Night"
- "The Charge of the Light Brigade"
• "The Battle of Blenheim"

**Unit 8: Compare-and-Contrast Essay**
In this unit, students read and analyze a model compare-and-contrast essay and then plan, organize, and write an essay of their own.

- What Is a Compare-and-Contrast Essay?
- Planning a Compare-and-Contrast Essay
- Organizing a Compare-and-Contrast Essay
- Writing a Compare-and-Contrast Essay
- Polishing a Compare-and-Contrast Essay
- Revising and Publishing a Compare-and-Contrast Essay

**Unit 9: Literature Semester 2 Review and Test**
Students take computer-scored and teacher-graded exams to demonstrate mastery of the objectives from this semester.

<Back to Course Content>
English II - Literary Analysis and Composition II

PEIMS Course Title/Number: English II/ 03220200
Course Code: ENG-203V1TX-K
Course Requirements/Prerequisite Requirements: Literary Analysis and Composition I, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive Literary Analysis and Composition II
In this course, students build on existing literature and composition skills and move on to higher levels of sophistication. Students work on independent projects that enhance their skills and challenge them to consider complex ideas and apply the knowledge they have learned. Students hone their skills of literary analysis by reading short stories, poetry, drama, novels, and works of nonfiction, both classic and modern. Students analyze model essays, focusing on ideas and content, structure and organization, style, word choice, and tone. They plan, organize, and revise their essays in response to feedback. In addition to writing formal essays, résumés, and business letters, students write and deliver a persuasive speech. Students expand their knowledge of grammar, usage, and mechanics through sentence analysis and structure, syntax, agreement, and conventions. Students strengthen their vocabularies through thematic units focused on word roots, suffixes and prefixes, context clues, and other important vocabulary-building strategies.

Course length: Two Semesters

Materials provided by K12: Explorations: An Anthology of Literature, Volume B; Journeys in Literature: Classic and Modern, Volume B: An Audio Companion; Vocabulary for Achievement, Fourth Course; Macbeth by William Shakespeare

Materials provided by the student: none

Course description: Honors Literary Analysis and Composition II
In this course, students build on existing literature and composition skills and move on to higher levels of sophistication. Students work on independent projects that enhance their skills and challenge them to consider complex ideas and apply the knowledge they have learned. Students hone their skills of literary analysis by reading short stories, poetry, drama, novels, and works of nonfiction, both classic and modern. Students analyze model essays, focusing on ideas and content, structure and organization, style, word choice, and tone. They plan, organize, and revise their essays in response to feedback. In addition to writing formal essays, résumés, and business letters, students write and deliver a persuasive speech. Students expand their knowledge of grammar, usage, and mechanics through sentence analysis and structure, syntax, agreement, and conventions. Students strengthen their vocabularies through thematic units focused on word roots, suffixes and prefixes, context clues, and other important vocabulary-building strategies.

Also added to Honors is Semester 1 is Unit 14: Honors Project 2: Close Reading - When students analyze a work of literature, the written product they create is called a “close reading.” This project presents a model close reading that a student wrote to analyze Ezra Pound’s “The River-Merchant’s Wife: A Letter.” With the skills the students learn by studying the model, they write a close reading of a poem of their choice. Semester 2 the addition is Unit 12: Honors

**Prerequisites:** Success in ENG104: Honors Literary Analysis and Composition I, or equivalent, and teacher/school counselor recommendation.
Course Scope and Sequence

Semester 1

Unit 1: How a Story Unfolds
Students read four short stories by four of America’s best-known writers, developing both an understanding of and an appreciation for the methods and tools that authors employ when telling a story. They focus on literary devices such as foreshadowing, symbolism, irony, and imagery in these stories. They also study the ways in which authors use unreliable narrators, flashbacks, and other means to deliver stories in the most original and memorable ways possible.

- Semester 1 Introduction
- The Elements of a Story
- "The Story of an Hour"
- “After Twenty Years”
- "An Occurrence at Owl Creek Bridge"

Unit 2: Narrative Essay: I Believe
Students write a narrative that includes elements of reflection suited to a personal essay by delving into an idea they believe in, and the events that helped form the belief.

- Analyzing a Model Narrative Essay
- Planning a Narrative Essay
- Reviewing Narrative Techniques
- Writing a Narrative Essay
- Reviewing Essay Skills and Mentor Day
- Revising a Narrative Essay
- Proofreading and Publishing a Narrative Essay

Unit 3: Insights into Character
Students read poems and stories that help them to think about how authors create characters in their writing.

- Characters
- "Two Tramps in Mud Time"
- "Star Food"
- "Everything That Rises Must Converge"
- "The Bet"

Unit 4: Narrative Prompts
Students often encounter writing prompts under the high-stakes conditions of a standardized test. The writing skills called for are similar to those of writing any essay, but there is less time to prepare, revise, and proofread. Students learn how to respond to specific kinds of writing prompts, with attention given to the concept of a writing prompt in general before focusing on narrative prompts specifically.

- Introducing Narrative Prompts
- Using a Rubric
• Responding to a Narrative Prompt

Unit 5: Building Critical Reading Skills 1
Students learn to use reading skills to take standardized tests. They read a passage and then answer several multiple-choice questions.

Unit 6: Novel Choice
Students read a novel of their choice from an approved list. Choices include Sense and Sensibility by Jane Austen, The Scarlet Pimpernel by Baroness Orczy, Cry, the Beloved Country by Alan Paton, Night by Elie Wiesel, The Way to Rainy Mountain by N. Scott Momaday, and Frankenstein by Mary Shelley.

• Read Novel Choice

Unit 7: Parents and Children
Students explore literature that portrays the complex relationships between parents and children.

• Introduction
• "I Stand Here Ironing" and "Daystar"
• “My Father Sits in the Dark” and “My Father in the Navy”
• “The Egg”
• "Mother Tongue"
• “Hunger of Memory”

Unit 8: Persuasive Essay
Students study a persuasive essay written by a student, then choose a topic for their own persuasive essay and use the techniques they learn in this unit to create a well-planned, effective essay that appeals to the reader’s logic and emotions.

• Analyzing a Model Persuasive Essay
• Choosing a Topic and Gathering Information
• Gathering More Information
• Planning the Persuasive Essay
• Recognizing Effective Persuasive Techniques
• Writing the Persuasive Essay
• Revising the Persuasive Essay
• Proofreading and Publishing the Persuasive Essay

Unit 9: Building Critical Reading Skills 2
Students learn to use reading skills to take standardized tests. They read a passage and then answer several multiple-choice questions.

Unit 10: Persuasive Prompts
Students often encounter persuasive prompts in their academic career and will practice responding to a persuasive prompt.

- Introducing Persuasive Prompts
- Responding to a Persuasive Prompt

**Unit 11: Poetry Recitation 1**
Students recite one poem from this semester’s readings and are evaluated on their efforts. They deliver their speech to the class and the teacher through an online Elluminate session.

**Unit 12: Semester 1 Review and Assessment**
Students review and test the skills and knowledge acquired this semester. They are responsible for all readings from the semester.

**Unit 13: Honors Project 1: Love Poetry**
For this project, students explore several examples of love poetry from various eras, examining the techniques and styles of the authors, as well as the similarities and differences in their treatments of love as a poetic subject.

- "Love is not all"
- "She Walks in Beauty"
- Reading Sonnets
- Three Shakespearean Sonnets
- "The River Merchant’s Wife: A Letter"
- "Song of Solomon," Chapter 2

**Unit 14: Honors Project 2: Close Reading**
When students analyze a work of literature, the written product they create is called a “close reading.” This project presents a model close reading that a student wrote to analyze Ezra Pound’s “The River-Merchant’s Wife: A Letter.” With the skills the students learn by studying the model, they write a close reading of a poem of their choice.

- Analyzing a Model Close Reading
- Planning a Close Reading
- Gathering Evidence for a Close Reading
- Writing a Close Reading
- Revising a Close Reading
- Proofreading and Publishing a Close Reading

**Semester 2**

**Unit 1: Persuasive Speech**
Students take a piece of persuasive writing they have previously written and repurpose it into a speech. They then deliver their speech to the class and to the teacher through an online Elluminate session.

- Semester 2 Introduction
• Introduction to Persuasive Speech
• Repurposing a Persuasive Essay into a Speech
• Practicing a Persuasive Speech
• Delivering and Listening to Persuasive Speeches

Unit 2: Building Critical Reading Skills
Students learn to use reading skills to take standardized tests. They read a passage and then answer several multiple-choice questions.

Unit 3: Novel Choice
Students read a novel of their choice from an approved list. Choices include Sense and Sensibility by Jane Austen, The Scarlet Pimpernel by Baroness Orczy, Cry, the Beloved Country by Alan Paton, Night by Elie Wiesel, The Way to Rainy Mountain by N. Scott Momaday, and Frankenstein by Mary Shelley.

• Read Novel Choice

Unit 4: Research Paper
Students learn and practice research skills such as finding information, citing sources, creating a Works Cited page, and making a formal outline.

• Analyzing a Model Research Paper
• Focusing on a Topic
• Finding Information Sources
• Taking Notes
• Organizing and Outlining a Research Paper
• Citing Sources
• Writing a Research Paper
• Revising a Research Paper
• Proofreading and Publishing a Research Paper

Unit 5: Macbeth
Students read William Shakespeare’s renowned tragedy, Macbeth. Students begin by learning background information about the author and this work before exploring the important characters, events, language, and themes of Shakespeare’s so-called “Scottish play.”

• William Shakespeare and the Scottish Play
• Read Macbeth

Unit 6: Social Commentary
Students study four pieces of literature—two poems, one short story, and one letter—and analyze them as pieces of literature and as social commentaries.

• "Theme for English B"
• "Harrison Bergeron"
• “Letter from Birmingham Jail”
• "Ballad of Birmingham"

Unit 7: Narrative Prompts
Students have already gained experience in writing responses to prompts under timed conditions. In this unit, they write about a time when they helped others or others helped them.

Unit 8: Words About War
Students explore the genre of war poetry by examining the genre’s history and reading several poems written in the last two centuries about war. They analyze the language and themes of these works, understanding them individually and then comparing them to one another to better understand the various viewpoints that war poetry can encompass.

• Introductions to War Poetry and Recitations
• Civil War Poems
• “The Soldier” and “In Flanders Fields”
• “Dulce et Decorum Est”
• Lamentations

Unit 9: Poetry Recitation 2
Students recite one poem from this semester’s reading and will be evaluated on their efforts. They will then deliver their speech to the class and to the teacher through an online Blackboard Collaborate session.

Unit 10: Critical Reading Skills Practice 4
Students learn to use reading skills to take standardized tests. They read a passage and then answer several multiple-choice questions.

Unit 11: Semester 2 Review and Assessment
Students review and test the skills and knowledge acquired this semester. They are responsible for all readings from the semester.

Unit 12: Honors Project: Novel Choice
Students read an additional novel of their choice from an approved list. Choices include Sense and Sensibility by Jane Austen, The Scarlet Pimpernel by Baroness Orczy, Cry, the Beloved Country by Alan Paton, Night by Elie Wiesel, The Way to Rainy Mountain by N. Scott Momaday, and Frankenstein by Mary Shelley.

• Read Novel Choice

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English III - American Literature

PEIMS Course Title/Number: English III/ 03220200
Course Code: ENG-303V1TX-K

Course Requirements/Prerequisite Requirements: Literary Analysis and Composition II, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive English III – American Literature
In this course, students read and analyze works of American literature from Colonial to contemporary times, including poetry, short stories, novels, drama, and nonfiction. The literary works provide opportunities for critical writing, creative projects, and online discussions. Students develop vocabulary skills and refresh their knowledge of grammar, usage, and mechanics in preparation for standardized tests. Students enrolled in this challenging course will also complete independent projects that deepen their understanding of the themes and ideas presented in the curriculum. Students read short stories, poetry, drama, and novels, sharpening their reading comprehension skills and analyzing important themes in American literature. They continue to work on their oral and written expression skills, writing a variety of essays including memoirs, persuasive and research essays, and workplace documentation. They plan, organize, and revise their essays in response to feedback.

Course Length: Two semesters

Materials provided by K12 – Journeys in Literature: American Traditions, Volume C; The Great Gatsby, by F. Scott Fitzgerald; The Glass Menagerie by Tennessee Williams. Students will also read one selection of their choice from the following: The Old Man and the Sea, by Ernest Hemingway; The House on Mango Street, by Sandra Cisneros; A Lesson Before Dying, by Ernest Gaines; The Red Badge of Courage, by Stephen Crane

Materials required by the student – none

Course description: Honors English III – American Literature
In this course, students read and analyze works of American literature from Colonial to contemporary times, including poetry, short stories, novels, drama, and nonfiction. The literary works provide opportunities for critical writing, creative projects, and online discussions. Students develop vocabulary skills and refresh their knowledge of grammar, usage, and mechanics in preparation for standardized tests. Students enrolled in this challenging course will also complete independent projects that deepen their understanding of the themes and ideas presented in the curriculum. Students read short stories, poetry, drama, and novels, sharpening their reading comprehension skills and analyzing important themes in American literature. They continue to work on their oral and written expression skills, writing a variety of essays including memoirs, persuasive and research essays, and workplace documentation. They plan, organize, and revise their essays in response to feedback. Also added is the Unit 11: Honors Project 1 in Semester 1 - Students apply the ideas about American mythology that they learned about in the Creating an American Mythology unit. They read a poem and complete an assignment about the selection. Added in Semester 2 is Unit 14: Honors Project 1 Novel Choice - Students read the novel of their choice,
take notes and answer questions, and formulate a thesis statement about some element of the book. They then write an essay that supports this thesis statement with both textual evidence and works of literary criticism. They choose between *Billy Budd* by Herman Melville, *A Connecticut Yankee in King Arthur’s Court* by Mark Twain, and *The Catcher in the Rye* by J.D. Salinger. They analyze plot and characters, themes, symbolism, and major literary elements. They answer literal, inferential, evaluative, and synthesizing questions to demonstrate comprehension.

**Honors Materials:** *Journeys in Literature: American Traditions, Volume C; The Great Gatsby*, by F. Scott Fitzgerald; *The Glass Menagerie* by Tennessee Williams. Students will also read one selection of their choice from the following: *The Old Man and the Sea*, by Ernest Hemingway; *The House on Mango Street*, by Sandra Cisneros; *A Lesson Before Dying*, by Ernest Gaines; *The Red Badge of Courage*, by Stephen Crane; and two selections of their choice from the following: *Billy Budd*, by Herman Melville, *A Connecticut Yankee in King Arthur’s Court*, by Mark Twain; *Catcher in the Rye*, by J.D. Salinger; *Song of Solomon*, by Toni Morrison

**Prerequisites:** Success in Honors Literary Analysis and Composition II, or equivalent, and teacher/school counselor recommendation

**Course Scope and Sequence**

**Semester 1**

**Unit 1: Early American Writings**

Students explore how American literature has been shaped by the ever-changing social, political, and cultural landscape of the nation. They focus on the characteristics of various forms of literature; the ways in which the traditions, themes, and issues of historical eras influenced writers; and tone, rhyme scheme, figurative language, point of view, and mood.

- American Literature - Semester Introduction
- Early American Writings - Introduction
- Analyze Of Plymouth Plantation Excerpt
- Analyze “A Model of Christian Charity”
- Analyze the Poetry of Anne Bradstreet
- Analyze “Sinners in the Hands of an Angry God”

**Unit 2: Voices of an Emerging Nation**

Students read a variety of texts from the Revolutionary period. Students analyze and evaluate the logic and use of evidence in an author’s argument; analyze theme, style, and mood; and analyze the relationship between a literary work and its historical period and cultural influences.

- Introduction
- Writings of Benjamin Franklin
- Writings of Thomas Paine
- The Declaration of Independence
- Writings of Olaudah Equiano and Phyllis Wheatley
- Discuss: How Have Voices Changed?
- "The Star-Spangled Banner"

**Unit 3: Critical Skills Practice 1**
Students learn approaches and strategies for reading comprehension, vocabulary, writing, and revising abilities. Facility with these skills is important for standardized test taking.

- Introduction
- Critical Reading Skills - Passage-Based Questions
- Critical Reading Skills - Sentence Completion Questions
- Writing Skills - Responding to Prompts
- Writing Skills - Identifying Errors and Improving Writing

**Unit 4: Creating an American Mythology**

Students read several works that are part of America’s national mythology and explore the ways in which the works highlight American values and ideals, celebrate American heroes, and commemorate America’s defining events. They also examine the works from a literary perspective and complete a writing assignment on Washington Irving’s “Rip Van Winkle.”

- Creating an American Mythology Introduction
- Read and Analyze “Rip Van Winkle”
- “Old Ironsides”
- "The Village Blacksmith"
Unit 5: The American Renaissance
Students learn about the major literary figures and works from the period between 1830 and the Civil War. They analyze characteristics of poetry, including poetic form and structure; interpret figurative language; and explore how authors develop point of view, style, tone, and mood.

- Introduction to the American Renaissance
- Poetry of Ralph Waldo Emerson
- "Self-Reliance"
- Read and Analyze Walden
- "The Raven"
- Read and Analyze "The Birthmark"
- Moby-Dick
- Poetry of Walt Whitman
- Poetry of Emily Dickinson

Unit 6: Literature of Slavery and the Civil War
Students focus on several works related to slavery in America and the Civil War. They examine how the spirituals sung by African American slaves contained coded language, symbolic imagery, and secret meanings; explore works of nonfiction by Frederick Douglass and Abraham Lincoln; analyze the war poetry of Walt Whitman; and complete a unit project in which they examine a figure or an issue and present their findings in one of several formats.

- Introduction to the Literature of Slavery and the Civil War
- Analyze Three Spirituals
- Analyze Narrative of the Life of Frederick Douglass
- Read and Analyze "The Gettysburg Address"
- Poetry of Walt Whitman

Unit 7: Realism, Regionalism, and Naturalism
Students read several works of realism, regionalism, and naturalism. They explore works that highlight local customs, traditions, dialects, and experiences of Americans across the country, from prospectors in California to Native Americans in the Great Plains and Pacific Northwest to farmers in Wisconsin. Finally, they analyze the poetry of Stephen Crane.

- Introduction to Realism, Regionalism, and Naturalism
- "The Return of a Private"
- Read and Analyze "The Notorious Jumping Frog of Calaveras County"
- Read and Analyze "I Will Fight No More Forever" and "The School Days of an Indian Girl"
- Poetry of Stephen Crane

Unit 8: The Great Gatsby
Students read and explore F. Scott Fitzgerald’s The Great Gatsby. They learn about the historical period during which the work was created and analyze the novel’s major characters, important symbols, and recurring themes. Then they write an essay that examines what Fitzgerald suggests about the American dream through his depiction of the life and experiences of Jay Gatsby.

- Read The Great Gatsby
Unit 9: Critical Skills Practice 2
In this unit, students review approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and revision.
- Reading Skills-Comprehension and Analysis
- Reading Skills-Vocabulary Analysis
- Writing Skills-Identifying Errors and Improving Writing
- Writing Skills-Responding to a Prompt

Unit 10: Semester Review and Test
Students review and test the skills and knowledge acquired this semester. They are responsible for the memoirs, short stories, and the novel they read this semester. In addition, they review the critical skills in reading and writing that they practiced before they take the semester test.

Unit 11: Honors Project 1
Students apply the ideas about American mythology that they learned about in the Creating an American Mythology unit. They read a poem and complete an assignment about the selection.
- Paul Revere: An American Mythology

Unit 12: Honors Project 2
Students apply the ideas about Romanticism that they learned about in Unit 5: The American Renaissance. They read a poem and complete an assignment about the selection.
- “The Cask of Amontillado”

Unit 13: Honors Project 3
Students delve deeper into their study of realism, regionalism, and naturalism. They read Sarah Orne Jewett’s “A White Heron” and Stephen Crane’s “The Open Boat.” They then explore these works as examples of either regionalist or naturalist fiction.
- “A White Heron” and “The Open Boat”

Semester 2
Unit 1: Poetry of the Modern Period
Students learn about the changes and innovations that poets around the turn of the twentieth century made to their art form. Over the course of this unit, they read, analyze, and explore examples of both types of modern poetry.
- Semester Introduction
- Introduction
- "Mr. Flood's Party"
- The Poetry of Carl Sandburg
- The Poetry of Robert Frost
Introduction to Imagism
• The Poetry of William Carlos Williams
• "anyone lived in a pretty how town"

Unit 2: Planning a Research Paper
The research paper is divided into three units. In this unit, students study a model research paper and plan a paper.
• Plan the Paper
• Choose a Topic
• Research and Take Notes
• Develop an Outline

Unit 3: Poetry of the Harlem Renaissance
Students learn about the Harlem Renaissance and study and analyze works of poetry by some of the Harlem Renaissance’s most prominent poets.
• Introduction
• Poetry of Paul Laurence Dunbar
• Poetry of Langston Hughes
• Other Influential Poets

Unit 4: Drafting a Research Paper
Students write the first draft of their research paper. They learn to write citations for sources; establish a coherent thesis; maintain a consistent tone; use the writing process; and use language that is appropriate, powerful, and clear.
• Begin Your Draft
• Use Citations Properly
• Continue to Draft
• Complete Your Draft

Unit 5: Critical Skills Practice 3
Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and revising abilities.
• Introduction
• Reading Skills - Comprehension and Analysis
• Reading Skills - Vocabulary Analysis
• Writing Skills - Identifying Errors and Improving Writing
• Writing Skills - Responding to a Prompt

Unit 6: Finalizing a Research Paper
Students revise and proofread the final draft of the research paper.
• Revise Your Paper
• Revise and Polish
Unit 7: *The Glass Menagerie*
Students read and analyze *The Glass Menagerie*.
- Read *The Glass Menagerie*

Unit 8: Modern Fiction and Nonfiction
Students learn how American literature diversified in the first half of the twentieth century to feature a broader range of writers and stories than was previously found in the canon. They read, analyze, and explore several works of fiction and nonfiction.
- Introduction
- "A Wagner Matinee"
- "In Another Country"
- "A Worn Path"
- From *Black Boy*
- "The Inside Search"
- Faulkner's Nobel Prize Acceptance Speech

Unit 9: Critical Skills Practice 4
Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and revising abilities.
- Introduction
- Reading Skills - Comprehension and Analysis
- Reading Skills - Vocabulary Analysis
- Writing Skills - Identifying Errors and Improving Writing
- Writing Skills - Responding to a Prompt

Unit 10: Novel Choice
Students read a novel of their choice from an approved list. Choices include *The Old Man and the Sea*, by Ernest Hemingway; *The House on Mango Street*, by Sandra Cisneros; *A Lesson Before Dying*, by Ernest Gaines; *The Red Badge of Courage*, by Stephen Crane.
- Read Novel Choice

Unit 11: Contemporary Voices
Students read, analyze, and explore several works of American literature from the second half of the twentieth century and examine how the events and themes of the readings comment on, add to, or reflect some of America’s core values. They complete a writing assignment related to their own cultural heritage and identity.
- Introduction
- Kennedy's Inaugural Address
- Contemporary Poets
- Richard Rodriguez
- Amy Tan
Unit 12: Practical Writing (Optional)
Students read a model personal statement and then write a personal statement of their own that can be used as a model for college application essays or job applications.
- Introduction to the Personal Statement
- Plan a Personal Statement
- Draft a Personal Statement
- Revise and Proofread

Unit 13: Semester Review and Test
Students review all the poetry, nonfiction, and drama they read this semester, including *The Glass Menagerie*. In addition, they review and are tested on the critical skills in reading and writing that they practiced this semester.

Unit 14: Honors Project 1 Novel Choice
Students read the novel of their choice, take notes and answer questions, and formulate a thesis statement about some element of the book. They then write an essay that supports this thesis statement with both textual evidence and works of literary criticism. They choose between *Billy Budd* by Herman Melville, *A Connecticut Yankee in King Arthur's Court* by Mark Twain, and *The Catcher in the Rye* by J.D. Salinger. They analyze plot and characters, themes, symbolism, and major literary elements. They answer literal, inferential, evaluative, and synthesizing questions to demonstrate comprehension.
- Project Overview
- Analyze the Text
- Identify Literary Criticism
- Use Literary Criticism
- Write a Literary Essay

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English IV – British and World Literature

PEIMS Course Title/Number: English IV/ 03220400
Course Code: ENG-403V1TX-K
Course Requirements/Prerequisite Requirements: American Literature, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive British and World Literature – English IV
Students read selections from British and world literature in a loosely organized chronological framework. They analyze the themes, styles, and structures of these texts and make thematic connections among diverse authors, periods, and settings. Students complete guided and independent writing assignments that refine their analytical skills. They have opportunities for creative expression in projects of their choosing. Students also practice test-taking skills for standardized assessments in critical reading and writing.

Course Length: Two semesters
Materials provided by K12 – Journeys in Literature British and World Classics; Hamlet by William Shakespeare
Materials required by the student – none

Course description: Honors British and World Literature – English IV
Students read selections from British and world literature in a loosely organized chronological framework. They analyze the themes, styles, and structures of these texts and make thematic connections among diverse authors, periods, and settings. Students work independently on many of their analyses and engage in creative collaboration with their peers. Students also practice test-taking skills for standardized assessments in critical reading and writing.

In addition, in Semester one there is the Unit 11: Honors Project 1: The Canterbury Tales - This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; analyze British and world literature from a variety of authors for style, audience appeal, cultural significance, and plot structure; and interpret a variety of texts by identifying and examining literary elements. Unit 12: Honors Project 2: Sonnets - This honors project requires students to master and exemplify their skills to analyze distinctive elements of sonnets and other types of poems; analyze the use of figurative language in poetry; interpret a variety of texts by identifying and examining literary elements; identify and explain the use of poetic elements to enhance meaning and effect; and write responses to literature. In Semester 2 there is Unit 10: Honors Project 1: The Poetry and Art of William Blake - This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; interpret a variety of texts by identifying and examining literary elements; analyze how words, images, graphics, and sounds work together in various forms to impact meaning; and write responses to literature. Unit 11: Honors Project 2: Rosencrantz and Guildenstern Are Dead - This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; analyze British and world literature from a variety of authors for style, audience appeal, cultural significance, and plot structure; identify and analyze the conventions and techniques used in Theatre of the Absurd; and interpret a variety of texts by identifying and examining literary elements. Unit 12: Honors Project 3: "The Lady in
the Looking Glass” - This honors project requires students to master and exemplify their skills to analyze a selection by Virginia Woolf for style, audience appeal, cultural significance, and plot structure; recognize and analyze author’s strategies; use language that is appropriate, powerful, and clear; write a stream of consciousness narrative; identify the author’s use of stylistic devices and discuss the effects created; identify, discuss, and interpret modernist themes; identify the theme in a story by Virginia Woolf; and analyze the use of figurative language in a story by Virginia Woolf.

**Prerequisites:** American Literature, or equivalent, and teacher/school counselor recommendation
Course Scope and Sequence

Semester 1

Unit 1: Heroic Battles

Students learn how the British and World Literature course is designed and what they can expect to learn and do over the next two semesters. They study stories of ancient heroes. Students learn reading and comprehension skills, poetic elements, and how to answer literal, inferential, evaluative, and synthesizing questions.

- Course Introduction
- Introduction to *Beowulf*
- Read "Beowulf and Grendel"
- Characters in *Beowulf*
- Review "Beowulf and Grendel"
- Introduction to the *Iliad*
- Read "Hektor and Achilleus"
- Characters in "Hektor and Achilleus"
- Review Heroic Epics

Unit 2: The Canterbury Tales

Students investigate how Chaucer uses his characters in *The Canterbury Tales* to provide a cross-section of life during the Middle Ages. They focus on the use of figurative language; style, cultural significance, and plot structure; distinctive elements of a framed narrative; and point of view.

- Introduction to *The Canterbury Tales*
- Read and Examine "The Prologue"
- Read and Explore "The Wife of Bath's Tale"
- Characters and Their Tales

Unit 3: Critical Skills Practice 1

Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and proofreading abilities.

- Introduction
- Reading Skills - Comprehension and Analysis
- Reading Skills - Vocabulary Analysis
- Writing Skills - Identifying Errors and Improving Writing
- Writing Skills - Responding to a Prompt

Unit 4: Love Sonnets

Students read several sonnets that focus on love, examining not only their central images and themes, but also the formats and the poetic elements that their writers employ. They analyze distinctive elements of sonnets, the use of figurative language, diction, syntax, and delivery style, mood and tone. They answer literal, inferential, evaluative, and
synthesizing questions to demonstrate comprehension and interpret the overall effect or impact of literary elements in poetry.

- Introduction
- Petrarchan Sonnets
- Shakespearean Sonnets
- From *Sonnets from the Portuguese*
- From *100 Love Sonnets*
Unit 5: Planning a Research Paper
Students learn about research papers and study a model research paper. They choose a topic for their own research paper, learn research skills, formulate a thesis, take notes, and develop an organized plan for their paper by making a formal outline. Students learn how to analyze expository texts; use the writing process; establish a clear, distinctive, and coherent thesis; organize ideas to ensure coherence, logical progression, and support; and evaluate the evidence used to support the author's perspective in expository texts.

- What Is a Research Paper?
- Focus on a Topic
- Plan a Research Paper
- Use Different Sources
- Use Literary Criticism
- Take Notes
- Organize Information
- Finish Your Plan

Unit 6: Critical Skills Practice 2
Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and proofreading abilities.

- Reading Skills - Comprehension and Analysis
- Reading Skills - Vocabulary Analysis
- Writing Skills - Identifying Errors and Improving Writing
- Writing Skills - Responding to a Prompt

Unit 7: Drafting a Research Paper
Students write the first draft of their research paper. They learn to write citations for sources. They learn how to establish a coherent thesis; maintain a consistent tone; use the writing process; and use language that is appropriate, powerful, and clear. They also create a plan for turning their research paper into a multimedia presentation.

- Write a Research Paper
- Learn About Multimedia Presentations
- Plan a Multimedia Presentation
- Create a Multimedia Presentation

Unit 8: Finalizing a Research Paper
Students revise and proofread the draft of their research paper and submit a final copy to the teacher for a grade. They also polish and rehearse their multimedia presentation and deliver it.

- Revise a Research Paper
- Proofreading Your Research Paper
- Polish and Rehearse Your Presentation
- Deliver a Multimedia Presentation
Unit 9: *Hamlet*

Students read William Shakespeare’s *Hamlet*, examining its complex characters, gripping plot, images, symbols, and themes. Students develop skills to identify and analyze the conventions and techniques used in different types of dramatic literature; interpret a variety of texts by identifying and examining literary elements; analyze British and world literature from a variety of authors for style, audience appeal, cultural significance, and plot structure; and use a full range of strategies to comprehend fiction and nonfiction.

- Introduction
- Read *Hamlet*

Unit 10: Semester Review and Test

Students review the concepts and skills they have learned as well as the selections they have read in preparation for the semester test.

Unit 11: Honors Project 1: *The Canterbury Tales*

This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; analyze British and world literature from a variety of authors for style, audience appeal, cultural significance, and plot structure; and interpret a variety of texts by identifying and examining literary elements.

Unit 12: Honors Project 2: Sonnets

This honors project requires students to master and exemplify their skills to analyze distinctive elements of sonnets and other types of poems; analyze the use of figurative language in poetry; interpret a variety of texts by identifying and examining literary elements; identify and explain the use of poetic elements to enhance meaning and effect; and write responses to literature.

Semester 2

Unit 1: Romantic Poetry

Students see concerns, values, and ideas that have shaped British and world literature. Students focus on developing skills in reading and comprehension that include: strategies to comprehend fiction and nonfiction; distinctive elements of Romantic poetry; the use of figurative language in Romantic poetry; the use of poetic elements to enhance meaning and effect; literary elements; how literary works and authors relate to the major themes and issues of their eras; distinctive elements of Romantic poetry; and major events and main ideas from reading.

- Course Introduction
- Introduction to Romanticism
- Read Two Poems by William Wordsworth
- Analyze "Lines Written in Early Spring" by William Wordsworth
- Read and Analyze "Kubla Khan"
- Read and Analyze Poems by Lord Byron
- Read and Analyze "Ode to the West Wind"
- Read and Analyze Two Poems by John Keats
Unit 2: Critical Skills Practice 3
Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and proofreading abilities.

- Introduction
- Reading Skills - Comprehension and Analysis
- Reading Skills - Vocabulary Analysis
- Writing Skills - Identifying Errors and Improving Writing
- Writing Skills - Responding to a Prompt

Unit 3: Novel Choice
Students read a novel of their choice from an approved list. Choices include *Hard Times* by Charles Dickens and *Pride and Prejudice* by Jane Austen.

- Read Novel Choice
Unit 4: The Modern Age
Students read a number of modernist works and examine the ways in which modernist poets and authors use evocative language, imagery, and allusions to convey their themes.

- Introduction to the Modern Age
- Read and Analyze Two Poems by W.B. Yeats
- Read and Analyze "The Love Song of J. Alfred Prufrock"
- Read and Analyze "Do Not Go Gentle into That Good Night"
- Read and Analyze "Eveline"
- Creative Project

Unit 5: Critical Skills Practice 4
Students learn approaches and strategies for effectively completing assignments that require reading comprehension, vocabulary, writing, and proofreading abilities.

- Reading Skills - Comprehension and Analysis
- Reading Skills - Vocabulary Analysis
- Writing Skills - Identifying Errors and Improving Writing
- Writing Skills - Responding to a Prompt

Unit 6: Novel Choice
Students read a novel of their choice from an approved list. Choices include 1984 by George Orwell, Siddhartha by Hermann Hesse, and Nectar in a Sieve by Kamala Markandaya.

- Read Novel Choice

Unit 7: Cultures in Conflict
Students read several works that address the conflicts and consequences that cultures and individuals face as the result of imperialism. They then explore the characters in each piece, the different problems that these figures face, and the themes of each work.

- Introduction to Imperialism
- Analyze "Shooting an Elephant"
- Read and Analyze "No Witchcraft for Sale"
- Read and Analyze "Marriage Is a Private Affair"
- Read and Analyze from Nectar in a Sieve

Unit 8: Practical Writing (optional)
In this optional unit, students acquire a skill they are likely to need in real life: writing a resume and a cover letter. They read samples and then write their own.

- Analyze a Resume and Cover Letter
- Gather Information
- Plan a Resume and Cover Letter
• Review Business Formatting
• Write a Resume and Cover Letter
• Mentor Feedback and Conferences
• Revise a Resume and Cover Letter
• Proofread and Publish a Resume and Cover Letter

Unit 9: Semester Review and Test
Students review the concepts and skills they have learned as well as the selections they have read in preparation for the semester test.

Unit 10: Honors Project 1: The Poetry and Art of William Blake
This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; interpret a variety of texts by identifying and examining literary elements; analyze how words, images, graphics, and sounds work together in various forms to impact meaning; and write responses to literature.

Unit 11: Honors Project 2: Rosencrantz and Guildenstern Are Dead
This honors project requires students to master and exemplify their skills to use a full range of strategies to comprehend fiction and nonfiction; analyze British and world literature from a variety of authors for style, audience appeal, cultural significance, and plot structure; identify and analyze the conventions and techniques used in Theatre of the Absurd; and interpret a variety of texts by identifying and examining literary elements.

Unit 12: Honors Project 3: "The Lady in the Looking Glass"
This honors project requires students to master and exemplify their skills to analyze a selection by Virginia Woolf for style, audience appeal, cultural significance, and plot structure; recognize and analyze author’s strategies; use language that is appropriate, powerful, and clear; write a stream of consciousness narrative; identify the author’s use of stylistic devices and discuss the effects created; identify, discuss, and interpret modernist themes; identify the theme in a story by Virginia Woolf; and analyze the use of figurative language in a story by Virginia Woolf.

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AP English Language and Composition – American Literature

PEIMS Course Title/Number: AP English/ A3220100
Course Code: ENG-500AV1TX-A

Course Requirements/Prerequisite Requirements:
At least a B-grade in most recent English course

Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description:
In AP English Language and Composition, students learn to understand and analyze complex styles of writing by reading works from a variety of authors. Not only do they explore the richness of language, including syntax, imitation, word choice, and tone in other writers, but they also learn to incorporate these skills into their own writing. Students learn the basics of research writing, including the use of documentation and citations. They write in a variety of different modes: expository, analytical, personal narrative, research, synthesis, and so on. They also learn about their own composition style and process, starting with exploration, planning, and writing, and continuing through editing, peer review, rewriting, polishing, and applying what they learn to a breadth of academic, personal, and professional contexts. Students read and analyze a variety of different "texts" in this course, including advertising, editorials, images, charts, graphs, maps, cartoons, and material from web sites. The equivalent of an introductory college-level survey class, this course prepares students for the AP Exam and for further study in communications, creative writing, journalism, literature, and composition. The content aligns to the scope and sequence specified by the College Board and to widely used textbooks.

Course Length: Two semesters

Materials provided by K12 –
The majority of the required instructional material for this course is available to students online. These materials were created and owned by our company. In addition, either the student or the school must purchase the following:

Materials required by the student

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AP English Language and Composition – British and World Literature

PEIMS Course Title/Number: AP English/ A3220200
Course Code: ENG-510AV1TX-A
Course Requirements/Prerequisite Requirements:
At least a B-grade in most recent English course
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description:
AP English Literature and Composition immerses students in novels, plays, poems, and short stories from various periods. Students read and write daily, using a variety of multimedia and interactive activities, interpretive writing assignments, and class discussions to assess and improve their skills and knowledge. The course places special emphasis on reading comprehension, structural and critical analysis of written works, literary vocabulary, and recognizing and understanding literary devices. The key foci of this course are comprehension, interpretation, and analysis. More specifically, the course focuses on close and thematic reading skills. The writing students undertake is overwhelmingly of an analytical nature; students analyze meaning and how meaning is created. The equivalent of an introductory college-level survey class, this course prepares students for the AP Exam and for further study in creative writing, communications, journalism, literature, and composition. The content aligns to the scope and sequence specified by the College Board and to widely used textbooks.

Course Length: Two semesters

Materials provided by K12 –
The majority of the required instructional material for this course is available to students online. These materials were created and are owned by our company. In addition, either the student or the school must purchase the following:

Materials required by the student
MATH COURSES

Algebra I
PEIMS Course Title/Number: Algebra I/03100500
Course Code: AV-ALG1-HS-TX08
Course Requirements/Prerequisite Requirements: Successful completion of Pre-Algebra
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: The purpose of this course is to allow the student to gain mastery in working with and evaluating mathematical expressions, equations, graphs, and other topics in a yearlong algebra course. Topics include real numbers, simplifying real number expressions with and without variables, solving linear equations and inequalities, solving quadratic equations, graphing linear and quadratic equations, polynomials, factoring, linear patterns, linear systems of equality and inequality, simple matrices, sequences, and radicals. Assessments within the course include multiple-choice, short-answer, or extended response questions. Also included in this course are self-check quizzes, audio tutorials, and interactive games.

Course Length: Two semesters

Materials provided by K12 – text and online course

Materials required by the student – recommended for students to have a TI-83 or TI-84 Calculator

- A calculator with exponent capabilities. If you don’t have one check the accessories in your computer. To do this click on Start, Programs, Accessories, Calculator, View, then click the Scientific calculator option.
- There are open responses and assignments which need to be submitted to your instructor. Check the course to see if there are instructions for submitting them. If not, contact your instructor.
- There are a few assignments where you need to complete a graph.
- If you find that certain parts are not working in your course, you may need to download one of these: Acrobat Reader, Flash Player, Real Player, or some other technical component. If your course has a helpdesk, contact them when this type of difficulty arrives. If not, contact your instructor. http://www.k12.com/faqs/Technical

Objectives
Students will

- Read, write, evaluate, and understand the properties of mathematical expressions including real numbers, radicals, and polynomials
- Add, subtract, multiply, and divide radical expressions, polynomials, and polynomial expressions
- Read, write, solve, and graph linear and quadratic equations and inequalities.
- Students will solve absolute value equations and inequalities
- Work effectively with ratios and direct and inverse variation
- Solve systems of linear equations and inequalities
- Work with arithmetic sequences and linear patterns
• Understand basic statistics including measures of central tendencies and box plots
• Understand different types of graphs, including histograms, line graphs, circle graphs, and stem-and-leaf plots

Semester 1
Unit 1: Variables and Expressions
Section 1: Evaluating Expressions
Section 2: Some Useful Properties
Section 3: Integers
Section 4: Exponents and Roots
Section 5: Logic and Graphs

Unit 2: Real Numbers
Section 1: Rational Numbers
Section 2: Addition and Subtraction of Rational Numbers
Section 3: Multiplication and Division of Rational Numbers
Section 4: Estimation and Problem Solving
Section 5: Closure and Properties of Equality

Unit 3: Equations
Section 1: Equations
Section 2: Multi-Step Equations
Section 3: Proportions and Percent
Section 4: Formulas and Absolute Value
Section 5: Problem Solving

Unit 4: Functions and Linear Equations
Section 1: The Coordinate Plane and Relations
Section 2: Graphing Linear Equations
Section 3: Patterns and Sequences
Section 4: Linear Equations
Section 5: Data

Unit 5: Inequalities
Section 1: Simple Inequalities
Section 2: Multi-Step Inequalities
Section 3: Absolute Value Inequalities
Section 4: Graphing Inequalities in Two Variables

Semester II
Unit 6: Solving Systems
Section 1: Systems of Equations
Section 2: Solving Systems
Section 3: Systems of Inequalities
Section 4: The Matrix
Section 5: Statistics

**Unit 7: Polynomials**
Section 1: Scientific Notation
Section 2: Add and Subtract Polynomials
Section 3: Multiply Polynomials
Section 4: Factors and GCF
Section 5: Factoring Trinomials
Section 6: Special Factors

**Unit 8: Quadratics and Radicals**
Section 1: Quadratic Functions
Section 2: Solving Quadratic Equations
Section 3: Radicals
Section 4: Operations on Radicals
Section 5: Radical Equations

**Unit 9: Rational Expressions**
Section 1: Inverse Variation
Section 2: Multiplying and Dividing Rational Expressions
Section 3: Adding and Subtracting Rational Expressions
Section 4: Solving Rational Equations
Section 5: Probability

**Unit 10: Exponentials**
Section 1: Exponential Functions
Section 2: Growth and Decay
Section 3: Geometric Sequences
Geometry
PEIMS Course Title/Number: Geometry/03040000
Course Code: MTH-202V1TX-K
Course Requirements/Prerequisite Requirements: Algebra I, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course description: Core Geometry
Students learn to recognize and work with geometric concepts in various contexts. They build on ideas of inductive and deductive reasoning, logic, concepts, and techniques of Euclidean plane and solid geometry and develop an understanding of mathematical structure, method, and applications of Euclidean plane and solid geometry. Students use visualizations, spatial reasoning, and geometric modeling to solve problems. Topics of study include points, lines, and angles; triangles; right triangles; quadrilaterals and other polygons; circles; coordinate geometry; three-dimensional solids; geometric constructions; symmetry; the use of transformations; and non-Euclidean geometries.

Course length: Two Semesters
Materials: Geometry: A Reference Guide; a drawing compass, protractor, and ruler
Materials required by the student – recommended for students to have a TI-83 or TI-84 Calculator
Prerequisites: Algebra I, or equivalent

Course description: Comprehensive Geometry
Students learn to recognize and work with geometric concepts in various contexts. They build on ideas of inductive and deductive reasoning, logic, concepts, and techniques of Euclidean plane and solid geometry and develop an understanding of mathematical structure, method, and applications of Euclidean plane and solid geometry. Students use visualizations, spatial reasoning, and geometric modeling to solve problems. Topics of study include points, lines, and angles; triangles; right triangles; quadrilaterals and other polygons; circles; coordinate geometry; three-dimensional solids; geometric constructions; symmetry; the use of transformations; and non-Euclidean geometries.

Compared to MTH202, this course has a more rigorous pace and more challenging assignments and assessments. MTH203 also covers additional topics such as biconditionals, rotations of points in a coordinate plane, creating and interpreting truth tables, parametric equations for lines in three dimensions, finding the equation of a circle from three points, input-output tables for logical gates, and several theorems including the Jordan Curve Theorem, Pappus' Theorem, and Desargues' Theorem.

Course length: Two Semesters
Materials: Geometry: A Reference Guide; a drawing compass, protractor, and ruler
Materials required by the student – recommended for students to have a TI-83 or TI-84 Calculator
Course Requirements/Prerequisite Requirements: Algebra I, or equivalent
Course Description: Honors Geometry
Students learn to recognize and work with geometric concepts in various contexts. They build on ideas of inductive and deductive reasoning, logic, concepts, and techniques of Euclidean plane and solid geometry and develop an understanding of mathematical structure, method, and applications of Euclidean plane and solid geometry. Students use visualizations, spatial reasoning, and geometric modeling to solve problems. Topics of study include points, lines, and angles; triangles; right triangles; quadrilaterals and other polygons; circles; coordinate geometry; three-dimensional solids; geometric constructions; symmetry; the use of transformations; and non-Euclidean geometries. This course includes all the topics in MTH203, but has more challenging assignments and includes more optional challenge activities. Each semester also includes an independent honors project.

Course length: Two Semesters
Materials: Geometry: A Reference Guide; a drawing compass, protractor, and ruler
Materials required by the student – recommended for students to have a graphing calculator like a TI-83 or TI-84 Calculator
Prerequisites: Honors Algebra I, or equivalent

Course Scope and Sequence

Semester 1:
Unit 1: An Introduction
Even the longest journey begins with a single step. Any journey into the world of geometry begins with the basics. Points, lines, segments, and angles are the foundation of geometric reasoning. This unit provides you with basic footing that will lead to an understanding of geometry.
- Semester Introduction
- Basic Geometric Terms and Concepts
- Measuring Length
- Measuring Angles
- Bisectors and Line Relationships
- Relationships between Triangles and Circles
- Transformations
- Using Algebra to Describe Geometry

Unit 2: Methods of Proof and Logic
Professionals use logical reasoning in a variety of ways. Just as lawyers use logical reasoning to formulate convincing arguments, mathematicians use logical reasoning to formulate and prove theorems. With definitions, assumptions, and previously proven theorems, mathematicians discover and prove new theorems. It’s like building a defense, one argument at a time. In this unit, you will learn how to build a defense from postulates, theorems, and sound reasoning.
- Reasoning, Arguments, and Proof
- Conditional Statements
Unit 3: Polygon Basics
Students can find polygons in many places: artwork, sporting events, architecture, and even in roads. In this unit, you will discover symmetry, work with special quadrilaterals, and work with parallel lines and slopes.

- Polygons and Symmetry
- Quadrilaterals and Their Properties
- Parallel Lines and Transversals
- Converses of Parallel Line Properties
- The Triangle Sum Theorem
- Angles in Polygons
- Midsegments
- Slope
Unit 4: Congruent Polygons and Special Quadrilaterals
If two algebraic expressions are equivalent, they represent the same value. What about geometric shapes? What does it mean for two figures to be equivalent? A pair of figures can be congruent the same way that a pair of algebraic expressions can be equivalent. You will learn, use, and prove theorems about congruent geometric figures.

- Congruent Polygons and Their Corresponding Parts
- Triangle Congruence: SSS, SAS, and ASA
- Isosceles Triangles and Corresponding Parts
- Triangle Congruence: AAS and HL
- Using Triangles to Understand Quadrilaterals
- Types of Quadrilaterals
- Constructions with Polygons
- The Triangle Inequality Theorem

Unit 5: Perimeter, Area, and Right Triangles
If you have a figure, you can take many measurements and calculations. You can measure or calculate the distance around the figure (the perimeter or circumference), as well as the figure’s height and area. Even if you have just a set of points, you can measure or calculate the distance between two points.

- Perimeter and Area
- Areas of Triangles and Quadrilaterals
- Circumference and Area of Circles
- The Pythagorean Theorem
- Areas of Special Triangles and Regular Polygons
- Using the Distance Formula
- Proofs and Coordinate Geometry

Unit 6: Semester Review and Test
Students prepare for and take the semester test.

Semester 2
Unit 1: Three-Dimensional Figures and Graphs
One-dimensional figures, such as line segments, have length. Two-dimensional figures, such as circles, have area. Objects we touch and feel in the real world are three-dimensional; they have volume.

- Semester Introduction
- Solid Shapes and Three-Dimensional Drawing
- Lines, Planes, and Polyhedra
- Prisms
- Coordinates in Three Dimensions
- Equations of Lines and Planes in Space

Unit 2: Surface Area and Volume
Every three-dimensional figure has surface area and volume. Some figures are more common and useful than others. Students probably see pyramids, prisms, cylinders, cones, and spheres every day. In this unit, students will learn how to calculate the surface area and volume of several common and useful three-dimensional figures.

- Surface Area and Volume
- Surface Area and Volume of Prisms
- Surface Area and Volume of Pyramids
- Surface Area and Volume of Cylinders
- Surface Area and Volume of Cones
- Surface Area and Volume of Spheres
- Three-Dimensional Symmetry

Unit 3: Similar Shapes
A map of a city has the same shape as the original city, but the map is much, much smaller. A mathematician would say that the map and the city are similar. They have the same shape but are different sizes.

- Dilations and Scale Factors
- Similar Polygons
- Triangle Similarity
- Side-Splitting Theorem
- Indirect Measurement and Additional Similarity Theorems
- Area and Volume Ratios

Unit 4: Circles
You probably know what a circle is and what the radius and diameter of a circle represent. However, a circle can have many more figures associated with it. Arcs, chords, secants, and tangents all provide a rich set of figures to draw, measure, and understand.

- Chords and Arcs
- Tangents to Circles
- Inscribed Angles and Arcs
- Angles Formed by Secants and Tangents
- Segments of Tangents, Secants, and Chords
- Circles in the Coordinate Plane

Unit 5: Trigonometry
Who uses trigonometry? Architects, engineers, surveyors, and many other professionals use trigonometric ratios such as sine, cosine, and tangent to compute distances and understand relationships in the real world.

- Tangents
- Sines and Cosines
- Special Right Triangles
- The Laws of Sines and Cosines
Unit 6: Beyond Euclidian Geometry
Some people break rules, but mathematicians are usually very good at playing by them. Creative problem-solvers, including mathematicians, create new rules, and then play by their new rules to solve many kinds of problems.

- The Golden Rectangle
- Taxicab Geometry
- Graph Theory
- Topology
- Spherical Geometry
- Fractal Geometry
- Projective Geometry
- Computer Logic

Unit 7: Semester Review and Test
Students prepare for and take the semester test.

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Algebra II

PEIMS Course Title/Number: Algebra II/ 03100600
Course Code: MTH-302V1TX-K

Course Requirements/Prerequisite Requirements: Successful completion of Algebra I and Geometry
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Core Algebra II
This course builds upon algebraic concepts covered in Algebra. Students extend their knowledge and understanding by solving open-ended problems and thinking critically. Topics include functions and their graphs, quadratic functions, inverse functions, advanced polynomial functions, and conic sections. Students are introduced to rational, radical, exponential, and logarithmic functions; sequences and series; data analysis; and matrices.

Course length: Two Semesters
Materials provided by K12: Algebra II: A Reference Guide and Problem Sets
Materials required by the student – recommended for students to have a graphing calculator like TI-83 or TI-84 Calculator

Course description: Comprehensive Algebra II
This course builds upon algebraic concepts covered in Algebra I and prepares students for advanced-level courses. Students extend their knowledge and understanding by solving open-ended problems and thinking critically. Topics include functions and their graphs, quadratic functions, inverse functions, advanced polynomial functions, and conic sections. Students are introduced to rational, radical, exponential, and logarithmic functions; sequences and series; data analysis; and matrices.
Compared to MTH302, this course has a more rigorous pace as well as more challenging assignments and assessments. This course requires the use of a graphing calculator equivalent to a TI-84 and includes tutorials and activities for using a handheld graphing calculator. MTH303 also covers additional topics such as linear programming, advanced factoring techniques, even and odd functions, graphing radical functions, quadratic inequalities, the binomial theorem, weighted averages, advanced

Course length: Two Semesters
Materials provided by K12: Algebra II: A Reference Guide and Problem Sets
Materials required by the student – recommended for students to have a graphing calculator like TI-83 or TI-84 Calculator
Prerequisites: Successful completion of Algebra I and Geometry
Course Description: Honors Algebra II
This course builds upon algebraic concepts covered in Algebra I and prepares students for advanced-level courses. Students extend their knowledge and understanding by solving open-ended problems and thinking critically. Topics include functions and their graphs, quadratic functions, inverse functions, advanced polynomial functions, and conic sections. Students are introduced to rational, radical, exponential, and logarithmic functions; sequences and series; data analysis; and matrices.
This course includes all the topics in MTH303, but has more challenging assignments and includes more optional challenge activities. Each semester also includes an independent honors project. This course requires the use of a graphing calculator equivalent to a TI-84 and includes tutorials and activities for using a handheld graphing calculator.

Course length: Two Semesters
Materials provided by K12: Algebra II: A Reference Guide and Problem Sets
Materials required by the student – recommended for students to have a graphing calculator like TI-83 or TI-84
Calculator
Prerequisites: Successful completion of Algebra I and Geometry

Course Scope and Sequence
Semester 1
Unit 1: Numbers, Expressions, and Equations
In this unit, students review the order of operations, set definitions, properties of the real number system, and other symbols and terminology. Various strategies for solving linear and absolute value equations are introduced, as are strategies for using formulas to solve real-world applications.
- Semester Introduction
- Foundations for Unit 1
- Sets of Numbers
- Number Lines and Absolute Value
- Number Properties
- Evaluating Expressions
- Solving Equations
- Solving Absolute Value Equations
- Applications: Formulas

Unit 2: Linear Equations and Systems
Representations and applications of linear relationships are the focus of this unit. Students interpret and create graphs, tables, and equations that represent linear relationships. In addition to simple linear equations, students also use systems of linear equations to solve real-world problems.
- Foundations for Unit 2
• Graphs of Lines
• Forms of Linear Equations
• Writing Equations of Lines
• Applications: Linear Equations
• Systems of Linear Equations
• Applications: Linear Systems

Unit 3: Functions
Students explore real-world situations regarding input and output, learn how to graph equations, and differentiate between functions and relations. Functions that are covered include some that are continuous, discontinuous, and discrete-valued. Step functions such as the least and greatest integer functions are introduced. Students learn to estimate and calculate domains and ranges of functions and to compose complicated functions from simpler ones. Students learn to express situations in function notation, calculate domains and ranges, and write sums, differences, products, quotients, and compositions of functions.
  • Foundations for Unit 3
  • Function Basics
  • Function Equations
  • Absolute Value Functions
  • Piecewise Functions
  • Step Functions
  • Function Operations
  • Function Inverses

Unit 4: Inequalities
In this unit, students solve and graph linear inequalities in one variable including conjunctions, disjunctions, and absolute value inequalities. Students also solve and graph inequalities in two variables and systems of inequalities in two variables.
  • Foundations for Unit 4
  • Inequalities in One Variable
  • Compound Inequalities
  • Absolute Value Inequalities
  • Inequalities in Two Variables
  • Systems of Linear Inequalities

Unit 5: Polynomials and Power Functions
Students learn to identify, evaluate, graph, and write polynomial functions. They review adding, subtracting, and multiplying polynomials as well as algebraic factoring patterns. Students use these patterns and the zero product property to solve polynomial equations. Additionally, students graph power functions and identify the end behavior of various members of the power function graph family.
  • Foundations for Unit 5
• Working with Polynomials
• Multiplying Polynomials
• Factoring Patterns
• Solving Polynomial Equations
• Power Functions

Unit 6: Rational Equations
Students learn to add, subtract, multiply, and divide rational expressions. Students learn to simplify compound fractions and solve rational equations. They also explore graphs and end behavior of rational functions including asymptotes and zeros.
  • Foundations for Unit 6
  • Dividing Monomials and Polynomials
  • Operations with Rational Expressions
  • Compound Fractions
  • Solving Rational Equations
  • Reciprocal Power Functions
  • Graphing Rational Functions

Unit 7: Radicals and Complex Numbers
Students learn to identify, add, subtract, multiply, and divide radicals, and to factor out perfect squares. Students solve real world problems involving applications of radical equations and convert between rational exponent and radical form of an expression. They learn to identify, graph, find the modulus of, add, subtract, multiply, and divide imaginary and complex numbers.
  • Foundations for Unit 7
  • Simplifying Radical Expressions
  • Fractional Exponents and Higher Roots
  • Solving Radical Equations
  • Imaginary Numbers
  • Complex Numbers

Unit 8: Quadratic Functions
Students learn how to graph quadratic functions and identify the equations of quadratic functions when given a graph. Students also use the zero product property, completing the square, and the quadratic formula to solve quadratic equations. They explore the Quadratic Formula and how factors of quadratic polynomials relate to x-intercepts of graphs of quadratic functions. Applications include projectile motion, geometry, and other areas.
  • Foundations for Unit 8
  • Graphing Quadratic Functions
  • Properties of Quadratic Functions
  • Solving Quadratic Equations
  • Applications: Quadratic Functions
Unit 9: Semester Review and Test
Students prepare for and take the semester test.

Semester 2

Unit 1: Solving and Graphing Polynomials
Students learn polynomial long division and the technique of synthetic division to divide polynomials. Additionally, they learn to apply the remainder theorem and use the factor and rational roots theorems to factor polynomials over the real and complex numbers. Uses of graphs and technology for factoring polynomials and solving polynomial equations are also covered.

- Semester Introduction
- Foundations for Unit 1
- Polynomial Long Division
- Synthetic Division
- The Polynomial Remainder Theorem
- Factors and Rational Roots
- Graphing Polynomials
- Factoring Polynomials Completely

Unit 2: Exponents and Logarithms
Students discover how exponential functions can be used to describe situations in the real world, such as exponential decay and growth. They define the logarithmic function in terms of its relationship with the exponential function and graph both exponential and logarithmic functions. Students learn to apply multiplication and division laws of exponents to exponential and logarithmic expressions and equations.

- Foundations for Unit 2
- Exponential Expressions and Equations
- Graphing Exponential Functions
- Applications: Growth and Decay
- Logarithms
- Using Logs to Solve Exponential Equations
- Solving Logarithmic Equations
- Graphing Logarithmic Functions
- Applications: Logarithms

Unit 3: Sequences and Series
Students explore arithmetic and geometric sequences, learning the concept of series as a sum of terms in a sequence and finding sums of finite arithmetic and geometric series. Students also use and interpret sigma notation to describe sums. Throughout the unit, students use sequences and series to solve several types of real-world problems and use spreadsheets to calculate terms of sequences and series.
• Foundations for Unit 3
• Sequences and Patterns
• Arithmetic Sequences
• Geometric Sequences
• Applications: Sequences
• Series and Sigma Notation
• Arithmetic Series
• Geometric Series
• Applications: Series
• Technology: Sequences and Series

Unit 4: Counting and Probability
Students review counting principles including identifying and calculating permutations and combinations. They calculate probabilities of simple, dependent, independent, and binomial events. They also use probability to make predictions and relate the binomial theorem to Pascal's triangle.

• Foundations for Unit 4
• Counting Principles
• Permutations and Factorials
• Combinations
• Basic Probability
• Probability with and Without Replacement
• Independent and Dependent Events
• Mutually Exclusive Events
• Binomial probability
• Making Predictions

Unit 5: Statistics
Students learn about the measures of center—mode, median, and mean—and the measures of spread—range, variance, and standard deviation. They learn how to produce and interpret bar, box-and-whisker, and scatter plots. Students explore common sampling techniques and learn how to use the properties of normal distributions to compare values.

• Foundations for Unit 5
• Measures of Center
• Variability
• Samples
• Graphs of Univariate Data
• Frequency Distributions
• The Normal Distribution
• Lines of Best Fit
Unit 6: Vectors and Matrices
In this unit, students learn how to add, subtract, multiply, and determinants of matrices. Students also use matrices to solve systems of equations, transform figures, and solve real-world problems.
  • Foundations for Unit 6
  • Matrices and Vectors
  • Operations with Matrices
  • Matrix Multiplication
  • Transforming Points and Figures
  • Determinants and Cramer’s Rule

Unit 7: Conic Sections
Students learn about conic sections that are points or lines and curved conic sections, including circles, ellipses, hyperbolas, and parabolas. They learn how to graph conic sections, how to use algebraic reasoning to create equations of conics when given descriptions or graphs, and how to solve real-world problems.
  • Foundations for Unit 7
  • Introduction to Conic Sections
  • Circles
  • Ellipses
  • Hyperbolas
  • Parabolas

Unit 8: Semester Review and Test
Students prepare for and take the semester test.

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Pre-Calculus - Trigonometry

PEIMS Course Title/Number: Pre-Calculus/Trigonometry/03101100
Course Code: MTH-403V1TX-A
Course Requirements/Prerequisite Requirements: Geometry and Algebra II (or equivalents)
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Pre-Calculus/Trigonometry (Comprehensive)
Pre-calculus weaves together previous study of algebra, geometry, and functions into a preparatory course for calculus. The course focuses on the mastery of critical skills and exposure to new skills necessary for success in subsequent math courses. Topics include linear, quadratic, exponential, logarithmic, radical, polynomial, and rational functions; systems of equations; and conic sections in the first semester. The second semester covers trigonometric ratios and functions; inverse trigonometric functions; applications of trigonometry, including vectors and laws of cosine and sine; polar functions and notation; and arithmetic of complex numbers. Cross-curricular connections are made throughout the course to calculus, art, history, and a variety of other fields related to mathematics.

Course Length: Two semesters
Materials provided by K12: Pre-Cal/Trig online course
Materials provided by the student: Texas Instruments T1-84 Plus graphing calculator
Prerequisites: Geometry and Algebra II (or equivalents)

Course Outline

Semester 1
What is a Function
Graphing Functions
Linear Functions
Linear Equations
Linear Systems
Arithmetic of functions
Forms of Quadratic Functions
Transformations
Solving Quadratic Equations
Applications of Quadratic functions
Polynomial Expressions
Dividing Polynomials
Solving Polynomial Equations
Graphing Polynomial Equations
Rational Functions
Exponents and Radicals
Exponential Functions
Geometric Sequences

Semester 2
Right Triangles
Connection to Science: Sextant
Angles and Radians
Trig ratios and Unit Circle
Graphs of Sine and Cosine
Graphs of other functions
Sinusoidal Transformations
Periodic Graph Transformations
Inverse Trig Functions
Solving Trig equations
Modeling Harmonic Motion
Identities and Proof
Trig identifies
Identifies Applications
Laws of Cosines
Laws of Sine
Vectors
Polar Coordinates
Logarithms
Graphing Logarithms
Applications of Logarithms
Conic Sections
Ellipses
Hyperbolas
Parabolas
Systems of Conic Sections

Graphs of Polar functions
Polar form of Complex #s
Complex number arithmetic
Complex number Exponents
Math Models
PEIMS Course Title/Number: Math Models/3102400
Course Code: Third party
Course Requirements/Prerequisite Requirements: Algebra I and Geometry
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Math Models
Mathematics Models with Applications A is a one semester course that focuses on types of graphs, probability, and statistics. Topics covered include construction and interpretation of graphs, measures of central tendency, measures of variation, and data collection. Basics of probability and probability models are also covered. Students will participate in hands-on projects that employ the skills they learn in real world settings. Math Models with Applications B, is an extension of Math Models A and continues the focus on basic math skills used in everyday life with the goal of developing intelligent consumers. The practical applications of math are studied using real world situations. Personal finances are emphasized through the study of personal earnings, personal taxes, credit, budgeting, and banking decisions. This course also examines the major purchases of homes and automobiles and the costs of insuring each. Investments and life insurance are also discussed as are applications of mathematical concepts in the areas of science, art, architecture and music.
Prerequisites: Algebra I and Geometry.
Course Length: Two semesters
Materials provided by TxVSN
Materials provided by the student - none

Syllabus
Mathematics Models with Applications A is a one-semester course that focuses on types of graphs, probability, and statistics. Topics covered include construction and interpretation of graphs, measures of central tendency, measures of variation, and data collection. Basics of probability and probability models are also covered. Students will participate in hands-on projects that employ the skills they learn in real world settings. Prerequisite: Algebra I

Teacher Blog
Check out your teacher’s blog, which can be found in the classroom in ROADS. Be sure to check it out often throughout your enrollment in this course and participate by reading and reflecting on the posts and leaving comments about your reflections. Following your teacher’s blog may help you to fully understand the concepts in the course and therefore help you perform better on your course assignments.

Required Chat
In addition to the assignments listed above, there are Required Chats in this course. Chat gives you an opportunity to get guidance, help, and encouragement from your teacher before you begin your Unit Tests.

Suggested Course Schedule
The suggested time frame shown below is based on learning sessions. A learning session is a 45-minute period of time. This course should take approximately 90 learning sessions to complete, but this schedule is just a suggestion. You may work on each unit at your own pace, completing as many learning sessions as you’d like in one sitting. However, keep in mind that you must finish the entire course within the time specified by your school district.
Assignment Weights
Assignments 45 pts 23%
Papers 50 pts 26%
Unit Tests 60 pts 31%
Midterm Exam 15.3 pts 8%
Final Exam 22.95 pts 12%

COURSE TOTALS 193.25 pts 100%

Course Objectives Semester 1
When you finish this course, you will be able to:

- construct and interpret line graphs, bar graphs, pie charts, box and whisker plots, stem-and-leaf plots, and pictographs
- calculate the mean, median, and mode of sets of data
- calculate the range, variance, and standard deviation of sets of data
- determine the validity of data
- determine whether data is qualitative or quantitative
- apply the process for collecting data using various methods
- use collected data to make conclusions
- use scatter plots and lines of best fit to make predictions
- recognize and control any potential biases in the collection of data
- determine the sample space of an event
- assess whether an event is dependent or independent
- construct tree diagrams to determine the probability of an event
- find the theoretical probability of an event
- calculate the empirical probability of an event
- recognize and use the relationship between mean and standard deviation in a normal distribution
- recognize when an event fits a binomial model
- recognize when an event is a geometric model

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Course Objectives for Semester 2
- define the relationships between dollars, time, hourly and salary wages, and commission and for both hourly and salary wages
- calculate before gross salary, tax and after tax deductions and net paycheck amount post-deductions
- calculate interest earnings, and checking account charges
- write and record checks and calculate checking balances and identify errors when necessary
- explain the importance of saving and compare different types of saving.
- calculate simple interest for loans and savings
- calculate simple and compound interest in various situations
- discuss the importance of goal planning and describe various methods of reaching those goals
- review linear equations and define slope
• discuss the advantages and disadvantages of loans compared with paying cash
• calculate total interest, loan monthly payments, amount of loan reduction and loan balance
• create an amortization schedule for a loan
• describe how credit cards work and how they are used
• calculate interest, interest charges, credit card balances, length of time to pay off of a credit card
• understand minimum monthly payments and penalties
• compare various types of credit rates and interests
• suggest ways to use a budget to correct credit card abuse
• identify the uses of mathematical patterns in art and architecture
• identify the uses of ratios, proportions, periodic motion, and transformations in music
• understand the considerations involved in purchasing homes and automobiles and the importance and cost of insuring them.
• understand why life insurance is needed and how the premium rates are determined
AP Calculus

PEIMS Course Title/Number: AP Calculus/ A3100101

Course Code: MTH-500V2-K

Course Requirements/Prerequisite Requirements:
Algebra II, Geometry, Pre-Calculus with Trigonometry

Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description:
In AP Calculus AB, students study functions, limits, derivatives and integrals. This document details the topics and subtopics that fall under each chapter/unit. Throughout the course students write and work with functions represented by written descriptions, mathematical rules, graphs and tabular data. Throughout the course, students are develop and exercise skills using the graphing calculator to solve problems, experiment, interpret their results, and support their conclusions. Students learn the meaning of the derivative and apply it to a variety of problems, while developing a deeper understanding of the meaning of the solutions to those problems. Students study integrals and learn the relationship between the derivative and the definite integral, using written work and graphing technology to explore and interpret this relationship. Students learn how calculus is used to model real-world phenomena by using functions, differential equations, integrals, and graphing technology to solve problems, support their solutions, and interpret their findings. Students communicate mathematics to their teacher through written work and to their peers through a discussion forum monitored by the teacher.

AP Calculus AB is the equivalent of an introductory college-level calculus course and prepares students for the AP Exam and further studies in science, engineering, and mathematics.

The content aligns to the scope and sequence specified by the College Board and to widely used textbooks.

Course Length: Two semesters

Materials provided by K12:
The majority of the required instructional material for this course is available to students online and is equivalent to a college-level textbook.
These materials were created and are owned by our company.

Materials provided by the student:
In addition, the student must purchase a TI-84 Plus, TI-83, TI-83 Plus calculator or other calculator approved by the College Board for the AP Calculus AB exam.
The following textbooks are optional purchases, used to supplement the material presented in the course:
The following book is included as an optional purchase for students to use in preparation for the AP Exam, but is not used as a required text for the course: Kahn, David S. 2004. Cracking the AP Calculus AB & BC Exams: 2004-2005. New York: Random House, Inc.
References to these texts are given at the end of this document.
**AP Statistics**

PEIMS Course Title/Number: **AP Statistics/ A3100200**

Course Code: **MTH-510V1-A**

**Course Requirements/Prerequisite Requirements:** Success in MTH304: Honors Algebra II (or equivalent) and teacher/school counselor recommendation

**Credits to be earned:** .5 credit per semester completion with grade of 70 or above

**Course Description:**
This course is the equivalent of an introductory college-level course. Statistics—the art of drawing conclusions from imperfect data and the science of real-world uncertainties—plays an important role in many fields. Students collect, analyze, graph, and interpret real-world data. They learn to design and analyze research studies by reviewing and evaluating examples from real research. Students prepare for the AP exam and for further study in science, sociology, medicine, engineering, political science, geography, and business.

Materials provided by K12:
The majority of the required instructional material for this course is available to students online and is equivalent to a college-level textbook. These materials were created and are owned by our company.

Materials provided by the student:
In addition, the student must purchase a TI-84 Plus, TI-83, TI-83 Plus calculator or other calculator approved by the College Board for the AP Statistics exam.

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SCIENCE COURSES

Integrated Physical and Chemistry - IPC
PEIMS Course Title/Number: IPC/ 03060201
Course Code: AV-PHYSCIa-HS-TX09
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: This course provides students with instruction in the nature of science, including scientific processes, the scientific method, and scientific inquiry. It covers safety in the lab and the field, principles for conducting experiments, and the need for scientific communication. The course then covers the atomic nature of matter, classification of the elements, the periodic table, acids, and bases. Next, students are introduced to energy. They learn what energy is and the various forms of energy. They explore energy transformations and specifically discuss the production of electricity. The course discusses energy in motion, with emphasis on defining work, power, velocity, acceleration, forces, and gravity. Students learn about Newton’s laws of motion and simple machines and have the opportunity to design their own machine using the basic principles of physics. Finally, the course discusses the composition and structure of the universe, the life cycles of stars, and space exploration.

Course Length: Two semesters
Materials provided by K12 – online course
Materials required by the student (household supplies):
  Semester 1
  Several sheets of plain paper--including various types/thickness
  Ruler or meter stick
  Stopwatch
  Glow stick
  Styrofoam cups
  Thermometer
  Ice cubes
  Hot and cold water
  Red Cabbage
  Coffee Filter or Paper Towel
  Container for water at least 250ml
  Three transparent cups
  Vinegar
  Baking Soda
  Goggles
  Tongs or fork
  Eyedropper or drinking straw
  Craft sticks or drinking straws
2 glass jars or beakers that holds at least 1/2 cup of water
2 sugar cubes
Measuring Cup
Lightweight plastic garbage can liners
Scissors
Sandwich Bags
240 inches of light string
3 uncooked eggs
one 3_inch by 7_inch rectangle and four 3_inch diameter circles cut from StyrofoamTM plates
Four Straight pins
Bendable straw
Balloon
Tape

**Semester 2**
Balloon
Wool sweater, scarf, or other piece of cloth or a piece of nylon stocking
Tissue Paper
Scissors
An empty 12-oz soda can
A full 12-oz soda can
A hard surfave, such as a tile kitchen floor
Three inch iron nail
Three feet of thin coated copper wire of one thickness
Three feet of thin coated copper wire of a different thickness
Fresh D battery
A pile of metal paper clips
Plastic Ruler
Thermometer
Epsom Salts
Medium sized Glass Jars or Beakers (need to be glass)
Quick rising Dry Yeast
Spoon
3% hydrogen peroxide

**Course Outline**

**Unit: Scientific Nature**
- Section A: Scientific Nature
- Section B: Scientific Process
- Section C: The Scientific Method
- Section D: Characteristics of Science
- Section E: Scientific Belief, Laws, and Theories
Unit: Scientific Inquiry
   Section A: Experimental Design
   Section B: Technological Design
   Section C: Organizing Data
   Section D: Evaluating Experiments and Communicating Results

Unit: Matter, Energy, and Change
   Section A: The Properties of Matter
   Section B: Changes in Matter
   Section C: What Is Energy?
   Section D: Energy Transformations and Conservation

Unit: Elements, Compounds, and Mixtures
   Section A: Atomic Theory
   Section B: Classification of Elements
   Section C: Compounds and Bonds
   Section D: Acids and Bases
   Section E: Solutions and Mixtures

Unit: Energy in Motion
   Section A: Motion
   Section B: Forces and the Force of Gravity
   Section C: Newton’s Laws of Motion
   Section D: Fluids

VI. Machines
   A. Simple Machines
   B. Work and Power
   C. The Human Body
   D. Complex Machines and Toys

VII. Electricity and Magnetism
   E. Electrical Safety
   F. Circuits
   G. Magnets
   H. Electromagnet: Motors/Generators

VIII. Waves
   I. Modeling waves
   J. Interactions
   K. Electromagnetic Spectrum
   L. Sound
   M. Light

IX. Chemical Reactions
N. Types of Reactions
O. Conservation of Matter and Energy
P. Nuclear Reactions

X. The Universe
  Q. Composition and Structure
  R. Structures Within
  S. Life Cycle of a Star
  T. Measuring Distance
  U. Space Exploration

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Biology
PEIMS Course Title/Number: Biology/ 03010200
Course Code: SCI-203V1TX-K
Course Requirements/Prerequisite Requirements: Middle school Life Science, or equivalent
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive Biology
This course, for students who have been introduced to biology topics in middle school, focuses on topics in cell chemistry and biology, genetics, evolution, the biology of living things, and ecology. Students use a combination of online instruction with animations, hands-on laboratory activities, reference book study, and collaborative activities with virtual classmates. This course prepares students to take AP® Biology or any beginning-level college biology course.

Course Length: Two semesters
Materials provided by K12: Biology: A Reference Guide; materials for laboratory experiments, including a compound microscope
Materials required of student: occasional household items

Course Description: Honors Biology
This course provides students with a challenging honors-level biology curriculum, focusing on the chemistry of living things: the cell, genetics, evolution, the structure and function of living things, and ecology. The program consists of advanced online lessons including extensive animations, an associated reference book, collaborative explorations, and hands-on laboratory experiments students can conduct at home. Honors activities include debates, research papers, extended collaborative laboratories, and virtual laboratories. K¹² provides all lab materials that cannot easily be found in the home.

There are additional projects in Semester 1: Unit 7: Honors Project 1: Research Paper - An independent research paper gives honors students the opportunity to explore biology topics in depth. Students select one of five topics to research and then develop a paper reporting on their topic. Unit 8: Honors Project 2: Extended Lab: Rate of Photosynthesis - This honors project extends the Rate of Photosynthesis Lab so that students test the effects of an additional variable—light—as well as heat. Students model communication and collaboration of the scientific community by collecting and sharing data in an online shared spreadsheet. They benefit from multiple sets of data and repeated trials rather than a single set of their own data. Students download and graph the data then discuss outliers, experimental error, and other factors related to experimental design. In Semester 2, Unit 7: Honors Project 1: Virtual Lab: Antibiotic Resistance - Antibiotic resistance describes how the effects of antibiotics on certain bacteria weaken or become ineffective over time. Students investigate antibiotic resistance by conducting an experiment in the K12 Virtual Science Lab. Unit 8: Honors Project 2: Issues in Science: Online Debate - Research and technology produce new information and capabilities, as well as great responsibility. The scientific community wrestles with the question, “Just
because we can, does that mean we should?" Examining all sides of an issue can sometimes bring together everyone’s opinions. Other times, people just have to agree to disagree. Different sides of an issue can be examined with a debate. This project is an opportunity for students to examine current scientific issues and express opposing viewpoints through structured debate. Students work in collaborative teams to develop and present a case online. Teamwork and sharing ideas are emphasized; students meet online or in person.
Course Scope and Sequence

Semester 1
Unit 1: The Science of Biology
Students explore biology as one of the sciences and confront the concepts of scientific methods. After exploring scientific processes as they apply to biology, students examine what “life” means as they investigate the characteristics that all living things share. Students then look at the importance of energy, what kinds of energy are significant when considering living things, and the relationship of structures of living things to their functions.

- Semester Introduction
- Biology and Scientific Methods
- Scientific Processes
- Laboratory: Using a Microscope
- The Characteristics of Life
- Energy and Life
- Structure and Function

Unit 2: The Chemistry of Life
Students explore the chemical basis for life by examining the most important groups of organic compounds: carbohydrates, proteins, lipids, and nucleic acids. Students then examine water and how it is important for living things. In each case, students focus on the relationship of the molecular structure of compounds to its function in living things.

- Chemistry Review
- Chemical Bonds
- Carbon and Life
- Organic Compounds and Trace Elements
- Ions in Living Things
- Useful Chemicals from Living Things
- Water
- Laboratory: Investigating Biological Compounds
- Simple Carbohydrates
- Complex Carbohydrates
- Lipids
- Amino Acids and Proteins
- Levels of Protein Structure
- Proteins as Enzymes
- Nucleic Acids
- ATP

Unit 3: Cell Biology
Students now are able to begin looking at the structure and function of living things. They begin with an exploration of the cell. They confront the structure of the cell, its membranes and organelles. In particular, they look at the processes by which cells gather and make energy available, focusing on the activities of the mitochondrion and the chloroplast. Students then proceed to look at cellular reproduction and study the processes of meiosis and mitosis.
• The Cell and Life
• Cell Structure
• Cell Organelles
• Two Types of Cells
• Cell Membrane Structure
• Movement Across Membranes
• Passive Transport
• Active Transport
• Laboratory: Determining the Rate of Diffusion
• Glycolysis and Fermentation
• The Krebs Cycle
• The Electron Transport System
• Light and Photosynthesis
• Photosynthesis and Glucose
• Chemical Energy and Life
• Respiration and Photosynthesis
• Laboratory: The Rate of Photosynthesis
• Reproduction and Development
• Mitosis
• Laboratory: Observing Mitosis
• Cell Differentiation
• Cell Specialization
• Sexual Reproduction
• Meiosis I
• Meiosis II

Unit 4: Mendelian Genetics
Students learn about the work of Gregor Mendel as a way of studying modern genetics. They perform genetic crosses and begin to see how traits are inherited. As they examine Mendelian genetics more closely, they see the relationship between inheritance and chromosomes and between genes and alleles. This unit prepares students to go deeper into genetics at the molecular level.

• The Work of Gregor Mendel
• Mendelian Inheritance
• Laboratory: Genetic Crosses
• Pedigrees
• Laboratory: Gene Mapping
• Chromosomes and Genes
• Genes and Alleles
• Genetic Variation

Unit 5: Molecular Genetics
The chemical basis for genetics is one of the cornerstones of modern biology. In this unit, students explore the relationship between DNA, RNA, and proteins—and what this has to do with genes and inheritance. After establishing a firm basis in molecular genetics, students are able to understand modern applications of genetics, including biotechnology and genetic engineering.

- DNA, RNA, and Proteins
- Structure of DNA
- Structures of RNA
- DNA Replication
- Transcription
- Laboratory: Modeling DNA
- Laboratory: Modeling DNA Replication
- DNA Makes RNA
- RNA Makes Protein
- The Genetic Code

**Unit 6: Semester Review and Test**

Students prepare for and take the semester test.
Semester 2

Unit 1: Gene Expression
In this unit, students explore the process by which the DNA–RNA relationship builds proteins. Then students learn how the process of proteins synthesis is controlled, a process called gene expression. Students then are able to understand modern applications of genetics, including biotechnology and genetic engineering.

- Semester Introduction
- Proteins Express DNA
- How Proteins Work
- Gene Expression
- Biotechnology
- Genetic Engineering

Unit 2: Evolution
Evolution is the central organizing principle of biology. Students learn about the concept of evolution and the underlying principles of natural selection. Once they have mastered the fundamental principles, they learn how modern evolution is a science that includes gene changes over time as the underlying mechanism for evolution.

- Evolution and Biology
- Evolution of Populations
- Multiplying Variation in Populations
- Types of Natural Selection
- History of Evolutionary Thought
- Evidence for Evolution
- Evolution and Earth History
- Laboratory: Process of Natural Selection
- Genetic Basis of Evolution
- The Hardy-Weinberg Equation
- Geographic Isolation
- Genetic Isolation

Unit 3: Survey of Living Things 1
Students learn about the structure and function of living things by examining three representative organisms: a flatworm, a fern, and a human. In doing so, students examine processes such as digestion and respiration—comparing and contrasting how living things obtain food, break down food, eliminate waste, and obtain and use oxygen.

- Classification and Taxonomy
- Modern Classification
- Laboratory: Dichotomous Key
- Viruses and Prokaryotes
- Protists and Fungi
- Animals
- Plants
- Three Representative Organisms
- Getting Energy
• Digestion
• Digestion in Humans
• Laboratory: Human Digestion Actions
• Waste Removal
• Waste Removal in Humans
• Obtaining Oxygen
• Oxygen and the Human Body
Unit 4: Survey of Living Things 2
Students continue their examination of living things, focusing on three representative organisms. They explore the nervous and muscular systems and see how these systems aid in responding to the organism’s environment. Students then examine various aspects of reproduction among living things and finish with a study of defense.
- How Organisms Monitor Their Environments
- Human Nervous System
- Feedback Mechanisms
- How Living Things Respond to Their Environments
- Muscular Systems
- How Muscles Contract
- Laboratory: Chicken Muscles
- Fern Reproduction
- Flatworm Reproduction
- Human Reproduction
- How Organisms Defend Themselves
- Human Immune Response
- Plant Defenses

Unit 5: Ecology and the Environment
As students have moved through this curriculum, they have learned about living things, their structure, and functions. In this unit, they confront organisms in relationship to their environments. Students study living things and the ecosystems in which they live, examining both the biotic and abiotic components of the world in which organisms exist.
- Individuals and Populations
- Communities
- Ecosystems
- Ecosystem Stability
- Biomes
- Biodiversity
- Energy Flow in Ecosystems
- Food Chains and Food Webs
- Succession
- Laboratory: Patterns of Succession
- Changes in Ecosystems
- Water and Nitrogen Cycles
- Carbon and Oxygen Cycles
- Laboratory: Fixation in Root Nodules
- Laboratory: The Effects of Acidity on Seed Germination
- Natural Resources
- Environmental Challenges
- Global Temperatures
- Pollution
Unit 6: Semester Review and Test
Students prepare for and take the semester test.

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Chemistry

PEIMS Course Title/Number: Chemistry/ 03040000
Course Code: SCI-302V1TX-K
Course Requirements/Prerequisite Requirements: Middle school Physical Science or IPC
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Core Chemistry
This course includes direct online instruction and related assessments, used with a problem-solving book. Students follow a program of online study days that alternate with review-and-assessment days. Instructions for hands-on labs are included, for which K¹² provides all lab materials that cannot easily be found in the home. The course surveys all key areas, including atomic structure, chemical bonding and reactions, solutions, stoichiometry, thermochemistry, organic chemistry, and nuclear chemistry.

Course Length: Two semesters
Materials provided by K12: Chemistry: Problems and Solutions; Chemistry: A Laboratory Guide; K12-provided laboratory materials
Materials required of student: common household materials for labs

Course Description: Comprehensive Chemistry
This course gives students a solid basis to move on to more advanced courses. The course surveys all key areas, including atomic structure, chemical bonding and reactions, solutions, stoichiometry, thermochemistry, organic chemistry, and nuclear chemistry. Instructions for hands-on labs are included, for which K¹² provides all lab materials that cannot easily be found in the home.

Course Description: Honors Chemistry
This course gives students a solid basis to move on to more advanced courses. The course surveys all key areas, including atomic structure, chemical bonding and reactions, solutions, stoichiometry, thermochemistry, organic chemistry, and nuclear chemistry. The course is expanded with more challenging model problems and assessments, and students complete additional community-based written research projects, treat aspects of chemistry that require individual research, reporting, and participate in online threaded discussions. Instructions for hands-on labs are included; K¹² provides all lab materials that cannot easily be found in the home.
Prerequisites: Success in previous science course and a teacher/counselor recommendation

Course Scope and Sequence

Semester 1
Unit 1: States of Matter
The study of gases, liquids, and solids not only tells us of their properties, but gives us a strong basis for understanding how matter is organized and how it behaves. Students closely examine how a volume of gas behaves under changing conditions of pressure and temperature. Students also investigate some of the properties of liquids and solids, and relate all three states of matter using phase diagrams.

- Semester Introduction
- The Behavior of Gases
- Gas Laws
- Review: Gases
- Laboratory: Gas Laws
- The Ideal Gas Law
- Absolute Zero
- Review: Ideal Gas Law
- Some Properties of Liquids
- Some Properties of Solids
- Review: Liquids and Solids

Unit 2: Solutions
Much of chemistry involves understanding solutions, in which a solute is placed in a solvent. The properties of the resulting solution can be understood by examining the interactions between the parts of a solution. Students learn the various ways to describe the concentration of solution and how to separate the component substances.

- Solutions
- The Dissolving Process
- Review: Solutions and Dissolving
- Laboratory: Factors Affecting Solution Formation
- Molarity and Mole Fraction
- Molality and Mass Percent
- Review: Molarity and Molality
- Colligative Properties
- Separating Solutions

Unit 3: Acids and Bases
Most students entering chemistry have some experience with acids and bases from everyday life. In this unit, after examining the properties of acids and bases, students analyze different definitions of acids and bases that have been developed since the time of Arrhenius. They learn how to solve problems dealing with the strength of acids and bases. Students gain practical experience working with acids and bases in a laboratory setting, including doing titrations.

- Properties of Acids and Bases
- Types of Acids and Bases
- Review: Acids and Bases
- Measuring Acids and Bases
- Buffers and Titration
- Review: Measuring pH
- Laboratory: Titration: Testing Water Quality
Unit 4: Chemical Thermodynamics
A vital part of the study of matter is learning about the energy associated with both chemical and physical changes. The study of energy in chemical systems is called chemical thermodynamics. It involves understanding that energy is conserved during chemical reactions and also when substances change from gas to liquids to solids—and back again. Overarching all this content is the law of conservation of energy.
- The Conservation of Energy
- Measuring the Flow of Heat
- Review: Thermal Energy
- Laboratory: Heat Transfer
- Specific Heat
- Writing Thermochemical Equations
- Review: More Aspects of Heat

Unit 5: Reaction Rate and Equilibrium
In the previous unit, students developed a basic understanding of the role of energy in chemistry and how it applied to certain processes. In this unit, students examine the role of energy in two important chemical phenomena: reaction rates and system equilibria. Based on an understanding of collision theory, students develop a “big idea” understanding of why chemical reactions do and do not occur.
- Reaction Rates and Energy of Activation
- Factors Affecting Reaction Rates
- Review: Reaction Rates
- Laboratory: Reaction-Rate Factors
- Equilibrium
- Le Chatelier’s Principle
- Review: Equilibrium

Unit 6: Electrochemistry
In this unit, students conduct a systematic study of the electrochemical processes. They learn the basics of the conversion of electrical energy to chemical energy and vice versa. They examine voltaic cells with a hands-on activity. Students also study batteries and electrolytic cells.
- Electrochemical Processes
- Voltaic Cell
- Review: Electrochemistry
- Laboratory: Electroplating
- Dry Cells
- Electrolytic Cells
- Review: Electrochemical Cells

Unit 7: Organic Chemistry
As students move through this curriculum, they learn about chemicals and their relationship to living things. In this unit, they conduct a systematic study of carbon-based compounds as they study organic chemistry and biochemistry. First,
they confront some types of organic compounds and learn about schemes for naming them. Students then turn their
attention to biochemistry, including an examination of carbohydrates, fats, and proteins.

- Hydrocarbons and Other Organic Chemicals
- Laboratory: Modeling Organic Compounds
- Polymers
- Review: Hydrocarbons and Polymers
- Carbohydrates and Fats
- Proteins and Nucleic Acids
- Review: Biochemistry

**Unit 8: Nuclear Chemistry**
The reactions that form the basis of the study of classical chemistry are those involving relationships between electrons
of reactants and products. Nuclear chemistry, however, is a branch of chemistry that deals with the atomic nucleus, its
particles, and forces. Students learn about radioactivity, transmutation of elements, and aspects of nuclear fission and
fusion. In addition, students become aware of the uses of nuclear chemistry in the modern world.

- Forces within the Nucleus
- Radioactivity and Half-Life
- Review: Nuclear Forces
- Laboratory: Calculating Half-Life
- Transmutation of Elements
- Nuclear Fission and Fusion
- Review: Nuclear Chemistry

**Unit 9: Semester Review and Test**
Students prepare for and take the semester test.
Semester 2

Unit 1: States of Matter
The study of gases, liquids, and solids not only tells us of their properties, but gives us a strong basis for understanding how matter is organized and how it behaves. Students closely examine how a volume of gas behaves under changing conditions of pressure and temperature. Students also investigate some of the properties of liquids and solids, and relate all three states of matter using phase diagrams.

- Semester Introduction
- The Behavior of Gases
- Gas Laws
- Review: Gases
- Laboratory: Gas Laws
- The Ideal Gas Law
- Absolute Zero
- Review: Ideal Gas Law
- Some Properties of Liquids
- Some Properties of Solids
- Review: Liquids and Solids

Unit 2: Solutions
Much of chemistry involves understanding solutions, in which a solute is placed in a solvent. The properties of the resulting solution can be understood by examining the interactions between the parts of a solution. Students learn the various ways to describe the concentration of solution and how to separate the component substances.

- Solutions
- The Dissolving Process
- Review: Solutions and Dissolving
- Laboratory: Factors Affecting Solution Formation
- Molarity and Mole Fraction
- Molality and Mass Percent
- Review: Molarity and Molality
- Colligative Properties
- Separating Solutions

Unit 3: Acids and Bases
Most students entering chemistry have some experience with acids and bases from everyday life. In this unit, after examining the properties of acids and bases, students analyze different definitions of acids and bases that have been developed since the time of Arrhenius. They learn how to solve problems dealing with the strength of acids and bases. Students gain practical experience working with acids and bases in a laboratory setting, including doing titrations.

- Properties of Acids and Bases
- Types of Acids and Bases
- Review: Acids and Bases
- Measuring Acids and Bases
- Buffers and Titration
Unit 4: Chemical Thermodynamics
A vital part of the study of matter is learning about the energy associated with both chemical and physical changes. The study of energy in chemical systems is called chemical thermodynamics. It involves understanding that energy is conserved during chemical reactions and also when substances change from gas to liquids to solids—and back again. Overarching all this content is the law of conservation of energy.

- The Conservation of Energy
- Measuring the Flow of Heat
- Review: Thermal Energy
- Laboratory: Heat Transfer
- Specific Heat
- Writing Thermochemical Equations
- Review: More Aspects of Heat

Unit 5: Reaction Rate and Equilibrium
In the previous unit, students developed a basic understanding of the role of energy in chemistry and how it applied to certain processes. In this unit, students examine the role of energy in two important chemical phenomena: reaction rates and system equilibria. Based on an understanding of collision theory, students develop a “big idea” understanding of why chemical reactions do and do not occur.

- Reaction Rates and Energy of Activation
- Factors Affecting Reaction Rates
- Review: Reaction Rates
- Laboratory: Reaction-Rate Factors
- Equilibrium
- Le Chatelier’s Principle
- Review: Equilibrium

Unit 6: Electrochemistry
In this unit, students conduct a systematic study of the electrochemical processes. They learn the basics of the conversion of electrical energy to chemical energy and vice versa. They examine voltaic cells with a hands-on activity. Students also study batteries and electrolytic cells.

- Electrochemical Processes
- Voltaic Cell
- Review: Electrochemistry
- Laboratory: Electroplating
- Dry Cells
- Electrolytic Cells
- Review: Electrochemical Cells

Unit 7: Organic Chemistry
As students move through this curriculum, they learn about chemicals and their relationship to living things. In this unit, they conduct a systematic study of carbon-based compounds as they study organic chemistry and biochemistry. First, they confront some types of organic compounds and learn about schemes for naming them. Students then turn their attention to biochemistry, including an examination of carbohydrates, fats, and proteins.

- Hydrocarbons and Other Organic Chemicals
- Laboratory: Modeling Organic Compounds
- Polymers
- Review: Hydrocarbons and Polymers
- Carbohydrates and Fats
- Proteins and Nucleic Acids
- Review: Biochemistry

Unit 8: Nuclear Chemistry
The reactions that form the basis of the study of classical chemistry are those involving relationships between electrons of reactants and products. Nuclear chemistry, however, is a branch of chemistry that deals with the atomic nucleus, its particles, and forces. Students learn about radioactivity, transmutation of elements, and aspects of nuclear fission and fusion. In addition, students become aware of the uses of nuclear chemistry in the modern world.

- Forces within the Nucleus
- Radioactivity and Half-Life
- Review: Nuclear Forces
- Laboratory: Calculating Half-Life
- Transmutation of Elements
- Nuclear Fission and Fusion
- Review: Nuclear Chemistry

Unit 9: Semester Review and Test
Students prepare for and take the semester test.
Physics

PEIMS Course Title/Number: Physics/ 03050000
Course Code: SCI-403V1TX-K
Course Requirements/Prerequisite Requirements: Algebra II and Pre-Calculus/Trigonometry
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Comprehensive Physics
This course provides a comprehensive survey of all key areas: physical systems, measurement, kinematics, dynamics, momentum, energy, thermodynamics, waves, electricity, and magnetism, and introduces students to modern physics topics such as quantum theory and the atomic nucleus. The course gives students a solid basis to move on to more advanced courses later in their academic careers. The program consists of online instruction and related assessments, plus an associated problem-solving book and instructions for conducting hands-on laboratory experiments at home. K¹² provides all lab materials that cannot be found easily in a typical home.
Course Length: Two semesters
Materials provided by K¹²: Physics: Problems and Solutions; materials for laboratory experiments
Materials required of student: common household materials for labs

Course Description: Honors Physics
This advanced course surveys all key areas: physical systems, measurement, kinematics, dynamics, momentum, energy, thermodynamics, waves, electricity, and magnetism, and introduces students to modern physics topics such as quantum theory and the atomic nucleus. Additional honors assignments include debates, research papers, extended collaborative laboratories, and virtual laboratories. The course gives a solid basis for moving on to more advanced college physics courses. The program consists of online instruction and related assessments, plus an associated problem-solving book and instructions for conducting hands-on laboratory experiments at home. K¹² provides all lab materials that cannot be found easily in a typical home.
Prerequisites: MTH303: Algebra II or MTH304: Honors Algebra II and MTH403: Pre-Calculus/Trigonometry, and teacher/school counselor recommendation

Course Scope and Sequence
Semester 1
Unit 1: Introduction to Physics
Students explore physics and its place among the sciences, and confront concepts of the role in society of physics now and in the past. Students examine the relationships of energy and the physical systems scientists and model systems use to study energy.
- Semester Introduction
- The History of Physics
- Physics and Society
• Physics and Science
• Physical Systems and Models

Unit 2: Physical Units and Measurement
To prepare for solving chemistry problems throughout the course, students learn about the metric system, significant figures, and conversion techniques. They learn the use of both base and derived metric units. Students have a laboratory in which they take measurements and understand them within the context of solving problems in physics.

• The Metric System: History and Use
• The Metric System: Base Units
• The Metric System: Derived Units
• Measurement and Scientific Notation
• Conversion Techniques
• Significant Figures
• Laboratory: Measurement and Significant Figures

Unit 3: Graphing and Problem Solving
To prepare for solving physics problems throughout the course, students learn about the collection and graphing data obtain from research. They create and interpret graphs and learn how to properly construct and label them. Students are also given an overview of the strategies needed to solve physics problems, including experience in keeping units straight and in the estimation of answers.

• Graphing Physical Data
• Graphs and Data Relationships
• Laboratory: Creating and Interpreting Graphs
• Problem Solving Strategies: Units
• Problem Solving Strategies: Estimation

Unit 4: Kinematics
Students begin their direct study of physics with an examination of kinematic motion. They compare and contrast speed and velocity, employing a frame of reference. They construct velocity-time graphs, then move to the concept of acceleration. Students perform two laboratories during this fundamental examination of moving bodies.

• Rotation and Translation
• Frame of Reference
• Speed and Velocity
• Position-Time and Velocity-Time Graphs
• Laboratory: Kinematics
• Acceleration
• Acceleration and Displacement
• Laboratory: Acceleration

Unit 5: Forces
Dynamics is the study of how forces affect the motion of a body. Students define and give examples of the various kinds of force that act upon objects to change their motion. Students confront the physical realities of Newton’s three laws of motion. A laboratory gives students first-hand experience at applying Newton’s laws.

- Forces
- Inertia and Newton’s First Law
- Newton’s Second Law
- Mass and Weight
- Laboratory: Newton’s Laws of Motion
- Newton’s Third Law

**Unit 6: Net Forces and Vectors**

Physicists are often confronted with determining the net force applied to a stationary or moving object. What will be the effect of the force or forces applied? To solve problems like these, students learn how to calculate net forces both graphically and through the use of trigonometry. This unit gives students a primer on the application of trigonometry to solving net force problems. There are two laboratories in this lesson so students can determine net forces and apply the proper mathematics to issues of the change in a body’s motion.

- The Net Forces Problem
- Resolving Vectors
- Adding Vectors
- Laboratory: Working with Vectors
- Net Forces at Equilibrium
- Free Fall and Equilibrium
- Calculating Net Force
- Friction
- Laboratory: Net Force

**Unit 7: Motion in Two Dimensions**

All students are familiar with certain kinds of moving object—a cannonball shot through the air, a baseball thrown in from center field, the swinging arm of a grandfather clock, a spring bouncing up and down. These are all examples of motion in two directions—the subject of this unit. Students conduct experiments in spring motion and other forms of harmonic motion. Students apply the knowledge gained in their studies of kinematics and dynamics to a new type of motion of a physical body.

- Projectile Motion
- Uniform Circular Motion
- Laboratory: Motion in Two Dimensions
- Angular Displacement and Torque
- Simple Harmonic Motion: Springs
- Simple Harmonic Motion: Pendulum
- Laboratory: Harmonic Motion

**Unit 8: Gravitation**
This course in physics builds student knowledge step by step. Their understanding of motion gives them a basis for understanding both Newton’s and Einstein’s views of gravity. They work with some of the data that Kepler worked with. Students then work problems with the inverse square law as applied to the gravitational attraction between two bodies. With a firm basis in acceleration, students then see how Einstein explained gravity to the world.

- History of Gravitation
- Laboratory: Kepler’s Laws
- Universal Gravitation
- Einstein and the Gravitational Field

Unit 9: Physics and Scientific Inquiry
It is traditional in science classes to start a course with a discussion of the scientific methods. In this course, however, students are engaged in the scientific method later in the semester, allowing them to work with scientific processes after they have a solid basis in the physics of motion. Students spend detailed time on questioning, forming hypotheses, and other science processes.

- Physics Inquiry: Inductive Reasoning
- Physics Inquiry: Questions and Hypotheses
- Physics Inquiry: Experimentation
- Physics Inquiry: Data Collection and Analysis
- Physics Inquiry: Conclusions and Communicating

Unit 10: Semester Review and Test
Students prepare for and take the semester test.

Semester 2
Unit 1: Momentum
In his studies of motion Newton spoke of the “quality of motion.” All three of Newton’s laws were written from the point of view of momentum—the subject of this unit. As a basis for understanding momentum, students first define it and apply the mathematics of momentum to an object. They learn about the law of conservation of momentum and its importance. The importance of the law of angular momentum is then discussed. Students do a laboratory that gives them data to which they can apply their understanding of momentum.

- Linear Momentum and Impulse
- Law of Conservation of Momentum
- Momentum in Collisions
- Laboratory: Momentum
- Conservation of Angular Momentum

Unit 2: Work
In this unit students take another step in understanding energy as it applies to physical systems by examining the concept of work. Using their knowledge of free-body diagrams, students work through problems involving direction of work problems, using simple and compound machines as a template for understanding work and power.

- Work and Power
- Direction of Force and Work
- Laboratory: Work and Power
• Machines and Mechanical Advantage
• Laboratory: Simple and Compound Machines

Unit 3: Energy
The conservation of energy is one of the fundamental laws of physics, and forms the basis for this unit. Students learn about the forms of energy and how one form can be transformed into another—realizing that energy is always conserved in the process. A laboratory allows students real experience with energy conservation in the sense of physics.

• Types of Energy and Their Conversions
• Kinetic and Potential Energy
• Conservations of Energy
• Laboratory: Conservation of Energy
• Energy During Collisions

Unit 4: Thermal Energy
Thermal energy is a form of energy with a unique basis in atomic theory. Heat and thermal energy are discussed as resulting from the movement of particles and the motion in a many-particle system. Students come to know both the first and second laws of thermodynamics and have first-hand experience with heat engines. In addition, students calculate the heating of an object from solid to gas, including calculation of heat changes during change of state.

• Kinetic-Molecular Theory
• Specific Heat
• Laboratory: Specific Heat
• States of Matter
• Heat During Change of State
• First Law of Thermodynamics
• Second Law of Thermodynamics and Entropy

Unit 5: Waves
Heat is one way that energy moves from one place to another, and now students examine another way—through waves. Young physicists learn the characteristics of waves by examining them and by studying sound as an example of one type of wave. This unit provides the fundamentals that students apply to the study of light.

• Characteristics of Waves
• Sound: Vibration and Waves
• Qualities of Sound
• Laboratory: Sound

Unit 6: Light
The electromagnetic spectrum contains radiation of various wavelengths, including X-rays, gamma rays, and visible light. Students study the properties light by exploring diffraction and the resulting interference. Reflection and refraction then form the basis for students’ understanding of the optics of mirrors and lenses. A laboratory on optics gives students the opportunity to create and interpret ray diagrams based on hands-on learning.

• The Electromagnetic Spectrum
• Diffraction and Interference
• Reflection
• Refraction
• Mirrors
• Lenses
• Laboratory: Optics

Unit 7: Electric Forces
Students have explored the energy of motion and waves, as well as thermal energy. With this sound basis of what energy is and how it is conserved, attention is turned to electricity, another form of energy. This unit explores the electric charge and its behavior in electric fields. Students are introduced to the concept of an electrical field and apply various equations that define the behavior of a test charge in electric fields.
• Static Electricity
• Electric Force
• Electric Fields
• Laboratory: Electrostatics
• Electric Potential

Unit 8: Currents and Circuits
With a basis in understanding a force field and how to calculate and monitor electric potentials, students will diagram, construct, and interpret electric circuits. They will understand how a current is generated and how it flows through series and parallel circuits. In addition they will construct and interpret combined circuits, following the electric flow.
• Current and Circuits
• Current Electric Forces
• Series Circuits
• Parallel Circuits
• Combined Circuits
• Laboratory: Circuits

Unit 9: Magnetism
Electricity and magnetism are both phenomena that students have a lot of experience with. In this unit the goal is to explore magnetism and then unite electricity and magnetisms, introducing the phenomenon of electromagnetism. Students conduct experiments in electromagnetism to gain knowledge of energy relationships involved in the interplay of electricity and magnetism.
• Magnets and Magnetic Fields
• Forces in Magnetic Fields
• Electromagnetic Induction
• Laboratory: Magnetic Fields

Unit 10: Modern Physics
When you read news or see it over electronic media you can understand the importance of some of the area of physics traditionally called modern physics. Solar panels, for example, work because light, striking certain surfaces, can
generate electricity. Why this happens was explained by Einstein. This and other modern physics topics connect students to the importance of physics in the modern world.

- Atomic Spectra and Quantum Theory
- The Nature of Light and the Photoelectric Effect
- Relativity
- Structure of the Nucleus
- Radioactivity

Unit 11: Semester Review and Test
Students prepare for and take the semester test.

AP Physics

PEIMS Course Title/Number: AP Physics/ A3050001
Course Code: SCI-520V1-A
Course Requirements/Prerequisite Requirements:
Algebra II, Pre-Calculus with Trigonometry Recommended for qualified AP students
Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: AP Physics
AP Physics B is a non-calculus survey course covering five general areas: Newtonian mechanics, fluid mechanics and thermal physics, electricity and magnetism, waves and optics, and atomic and nuclear physics. Students will gain qualitative conceptual understanding of physics’ core principles and laboratory experience on each topic, and then apply their knowledge to problem-solving exercises. Students develop critical thinking skills through regular classroom discussions, laboratory activities that extend their learning beyond the classroom, and application questions that require students to apply what they are learning to situations that are new to them. They’ll learn how to measure the mass of a planet without weighing it, find out how electricity makes a motor turn, and learn how opticians know how to shape the lenses for glasses. The equivalent of an introductory college-level course, AP Physics B prepares students for the AP Exam and for further study in science and engineering.
The online content aligns to the scope and sequence specified by the College Board and to widely used textbooks.

Course Length: Two semesters

Materials provided by K12: The majority of the required instructional material for this course is available to students online and is equivalent to a college-level textbook. These materials were created and are owned by our company. In addition, either the student or the school must purchase the following:
Graphing calculator such as the TI-84 Plus, TI-83, or TI-83 Plus
The following key should help you understand the different types of activities students engage

Materials required of student: common household materials for labs
Environmental Science

PEIMS Course Title/Number: Environmental Science/ 03020000
Course Code: SCI-010VZTX-K

Course Requirements/Prerequisite Requirements: Success in previous high school science course and teacher/school Counselor recommendation

Credits to be earned: .5 credit with grade of 70 or above

Course Description: This course surveys key topic areas including the application of scientific process to environmental analysis; ecology; energy flow; ecological structures; earth systems; and atmospheric, land, and water science. Topics also include the management of natural resources and analysis of private and governmental decisions involving the environment. Students explore actual case studies and conduct five hands-on, unit-long research activities, learning that political and private decisions about the environment and the use of resources require accurate application of scientific processes, including proper data collection and responsible conclusions.

Course Length: One semester

Materials provided by K12: Online course

Materials required of student: common household materials for labs

Course Outline

1.01 Course Introduction
1.02 Case Study: Easter Island
1.03 Case Study: Water & Empires
1.04 Environment & Society
1.05 Science of Environmental Science
1.06 Earth as an Environmental System
1.08 Scientific Processes
1.09 Questioning & Hypothesizing
1.10 Collecting Environmental Data
1.11 Field Study: Remote Sensing 1
1.12 Field Study: Remote Sensing 2
1.13 Analyzing Data
1.14 Using the Metric System
1.15 Field Study: Remote Sensing 3
1.16 Communicating
2.01 Earth Systems & Lithosphere
2.02 Atmosphere
2.03 Hydrosphere & Biosphere
2.04 Case Study: Hurricane
2.06 Individuals & Populations
2.07 Ecosystems & Biomes
2.08 Field Study: Ecosystems 1
2.09 Energy Flow in Ecosystems 1
2.10 Energy Flow in Ecosystems 2
2.11 Nutrient Cycling in Ecosystems
2.12 Case Study: Ecosystem Change
2.13 Case Study: Population Growth
2.14 Principles of Population Growth
2.15 Field Study: Ecosystems 2
2.16 Field Study: Ecosystems 3
2.17 Field Study: Ecosystems 4
2.18 Discuss: Ecosystems
3.01 Classification of Resources
3.02 Case Study: Soil
3.03 Soil as a Resource
3.04 Water as a Resource
3.05 Case Study: Water
3.06 Field Study: Water Resources 1
3.07 Case Study: Timber
3.08 Timber as a Resource
3.10 Field Study: Water Resources 2
3.11 Field Study: Water Resources 3
3.12 Case Study: Fish
3.13 Food as a Resource
3.14 Fossil Fuels: Types
3.15 Fossil Fuels: Current Issues
3.17 Discuss: Water Resources
4.01 Modern Environmental Concerns
4.02 Case Study: Air Pollution
4.03 Air Pollution: Science & Solutions
4.04 Case Study: Acid Rain
4.05 Acid Rain: Science & Solutions
4.06 Hazardous & Solid Waste
4.07 Field Study: Pollution 1
4.08 Field Study: Pollution 2
4.10 Case Study: Biodiversity
4.11 Biodiversity & Extinction
4.12 Global Climate Concerns
4.13 Field Study: Pollution 3
4.14 Field Study: Pollution 4
4.15 Discuss: Pollution
5.01 Field Study: Legislation 1
5.02 Government & the Environment
5.03 Case Study: Environmental Politics
5.04 Clean Air Legislation
5.05 Clean Water Legislation
5.06 Other Environmental Legislation
5.07 Field Study: Legislation 2
5.08 Field Study: Legislation 3
5.09 Field Study: Legislation 4
Environmental Legislation
Astronomy
PEIMS Course Title/Number: Astronomy/ 3060100
Course Code: provided by Pasadena ISD

Course Requirements/Prerequisite Requirements:

Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Students will explore the history, concepts and theories of Astronomy and demonstrate skills associated with the science of Astronomy including star identification, stellar calculations, planet recognition and contributions made by space exploration.

Course Length: Two semesters

Materials
Materials required of student: Optional Textbook: Astronomy Today by Eric Chaisson and Steve McMillan

Objectives:
Explore the ancient cultures who utilized astronomy
• Explain how ancient astronomy affects today's cultures
• Explore the common constellations and their mythology
• Explore astronomers contributions to the understanding of our world and universe
• Describe the location of the Earth in our solar system
• Describe how the Sun and Moon affect the Earth systems
• Explore the characteristics of our Moon
• Identify all of the planets and other objects in our solar system and describe their characteristics
• Explain the characteristics of the different types of galaxies.
• Explain the different theories of how the universe was created.
• Explore the scientific empirical data on the age of the universe.
• Explore the historical development of the Big Bang Theory
• Describe the data concerning the formation of galaxies and our solar system.
• Describe nuclear reactions in stars.
• Explore the characteristics of stars such as temperature, age, relative size, composition, and radial velocity using spectral analysis.
• Identify the stages in the life cycle of stars by examining the Hertzsprung-Russell diagram.
• Identify the approximate mass, size, motion, temperature, structure, and composition of the Sun.
• Identify the source of energy within the Sun and explain that the Sun is the major source of energy for the Earth
• Analyze the impact of the space program

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SOCIAL STUDIES COURSES

World Geography
PEIMS Course Title/Number: Geography/ 03320100
Course Code: Geography - AVT - TX
Course Requirements/Prerequisite Requirements: none

Credits to be earned: .5 credit per semester completion with grade of 70 or above
Course Description: This Geography course will examine a broad range of geographical perspectives covering all of the major regions of the world. Each region will be reviewed in a similar structure in order for students to more clearly see the similarities and differences between each region. Specifically, the course will explore where each region is located along with its physical characteristics, including absolute and relative location, climate, and significant geographical features. The exploration will then continue on to look at each region from a cultural, economic, and political perspective, closely examining the human impact on each region from these perspectives as well as how human activities impact the environments of the region.

Course Length: Two semesters
Materials provided by K12: Online course
Materials required of student: Please download Google Earth to complete a course activities
YouTube will be used throughout the course content. Please adjust user settings accordingly

Course Outline

Semester 1
Unit I: Introduction to Geography
  • Section A - Welcome to Geography
  • Section B - Locating Our Place in Space
  • Section C - Physical Attributes of Earth’s Landscape
  • Section D - Human Impact
  • Section E - Careers in Geography

Unit II: North America
  • Section A - Where Is North America?
  • Section B - Physical Characteristics and Systems of North America
  • Section C - Human Culture of North America
  • Section D - Human Impact on the Environment
  • Section E - Immigration in North America

Unit III: Central America
  • Section A - Where Is Central America?
  • Section B - Physical Characteristics and Processes of Central America
  • Section C - People and Culture of Central America
• Section D - Human Impact on the Central American Environment
• Section E - Focus on Poverty

Unit IV: South America
• Section A - Where Is South America?
• Section B - Physical Systems and Processes of South America
• Section C - People and Culture of South America
• Section D - Human Impact on the Environment of South America
• Section E - Focus On Deforestation

Unit V: Western Europe
• Section A - Where Is Western Europe?
• Section B - Physical Systems and Processes of Western Europe
• Section C - People and Culture of Western Europe
• Section D - Human Impact on the Environment of Western Europe
• Section E - Focus on Economic Systems
• Unit 6 – Describe and compare the landforms, climates, population, culture, and economic characteristics of places and regions in Eastern Europe.
• Unit 7 – Describe and compare the landforms, climates, population, culture, and economic characteristics of places and regions in Eastern Asia.
• Unit 8 – Describe and compare the landforms, climates, population, culture, and economic characteristics of places and regions in Southeast Asia and the Pacific Cultures.
• Unit 9 – Describe and compare the landforms, climates, population, culture, and economic characteristics of places and regions in Africa.
• Unit 10 – Describe and compare the landforms, climates, population, culture, and economic characteristics of places and regions in India and the Middle East.

Course Outline
Semester 2
Unit VI: Eastern Europe
• Section A - Where Is Eastern Europe?
• Section B - Physical Systems and Processes of Eastern Europe
• Section C - People and Culture of Eastern Europe
• Section D - Human Impact on the Environment of Eastern Europe
• Section E - Focus on Nuclear Energy

Unit VII: Eastern Asia
• Section A - Where Is Eastern Asia?
• Section B - Physical Systems and Processes of Eastern Asia
• Section C - People and Culture of Eastern Asia
• Section D - Human Impact on the Environment of Eastern Asia
• Section E - Focus on Climate Change

Unit VIII: Southeast Asia and the Pacific
• Section A - Where Is Southeast Asia and The Pacific?
• Section B - Physical Systems and Processes of Southeast Asia and the Pacific
• Section C - People and Culture of Southeast Asia and the Pacific
• Section D - Human Impact on the Environment of Southeast Asia and the Pacific
• Section E - Focus on Disaster Planning

Unit IX: Africa
• Section A - Where Is Africa?
• Section B - Physical Processes and Systems of Africa
• Section C - People and Culture of Africa
• Section D - Human Impact on the Environment of Africa
• Section E - Focus on Disease

Unit X: India and the Middle East
• Section A - Where is India and the Middle East?
• Section B - Physical Systems and Processes of India and the Middle East
• Section C - People and Culture of India and the Middle East
• Section D - Human Impact on the Environment of India and the Middle East
• Section E - Focus on Outsourcing

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World History
PEIMS Course Title/Number: World History/ 03340400
Course Code: HST-102AV1TX-A
Course Requirements/Prerequisite Requirements: none

Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Core World History
This course traces the development of civilizations around the world from prehistory to the present, with a special emphasis on key periods and primary sources. The course covers major events in world history, including the development and influence of human-geographic relationships, political and social structures, economics, science and technology, and the arts. Students investigate the major religions and belief systems throughout history and learn about the importance of trade and cultural exchange. Other topics include the development of agriculture, the spread of democracy, the rise of nation-states, the industrial era, the spread of imperialism, and the issues and conflicts of the twentieth century.

Course Description: Comprehensive World History
This course traces the development of civilizations around the world from prehistory to the present, with a special emphasis on key periods and primary sources. The course covers major events in world history, including the development and influence of human-geographic relationships, political and social structures, economics, science and technology, and the arts. Students investigate the major religions and belief systems throughout history and learn about the importance of trade and cultural exchange. Other topics include the development of agriculture, the spread of democracy, the rise of nation-states, the industrial era, the spread of imperialism, and the issues and conflicts of the twentieth century. Comprehensive is more challenging with numerous writing assignments in addition to the activities found in Core.

Course Length: Two semesters
Materials provided by K12: Online course
Materials required of student: none

Course Outline
Topic 7.1 The Age of Exploration
Topic 7.2 Columbus
Topic 7.3 Conquest of the Americas
Topic 7.4 Europe Absolutism
Topic 7.5 North America
Topic 7.6 Effects on Africa
Topic 7.7 Effects of Trade on SE Asia
Topic 7.8 Contacts with East Asia
Topic 8.1 Age of Enlightenment
Topic 8.2 Britain's Empire
Topic 8.3 American Revolution
Topic 8.4 The French Revolution
Topic 8.5 French Radicalism to New Empire
Topic 8.6 Latin Revolutions
Topic 9.1 Britain's Industrial Rev
Topic 9.2 Britain's Industrialization
Topic 9.3 Thinking Revolutions
Topic 9.4 Political Unrest
Topic 9.5 The Revolution Spreads
Topic 9.6 Reform Movements
Topic 10.1 The Rise of Nationalism
Topic 10.2 Europe Democracy
Topic 10.3 Expansion of U.S.
Topic 10.4 Demand for Colonies
Topic 10.5 S Asia Imperialism
Topic 10.6 E Asia Imperialism
Topic 10.7 SE Asia Imperialism
Topic 10.8 Latin America
Topic 10.9 New Nations
Topic 11.1 World War I
Topic 11.2 Revolution in Russia
Topic 11.3 Turmoil Between the Wars
Topic 11.4 A Global Depression
Topic 11.5 Rise of Fascism
Topic 11.6 Road to War
Topic 11.7 WWII in Europe
Topic 11.8 The Holocaust
Topic 11.9 WWII in the Pacific
Topic 12.1 Rivalry and Recovery
Topic 12.2 Europe: 1945 to Present
Topic 12.3 Middle E & S Asia: 1945
12.3 Study 1 Sec. 1 The Jewish Homeland and Conflict
12.3 Study 1 Sec. 2 Oil and the Economy of the Middle East
12.3 Study 1 Sec. 3 Revolutions and Reforms
Topic 12.4 Africa: 1945 to Present
Topic 12.5 Asia: 1945 to Present
Topic 12.6 Latin America: 1945
Topic 12.7 U.S. & Canada: 1945

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Modern U.S. History

**PEIMS Course Title/Number:** U.S. History/ 03340100  
**Course Code:** HST-313V1TX-K  
**Course Requirements/Prerequisite Requirements:** Middle school American History Before 1865  
**Credits to be earned:** .5 credit per semester completion with grade of 70 or above

**Course Description: Comprehensive U.S. History**

This course is a full-year survey that provides students with a comprehensive view of American history from the industrial revolution of the late nineteenth century to recent events. Readings are drawn from K¹²’s *The American Odyssey: A History of the United States*. Online lessons help students organize study, explore topics in depth, review in preparation for assessments, and practice skills of historical thinking and analysis. Activities include analyzing primary sources and maps, creating timelines, completing projects and written assignments, and conducting independent research.

**Course Description: Honors U.S. History**

This course is a challenging full-year survey that provides students with a comprehensive view of American history from the industrial revolution of the late nineteenth century to recent events. Readings are drawn from K¹²’s *The American Odyssey: A History of the United States*. Online lessons help students organize study, explore topics in depth, review in preparation for assessments, and practice advanced skills of historical thinking and analysis. Activities include analyzing primary sources and maps, creating timelines, completing projects and written assignments, and conducting independent research. Students complete independent projects each semester.

**Course length:** Two Semesters  
**Materials:** *The American Odyssey: A History of the United States*  
**Materials required by the student:** None  
**Prerequisites:** Middle school American History Before 1865, or equivalent, and teacher/school counselor recommendation.

**Course Scope and Sequence**

**Semester 1**  
**Unit 1: Founding a Nation**

Students review the origins of the United States from the founding of the English colonies through the increased tensions and Enlightenment thought that led to the American Revolution. They explore the issues the new nation faced in forming a government and reinforce their knowledge of how the American system of government works under the United States Constitution.

- Semester Introduction
- The New England Colonies
• The Middle and Southern Colonies
• New Ideas
• The Road to Revolution
• Toward Independence
• Independence
• Governing the New Nation
• Creating a More Perfect Union
• Our Constitution

Unit 2: Defining a Nation
Early presidents, George Washington in particular, set the nation on a sound course. The country grew in area, population, diversity, and industry. But that growth, and questions about federalism and the institution of slavery not answered by the Constitution, led eventually to the horror of civil war. The Civil War kept the nation whole—though at a terrible cost—ended slavery, and pushed the United States into the modern era.
• Setting a Course
• Visions for a Nation
• Growing in Area
• Growing in Power
• New Politics
• Reforming
• Expanding
• Growing Apart
• Debate and Division
• Disunion
• Terrible War
• Reconstructing a Nation

Unit 3: Entering the Modern Era
During the late 1800s, the nation experienced tremendous growth in many areas. Students follow the enormous migration across the Great Plains and its impact on Native Americans, and the rise of new ways of manufacturing and doing business. They see the hardships factory and mine workers faced, and the demands for reform that came from diverse segments of society.
• Settling the Great American West
• The Changing West
• The End of a Way of Life
• New Industries Emerge
• Meeting Challenges
• Inventors and Industrialists
• How Big is Too Big?
• The Price of Industrialization
• Seeking a Better Way
• What to Do?

Unit 4: A New Century
The arrival of millions of immigrants and the rapid growth of cities in the late 1800s changed the face and landscape of the United States. Students study the early years of the modern age, our modern political system, and a modern approach to reform.
• Beacon of Hope
• The Immigrant Experience
• A Different Experience
• Cities Grow
• Urban Issues
• Cities Life
• Populists
• Progressives
• Confronting Reality
• Taking on Power
• The Power of One

Unit 5: New Directions
During the last years of the nineteenth century and the first quarter of the twentieth century, the United States stepped onto the world stage. In this unit, students trace the rise of the nation’s power from the emergence of American imperialism just before 1900 through the end of the Great War and beyond. They examine as well, the hopes, demands, and challenges African Americans and women faced as they sought equality at home.
• Less Than Equal
• Different Visions
• Demanding a Voice
• An American Empire
• Presidents and Policies
• American Giant
• Shaping a Nation
• The Great War
• The War at Home
• Assessing the Great War

Unit 6: Turning Points
The United States emerged from World War I a major world power. The horror of the war left many people around the world disillusioned and bitter, while others reveled in the music, fads, and fashions of a new age. Students will complete a research project in this unit and then continue their study of the inter-war era as the economic bubble of the 1920s gave way to the Great Depression.
Unit 7: Semester Review and Test
Students prepare for and take the semester test.

Semester 2

Unit 1: Facing Crisis and War
Franklin Delano Roosevelt’s recovery plan, the New Deal, forever changed the way Americans thought about government. But his programs didn't end the Great Depression. Only when World War II began in Europe and the United States joined the Allies after the attack at Pearl Harbor did the economy fully recover. Students will trace FDR’s presidency through the Great Depression and World War II. They will see the hardship of the 1930s and the heroic efforts from men and women of all races and backgrounds that finally brought victory in Europe and Japan.

- Semester Introduction
- Confronting the Crisis
- New Strategies
- Reflections
- Lasting Programs
- War Clouds
- Going to War
- The War at Home
- Fighting on Two Fronts
- Horror Uncovered
- War’s End

Unit 2: Postwar America
World War II transformed the United States into the world's wealthiest and most powerful nation. That position brought new responsibilities. Students will witness the dangers of the atomic age and the tension between communist
and democratic countries that threatened the very existence of humankind. They will explore life in the United States during the 1950s as television and the automobile transformed American society. They will demonstrate their understanding of the era by producing an online magazine reflecting the news and the new trends of the times.

- A War of Words and Ideas
- Confronting Communism
- The Cold War Abroad
- Eisenhower at the Helm
- From War to Peace
- New Places to Live
- A New American Dream
- A New Frontier
- Your Magazine Project

Unit 3: Trauma at Home and Abroad

In 1961, John F. Kennedy told the world Americans would "assure the survival and the success of liberty." The 1960s tested that resolve. Students will explore the complexity of U.S. engagement in Southeast Asia, the hopes and hardships of the civil rights movement, the triumphs of greater liberty and democracy, and the thrill of seeing an American walk on the moon.

- The Beginning of Change
- Demanding Change
- How to Achieve Equality?
- I Have a Dream
- New Directions
- Other Paths
- Crisis
- War in Vietnam
- Escalation
- A Different Kind of War
- Those Who Served
- Reflections on War

Unit 4: Turmoil

The Cold War nearly erupted in nuclear war in the early 1960s as the superpowers faced off in Cuba. Meanwhile, on the other side of the globe, fears of communist expansion led the United States into its longest war, a war that would tear the nation apart and take a terrible toll in lives and in the country's image abroad and at home. Students will meet the people and groups who emerged during these tumultuous years, some demanding an end to war, some demanding civil rights for every group in the American mosaic, and some demanding answers to White House secrecy, corruption, and scandal.

- Culture and Counterculture
- Tragedies
• Women on the Move
• Voices for Change
• Complex Times
• The Watergate Scandal
• Transition

Unit 5: Modern Turning Points
Students will choose a topic from any period in American history between 1930 and about 1980 and produce a project in one of four formats. The theme of the project, regardless of topic or format, will be "turning points in American history, 1930 -1980." Then, they will study the end of the twentieth century as the United States rose to the position of a superpower militarily and economically, and faced social, cultural, and political challenges.

• The Research Project, Part 1
• The Research Project, Part 2
• The Research Project, Part 3
• The Research Project, Part 4
• A Changing Mood
• Reaganomics
• Cold War Warriors
• Legacies
• The Research Project, Part 5
• The Post-Cold War World, Part 1
• The Post-Cold War World, Part 2
• The Post-Cold War World, Part 3

Unit 6: Toward a New Millennium
In this last unit of Modern U.S. History, students will study the events of the very recent past. As they do, they must keep in mind that historians will continue to study and debate these events for decades before they can draw conclusions. This is a "first rough draft" of our nation's most recent chapter.

• A New Age
• Demographics Close to Home
• The Clinton Years
• Divisions
• Looking at North America, Part 1
• Looking at North America, Part 2
• Looking at North America, Part 3
• Looking at North America, Part 4
• The Research Project, Part 6
• The Research Project, Part 7
• Challenges at Century's End
• Entering a New Millennium
• New Realities
• War and Disaster
• Looking Ahead

**Unit 7: Semester Review and Test**
Students prepare for and take the semester test.

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AP U.S. History

PEIMS Course Title/Number: AP U.S. History/ A3340100
Course Code: HST-500AV1TX-A

Course Requirements/Prerequisite Requirements: U.S. Government and Politics (or equivalent) is recommended, but not required

Credits to be earned: .5 credit per semester completion with grade of 70 or above

Course Description: Students explore and analyze the economic, political, and social transformation of the United States since the time of the first European encounters. Students are asked to master not only the wide array of factual information necessary to do well on the AP® Exam but also to practice skills of critical analysis of historical information and documents. Students read primary and secondary source materials and analyze problems presented by historians to gain insight into challenges of interpretation and the ways in which historical events have shaped American society and culture. The content aligns to the sequence of topics recommended by the College Board and to widely used textbooks. Students prepare for the AP® Exam.

Course length: Two Semesters

Materials: America: A Narrative History

Materials required by the student: None

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U.S. and Global Economics

PEIMS Course Title/Number: Economics/ 03310300
Course Code: HST-413V1TX-A

Course Requirements/Prerequisite Requirements: U.S. Government and Politics (or equivalent) is recommended, but not required

Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: In this course on economic principles, students explore choices they face as producers, consumers, investors, and taxpayers. Students apply what they learn to real-world simulation problems. Topics of study include markets from historic and contemporary perspectives; supply and demand; theories of early economic philosophers such as Adam Smith and David Ricardo; theories of value; money (what it is, how it evolved, the role of banks, investment houses, and the Federal Reserve); Keynesian economics; how capitalism functions, focusing on productivity, wages, investment, and growth; issues of capitalism, such as unemployment, inflation, and the national debt; and a survey of markets in such areas as China, Europe, and the Middle East.

Course length: One Semester

Materials: Online course

Materials required by the student: None

Course Outline

Topic 1.1 What Is Economics?
Topic 1.2 Different Ways to Play
Topic 1.3 Dollars and Sense
Topic 1.4 Econ & Technology
Topic 1.5 Econ Game Wrap-Up
Topic 2.1 Producers and Consumers
Topic 2.2 Consumer Choice
Topic 2.3 The Biz of Business
Topic 2.4 Models of Business
Topic 2.5 The Players Wrap-Up
Topic 3.1 Law of Supply & Demand
Topic 3.2 Get a Job
Topic 3.3 Find a Place to Live
Topic 3.4 Economy Ups & Downs
Topic 3.5 The Price Is Right Wrap-Up
Topic 4.1 Money In the Bank
Topic 4.2 The Stock Market
Topic 4.3 More Markets
Topic 4.4 Financing a Business
Topic 4.5 Money $ $ Wrap-Up
Topic 5.1 Taxes and Tariffs

Topic 5.2 The Govt. Is a Consumer
Topic 5.3 The Govt. Is a Referee
Topic 5.4 The Govt. Is a Police Officer
Topic 5.5 Involved Govt. Wrap-Up
Topic 6.1 It's a Small World
Topic 6.2 Intl. Organizations
Topic 6.3 Challenge of Globalization
Topic 6.4 Global Game
Topic 7.1 Making Choices
Topic 7.2 Planning Ahead
Topic 7.3 Give Me Some Credit
Topic 7.4 Consumer Responsibility
Topic 7.5 Personal Finance
Topic 8.1 Global Econ
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AP Macro Economics
PEIMS Course Title/Number: AP Macro Economics/ A3310100
Course Code: HST-520V1-A
Course Requirements/Prerequisite Requirements: Algebra II; Recommended for qualified AP students
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
AP Macroeconomics students learn why and how the world economy can change from month to month, how to identify trends in our economy, and how to use those trends to develop performance measures and predictors of economic growth or decline. They’ll also examine how individuals, institutions, and influences affect people, and how those factors can impact everyone’s life through employment rates, government spending, inflation, taxes, and production. The equivalent of a 100-level college-level class, this course prepares students for the AP Exam and for further study in business, political science and history. The content aligns to the scope and sequence specified by the College Board and to widely-used textbooks.

Course length: One Semester

Materials:
The majority of the required instructional material for this course is available to students online and is equivalent to a college-level textbook. These materials were created and owned by our company. In addition, the following is an optional purchase:

Materials required by the student: None

U.S. Government and Politics
PEIMS Course Title/Number: U.S. Government/ 03330100
Course Code: HST-403V1TX-A
Course Requirements/Prerequisite Requirements: U.S. History (or equivalent) is recommended, but not required
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: This course studies the history, organization, and functions of the United States government. Beginning with the Declaration of Independence and continuing through to the present day, students explore the relationship between individual Americans and our governing bodies. Students take a close look at the political culture of our country and gain insight into the challenges faced by citizens, elected government officials, political activists, and others. Students also learn about the roles of political parties, interest groups, the media, and the Supreme Court, and discuss their own views on current political issues.

Course length: One Semester

Materials: Online course

Materials required by the student: None
AP U.S. Government

PEIMS Course Title/Number: AP Government/ A3330100
Course Code: HST-510V1-A
Course Requirements/Prerequisite Requirements: U.S History and Recommended for qualified AP students
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
United States government and the behavior of the electorate and politicians. Students will gain the analytic perspective necessary to critically evaluate political data, hypotheses, concepts, opinions, and processes. Along the way, they’ll learn how to gather data about political behavior and develop their own theoretical analysis of American politics. They’ll also build the skills they need to examine general propositions about government and politics, and to analyze the specific relationships between political, social, and economic institutions. Students will regularly respond to free response essay questions to demonstrate their analytic and interpretive insights into politics. Source materials they will draw upon throughout the semester include college level text and supplemental readings, primary source documents, online survey and data sources, and current news and analysis web-links. The equivalent of an introductory college-level course, AP U.S. Government and Politics prepares students for the AP Exam and for further study in political science, law, education, business, and history. The content aligns to the scope and sequence specified by the College Board and to widely used Advanced Placement U.S Government textbooks.

Course length: One Semester

Materials:
The majority of the required instructional material for this course, outside of textual material, is available to students online. These materials were created and owned by our company. Mandatory textual material: Serow, Ann G. and Everett C. Ladd. The Lanahan Readings in the American Polity. 4th ed. Baltimore: Lanahan Publishers, Inc., 2007.


The course includes a variety of sites with current event links to strengthen student understanding of key concepts and components of course curriculum.

Materials required by the student: None

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FOREIGN LANGUAGE

Spanish I
PEIMS Course Title/Number: Spanish I/ 03440100
Course Code: WLG-100V1-P
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above
Course Description: Students begin their introduction to Spanish with fundamental building blocks in four key areas of world language study: listening comprehension, speaking, reading, and writing. Students are initially trained to recognize key sounds and basic vocabulary, not only in written form but also through ear training that leads quickly to oral production. Vocabulary and grammar topics are introduced in an ongoing adventure story that prompts students to use skills from all four language-learning areas. Students learn fundamental grammar as embedded in authentic spoken language. Cultural information covers major Spanish-speaking areas in Europe and the Americas. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters
Materials provided by K12: Vox Everyday Spanish and English Dictionary
Materials required by the student: speakers and microphone

Spanish II
PEIMS Course Title/Number: Spanish II/ 03440200
Course Code: WLG-200AV1-P
Course Requirements/Prerequisite Requirements: Spanish I, middle school Spanish 1 and 2 (or equivalents)
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above
Course Description:
In this continuing introduction to Spanish, students deepen their focus on four key skills in world language acquisition: listening comprehension, speaking, reading, and writing. A continuing storyline introduces and reinforces new vocabulary, while activities prompt students to analyze meaning from context, and then to reproduce new vocabulary in real-life oral expression. Additional verb tenses and idiomatic expressions are also introduced. As in Spanish I, students learn grammar through supplemental texts that supply traditional charts, tables, and explanations. Cultural information addresses Spanish as it is used around the globe. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters
Materials provided by K12: Vox Everyday Spanish and English Dictionary
Materials required by the student: speakers and microphone
Spanish III
PEIMS Course Title/Number: Spanish III/ 03440300
Course Code: WLG-300V1-P
Course Requirements/Prerequisite Requirements: Spanish II (or equivalent)
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description: Intermediate Spanish students who have a strong base of vocabulary, speaking, and listening skills reach a new level of mastery and fluency in this course. Through games and compelling stories, students learn advanced grammar and vocabulary, with an emphasis on correct accents and comprehension of real-world native speech. Error recognition technology helps students eliminate common mistakes from their speaking and writing. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters
Materials: Vox Everyday Spanish and English Dictionary
Materials required by the student: speakers and microphone

AP Spanish
PEIMS Course Title/Number: AP Spanish/ A3440100
Course Code: WLG-500AV1-P
Course Requirements/Prerequisite Requirements: Strong success in Spanish III, or success in Spanish IV (or equivalents), and teacher/school counselor recommendation
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description: In AP Spanish Language, students perfect their Spanish speaking, listening, reading, and writing skills. They study vocabulary, grammar, and cultural aspects of the language, and apply what they’ve learned in extensive written and spoken exercises. By the end of the course, students will have an expansive vocabulary and a solid working knowledge of all Spanish verb forms and tenses. The equivalent of a college-level language course, AP Spanish Language prepares students for the AP exam and for further study of Spanish language, culture, and literature.

Course length: Two Semesters
Materials: Vox Everyday Spanish and English Dictionary
Materials required by the student: Computer speakers and microphone

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**French I**

PEIMS Course Title/Number: French I/ 03410100  
Course Code: WLG-110AV1-P  
Course Requirements/Prerequisite Requirements: none  
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above  

Course Description: Students begin their introduction to French with fundamental building blocks in four key areas of world language study: listening comprehension, speaking, reading, and writing. Students are initially trained to recognize key sounds and basic vocabulary, not only in written form but also through ear training that leads quickly to oral production. An ongoing adventure story introduces vocabulary and grammar topics, and prompts students to use skills from the four language-learning areas. Students learn fundamental grammar as embedded in authentic spoken language. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters  
Materials: Larousse Student French-English/English-French Dictionary  
Materials required by the student: speakers and microphone

**French II**

PEIMS Course Title/Number: French II/ 03410200  
Course Code: WLG-210V1-P  
Course Requirements/Prerequisite Requirements: French I, or middle school French 1 and 2  
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above  

Course Description: In this continuing introduction to French, students deepen their focus on four key skills in world language acquisition: listening comprehension, speaking, reading, and writing. A continuing storyline introduces and reinforces new vocabulary, while activities prompt students to analyze meaning from context, and then to reproduce new vocabulary items in functional real-life oral expression. Additional verb tenses and idiomatic expressions are also introduced. As in French I, students learn grammar through supplemental texts that supply traditional charts, tables, and explanations. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters  
Materials: Larousse Student French-English/English-French Dictionary  
Materials required by the student: speakers and microphone
French III
PEIMS Course Title/Number: French III/ 03410300
Course Code: WLG-310V1-P

Course Requirements/Prerequisite Requirements: French II (or equivalent)

Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description: Intermediate French students who have a strong base of vocabulary, speaking, and listening skills reach a new level of mastery and fluency in this course. Through games and compelling stories, students learn advanced grammar and vocabulary, with an emphasis on correct accents and comprehension of real-world native speech. Error recognition technology helps students eliminate common mistakes from their speaking and writing. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters

Materials: Larousse Student French-English/English-French Dictionary

Materials required by the student: speakers and microphone

AP French
PEIMS Course Title/Number: AP French/ A3410100
Course Code: WLG-510V1-P

Course Requirements/Prerequisite Requirements: Strong success in French III, or success French IV (or equivalents), and teacher/school counselor recommendation

Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description:

Course length: Two Semesters

Materials: Larousse Student French-English/English-French Dictionary

Materials required by the student: Speakers and microphone

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Latin I
PEIMS Course Title/Number: Latin I/ 03430100
Course Code: WLG-130AV1-P
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description: This introduction to Latin clarifies the traditionally difficult aspects of the language through vocabulary that follows all standard Latin rules but allows students to tell modern stories connected to a contemporary adventure. Students study familiar vocabulary so they can bring into focus the special characteristics of Latin, notably noun cases and declensions. They receive ongoing practice in vocabulary and grammar, which leads to the study of post-Classical Latin, both ecclesiastical and secular, as embodied in the Vulgate Bible and Medieval Latin texts. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters
Materials: Bantam New College Latin & English Dictionary
Materials required by the student: speakers and microphone

Latin II
PEIMS Course Title/Number: Latin II/ 03430200
Course Code: WLG-230AV1-P
Course Requirements/Prerequisite Requirements: Latin I (or equivalent)
Credits to be earned: .5 credit per semester upon completion with grade of 70 or above

Course Description: Students with a foundation in Latin refine their skills through compelling language lessons, as well as historical and cultural studies. They go from the basics of Latin to a higher level of sophistication through a learning methodology that uses games and stories. Students concentrate on fostering their ability to read and understand (without using a dictionary) classical Latin from a variety of authentic sources. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

Course length: Two Semesters
Materials: Bantam New College Latin & English Dictionary
Materials required by the student: speakers and microphone
**German I**  
**PEIMS Course Title/Number:** German I/ 03420100  
**Course Code:** WLG-120AV1-P  
**Course Requirements/Prerequisite Requirements:** none

**Credits to be earned:** .5 credit per semester upon completion with grade of 70 or above  
Students begin their introduction to German with fundamental building blocks in four key areas of world language study: listening comprehension, speaking, reading, and writing. Students are initially trained to recognize key sounds and basic vocabulary, not only in written form but also through ear training that leads quickly to oral production. An ongoing adventure story introduces vocabulary and grammar topics, and prompts students to use skills from the four language-learning areas. Students learn fundamental grammar as embedded in authentic spoken language. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

**Course length:** Two Semesters  
**Materials:** Larousse German Dictionary  
**Materials required by the student:** speakers and microphone

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**German II**  
**PEIMS Course Title/Number:** German II/ 03420200  
**Course Code:** WLG-220AV1-P  
**Course Requirements/Prerequisite Requirements:** German I, middle school German 1 and 2 (or equivalents)

**Credits to be earned:** .5 credit per semester upon completion with grade of 70 or above  

**Course Description:** In this continuing introduction to German, students deepen their focus on four key skills in world language acquisition: listening comprehension, speaking, reading, and writing. A continuing storyline introduces and reinforces new vocabulary, while activities prompt students to analyze meaning from context, and then to reproduce new vocabulary in real-life oral expression. Additional verb tenses and idiomatic expressions are also introduced. As in German I, students learn grammar through supplemental texts that supply traditional charts, tables, and explanations. Cultural information addresses Spanish as it is used around the globe. Engaging graphics, videos, and games keep students interested, and make learning languages exciting.

**Course length:** Two Semesters  
**Materials:** Larousse German Dictionary  
**Materials required by the student:** speakers and microphone
Mandarin Chinese

PEIMS Course Title/Number: Chinese I/ 3490100  Chinese II/ 03490200
Course Code: 3rd party provider
Course Requirements/Prerequisite Requirements: none for Chinese I ; For Chinese II – need to have completed Chinese I
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
As a student in this course you will:
- Learn to speak and read approximately 503 new vocabulary words/phrases
- Learn to write approximately 205 words.
- Learn to use Chinese in basic conversations on a variety of topics
- Learn to read basic Chinese. Compare Chinese-language cultures with American culture
- Examine and understand how Chinese as a language relates to, and is positioned in, Chinese culture
- Learn to appreciate characteristics of Chinese unique to the language and culture. Through the study of Chinese, gain a greater appreciation for your own language and culture.

Course length: Two semesters each course
Materials: Online course
Materials required by the student: speakers and microphone

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ELECTIVES

Psychology

PEIMS Course Title/Number: Psychology/ 3350100
Course Code: Provided by Pasadena ISD
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
Unit One: Introduction to Psychology
Unit Two: Biology & Behavior
Unit 3: Development
Unit 4: Learning, Intelligence, and Motivation. This unit has 2 parts!
a. Part One: Learning & the Classroom
b. Part Two: Motivation, Emotion, and Intelligence
Unit 5: Personality, Stress, and Psychological Disorders
Unit 6: Social Influences on Behavior

Course length: One Semester
Materials: There is no online textbook. Everything you need to know is located in the softchalk lesson files. For research on discussion boards, wiki’s, blogs, or glogs – links will be provided to help point you in the right direction. Materials required by the student: None

AP Psychology

PEIMS Course Title/Number: AP Psychology/ A3350100
Course Code: HST-540V1TX-A
Course Requirements/Prerequisite Requirements: Success in Honors Biology (or equivalent)
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
This course is the equivalent of an introductory college-level course. Students receive an overview of current psychological research methods and theories. They explore the therapies used by professional counselors and clinical psychologists, and examine the reasons for normal human reactions: how people learn and think, the process of human development and human aggression, altruism, intimacy, and self-reflection. They study core psychological concepts, such as the brain and sensory functions, and learn to gauge human reactions, gather information, and form meaningful syntheses. Students prepare for the AP Exam and for further studies in psychology and life sciences.

Course length: One Semester
Materials provided by K12: Psychology by David G. Myers, 9th ed
Materials required by the student: None
Sociology
PEIMS Course Title/Number: Sociology/ 3370100
Course Code: Provided by Pasadena ISD
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description:
Unit One

- Part one: The World of Sociology
- Part two: Culture

Unit Two: Society and the Individual
Unit 3: Deviance and Crime
Unit 4: Social Inequality
Unit 5: Social Institutions
Unit 6: Social Change

Course length: One Semester

Materials: There is no online textbook. Everything you need to know is located in the softchalk lesson files. For research on discussion boards, wiki’s, blogs, or glogs – links will be provided to help point you in the right direction.

Materials required by the student: None

Computer Literacy/Computer Science
PEIMS Course Title/Number: Computer Science/ 03580200
Course Code: TCH-010V2TX-G; TCH-036V1TX-G
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: Computer Literacy - Today’s students must be able to effectively use technology to research, organize, create, and evaluate information. This course provides a foundation in the skills and concepts that define computer literacy in the twenty-first century. From the basics of keyboarding to Internet research techniques, document creation, and digital citizenship, students practice essential skills through hands-on projects.

Computer Science - This course introduces students to computer science concepts such as computer architecture, networks, and the Internet. Students use object-oriented programming, event-driven processes, modular computer programming, and data manipulation algorithms to produce finished software programs. They use the design process to create many programs by determining specifications, designing the software, and testing and improving the product until it meets the specifications. By the end of this course, students will have a solid foundation for further study in this subject.

Course length: Two Semesters

Materials provided by K12: Online course
Materials required by the student: Software: OpenOffice.org (free download provided in course); Mozilla Firefox
System Requirements: Microsoft Windows XP, Windows Vista, Windows 7, or Mac OS X 10.4 or higher operating system; for Windows, 256 MB of memory (RAM), 650 MB available hard drive space, and a 1024 x 768 or higher monitor resolution; for Mac OS X, an Intel processor, 512 MB of memory (RAM), 400 MB available disk space, and a 1024 x 768 or higher monitor resolution

Course Outline

Course Overview

Get Started: Computer Basics

Get Started: Health and Safety in the Workplace

Section 1: Career Connection

Section 2: Career Connection

Section 3: Career Connection

Section 4: Career Connection

Section 5: Career Connection

Section 6: Career Connection

Section 7: Teamwork and Leadership

Section 7: History of Technology

AP Computer Science

PEIMS Course Title/Number: AP Computer Science/
Course Code: TCH-500

Course Requirements/Prerequisite Requirements: Success in Honors Algebra II (or equivalent); previous programming experience, such as an introductory course in C++, Pascal, Visual Basic, or Java; basic understanding of networks; and teacher/school counselor recommendation

Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: This course—the equivalent of an introductory college-level course—emphasizes object-oriented programming methodology with a concentration on problem solving and algorithm development. It also includes the study of data structures, design, and abstraction. Students should be prepared to move quickly, and be already comfortable with problem solving, functions, and the uses of functional notation. They are expected to know responsible use of computer systems, including system reliability, privacy, legal issues, intellectual property, and social and ethical ramifications of computer use. Students leave this course prepared for the AP exam and for further study in computer science.

Course length: One Semester

Materials provided by K12: Online course

Materials required by the student: Java; at least 128 MB of memory
Fine Art

PEIMS Course Title/Number: Art Appreciation/ 03500100
Course Code: ART-010AV1TX-K
Course Requirements/Prerequisite Requirements: World History (or equivalent) is recommended as a prerequisite or co-requisite, but not required
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: This course combines art history, appreciation, and analysis, while engaging students in hands-on creative projects. Lessons introduce major periods and movements in art history while focusing on masterworks and the intellectual, technical, and creative processes behind those works. Studio lessons provide opportunities for drawing, painting, sculpting, and other creative endeavors.
Course length: Two Semesters
Materials provided by K12: One package of white clay; one set of acrylic paint; one set of round paintbrushes.
Materials required by the student: It is recommended, but not required, that students have some means of capturing an image of their studio art projects with a digital camera, webcam, or other imaging device.

Course Scope and Sequence

Semester 1
Unit 1: Understanding Art
Students look closely at how artists use the building blocks or “elements” of art such as line, color, and texture. They analyze how artists organize these elements of art using design principles, such as unity, pattern, and emphasis. Then students explore works of art from various approaches, including historical, critical, and aesthetic. They learn that we group works of art and architecture with similar characteristics into periods, civilizations, and styles. Students answer questions like, “Does art have to be beautiful to be good?” and “Can functional objects be works of art?”

- Elements of Art
- Principles of Design
- Virtual Field Trip: Elements and Principles
- Sketchbook
- Approaches to Art: Art History
- Approaches to Art: Criticism and Aesthetics
- What are “Structure and Function?”

Unit 2: Studio: Understanding Art
Students apply what they learned in “Unit 1: Understanding Art” by creating their own artwork.

- Studio 1
- Studio 2
- Studio 3
- Studio 4
- Studio 5
Unit 3: Art of Ancient Times
Students explore the works of art and architecture from the ancient civilizations of Mesopotamia, Egypt, Greece, and Rome. They examine how these works reflect beliefs and attitude of the time and place in which they were created. Students describe how artists of one civilization influenced artists of another, and compare and contrast works from the four civilizations.

- Art of Ancient Mesopotamia
- Art of Ancient Egypt 1
- Art of Ancient Egypt 2
- Virtual Field Trip: Mesopotamian and Egyptian Art
- Art of Ancient Greece 1
- Art of Ancient Greece 2
- Sketchbook
- Art of Ancient Rome 1
- Art of Ancient Rome 2
- Virtual Field Trip: Greek and Roman Art
- Making Connections: Comparing and Contrasting Works of Ancient Art

Unit 4: Studio: Art of Ancient Times
Students apply what they learned in “Unit 3: Art of Ancient Times” by creating their own artwork.

- Studio 1
- Studio 2
- Studio 3
- Studio 4
- Studio 5

Unit 5: Perspectives in Design from Many Cultures
Students explore the works of art and architecture from China, Japan, India, the Americas, the Islamic world, and Africa. They examine how these works reflect beliefs and attitude of the time and place in which they were created. Students learn about various art processes, such as creating a Navajo weaving and Chinese porcelain vases, and they compare and contrast works from the various cultures.

- Art of Asia: China
- Art of Asia: Japan
- Art of Asia: India
- Virtual Field Trip: Chinese, Japanese, and Indian Art
- Sketchbook
- Art of the Americas: Central and South American Indians
- Art of the Americas: North American Indians
- Virtual Field Trip: Art of the Americas
- Sketchbook
- Art of the Islamic World
- Art of Africa
- Virtual Field Trip: Islamic and African Art
• Making Connections: Comparing and Contrasting Art of Various Cultures

Unit 6: Studio: Perspectives in Design from Many Cultures
Students apply what they learned in “Unit 5: Perspectives in Design from Many Cultures” by creating their own artwork.

• Studio 1
• Studio 2
• Studio 3
• Studio 4
• Studio 5

Unit 7: The Renaissance
Students explore the works of art and architecture from medieval times before diving into the Renaissance. They examine how these works reflect beliefs and attitude of the time and place in which they were created. Students learn about various art processes, such as creating Gothic stained glass and Renaissance engraving, and they compare and contrast Renaissance works from Italy, Germany, the Netherlands, and Spain.

• Early Medieval Art: Byzantine and Romanesque
• Gothic Art
• The Early Renaissance
• Virtual Field Trip: Medieval and Early Renaissance Art
• Italian Renaissance: Painting 1
• Sketchbook
• Italian Renaissance: Painting 2
• Italian Renaissance: Sculpture
• Italian Renaissance: Architecture
• Virtual Field Trip: Italian Renaissance Art and Architecture
• Renaissance Beyond Italy 1: Germany
• Renaissance Beyond Italy 2: Netherlands and Spain
• Virtual Field Trip: Renaissance Art Outside Italy
• Making Connections: Comparing and Contrasting Works of Renaissance Art

Unit 8: Studio: The Renaissance
Students apply what they learned in “Unit 7: The Renaissance” by creating their own artwork.

• Studio 1
• Studio 2
• Studio 3
• Studio 4
• Studio 5

Unit 9: Semester Review and Test
Students review key concepts and content from the lessons in this semester, and then take the semester test.

• Semester Review
• Semester Test
Semester 2

Unit 1: From Baroque to Romantic
Students explore the works of Baroque, Rococo, Neoclassical, and Romantic art and architecture. They examine how these works reflect beliefs and attitude of the time and place in which they were created. Students learn how artists of one period or civilization influence artists of another, and they compare and contrast works of art covered in this unit.

- Baroque in Italy: Sculpture
- Baroque in Italy: Painting
- Baroque in Spain and France
- Baroque in the Netherlands (Flanders and United Dutch Republic)
- Virtual Field Trip: Baroque Art
- Sketchbook
- Making Connections: Comparing and Contrasting Baroque Art
- The Enlightenment: Rococo and Naturalist Art
- The Enlightenment: Neoclassical Art
- Romantic Art
- Virtual Field Trip: Neoclassical and Romantic Art
- Sketchbook
- Making Connections: Comparing and Contrasting Works of Art from Rococo to Romantic

Unit 2: Studio: From Baroque to Romantic
Students apply what they learned in “Unit 1: From Baroque to Romantic” by creating their own artwork.

- Studio 1
- Studio 2
- Studio 3
- Studio 4
- Studio 5

Unit 3: From Realism to Post-Impressionism
Students explore the works of art and architecture from Realism, Impressionism, Post-Impressionism, and other late 19th century styles. They learn how new materials and technology influenced the way artists worked. And they compare and contrast works of Realist, Impressionist, and Post-Impressionist art.

- New Materials and Technology
- Realism and Naturalism 1
- Realism and Naturalism 2
- Sketchbook
- Impressionism 1
- Impressionism 2
- Virtual Field Trip: Realism, Naturalism, and Impressionism
- Post-Impressionism 1
- Post-Impressionism 2
- Late Nineteenth Century Painting and Sculpture
• Art Nouveau
• Virtual Field Trip: Post-Impressionism and Late Nineteenth Century Art
• Sketchbook
• Making Connections: Comparing and Contrasting Realism, Naturalism, Impressionism, and Post-Impressionism

Unit 4: Studio: From Realism to Post-Impressionism
Students apply what they learned in “Unit 3: From Realism to Post-Impressionism” by creating their own artwork.
• Studio 1
• Studio 2
• Studio 3
• Studio 4
• Studio 5

Unit 5: Modern Times
Students explore the works of art and architecture from modern times with styles including Fauvism, Expressionism, Cubism, and Surrealism. Students learn how artists of one style influence artists of another. They discuss various works of representational, abstract, and nonrepresentational art. They also compare and contrast works of modern art.
• Fauvist Art
• Expressionism: Der Blaue Reiter and Die Brucke
• Cubism
• Sketchbook
• Art and Politics
• Virtual Field Trip: Fauvism, Expressionism, Cubism, and Political Art
• Surrealism
• American Scene Painting and Regionalism
• Modernism in Architecture
• Virtual Field Trip: Surrealism, American Scene Painting, and Architecture
• Modernism in Sculpture 1
• Modernism in Sculpture 2
• Abstract Expressionism
• Postmodernism
• Virtual Field Trip: Sculpture, Abstract Expressionism, and Postmodernism
• Sketchbook
• Making Connections: Comparing and Contrasting Modern Art

Unit 6: Studio: Modern Times
Students apply what they learned in “Unit 5: Modern Times” by creating their own artwork.
• Studio 1: Painting
• Studio 2: Painting
• Studio 3: Painting
• Studio 4: Painting
• Studio 5: Painting
• Studio 1: Mixed Media
• Studio 2: Mixed Media
• Studio 3: Mixed Media
• Studio 4: Mixed Media
• Studio 5: Mixed Media

**Unit 7: Semester Review and Test**
Students review key concepts and content from the lessons in this semester, and then take the semester test.

- Semester Review
- Semester Test

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**Personal Finance - Money Matters**

PEIMS Course Title/Number: Money Matters/ 13016200  
Course Code: BUS-030V2TX-G
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

**Course Description:** In this introductory finance course, students learn basic principles of economics and best practices for managing their own finances. Students learn core skills in creating budgets, developing long-term financial plans to meet their goals, and making responsible choices about income and expenses. They gain a deeper understanding of capitalism and other systems so they can better understand their role in the economy of society. Students are inspired by experiences of finance professionals and stories of everyday people and the choices they make to manage their money.

**Course length:** One Semester

**Materials provided by K12:** Online course

**Materials required by the student:** None

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Journalism

PEIMS Course Title/Number: Journalism/ 03230100
Course Code: ENG-010V2TX-K
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: Students are introduced to the historical importance of journalism in America. They study the basic principles of print and online journalism as they examine the role of printed news media in our society. They learn investigative skills, responsible reporting, and journalistic writing techniques as they read, respond to, and write their own news and feature articles. Students conduct interviews, research, write, and design their own publications.

Course length: One Semester

Materials provided by K12: Online course
Materials required by the student: None

Course Scope and Sequence

Unit 1: News Then and Now
Students learn about the function of an independent press in a free society; review important people and events in journalistic history; and learn new technologies that affect how news is disseminated. They explore career opportunities in journalism and the required training or education for those careers.

• Course Introduction
• The Value of News—Then and Now
• Medium and Message

Unit 2: Ethics and the Law
Students learn the essentials of journalistic ethics; the consequences of plagiarism; and the impact of ethical guidelines on standards for professional and student organizations. They learn how to apply legal and ethical journalistic standards to all journalism activities.

• The Media and the Law
• Truth or Consequences
• Freedom and Fairness

Unit 3: Interviewing and Research Skills
Students learn to find story ideas; identify and evaluate sources of information; and use approved conventions to cite sources. They learn interviewing techniques and procedures; and practice appropriate listening and speaking skills.

• Where Reporter’s Find Their Stories
• Follow the Money
• What Makes a Good Question?
• Journalism 2.0

Unit 4: Story Structure
Students learn to organize and structure a story.

- Organizing Parts of a Story
- Introduction to Structure
- On the Trail
- Correspondent's Column
- That's a Wrap

Unit 5: AP Style, Editing, and Proofreading
Students learn how a newsroom is organized; the flow of work in both print and broadcast newsrooms; and how newsroom staffers work collaboratively to produce the news. They learn about the use of visual media to enhance storytelling; common layout and design principles; and typical copyediting symbols. They review common errors in punctuation and grammar and learn to proofread and edit their own work.

- Deadline Drama
- A Picture's Worth a Thousand Words
- Back To the Drawing Board
- Teamwork in the Newsroom
- Back To the Drawing Board

Unit 6: Multimedia and Web Essentials
Students look at the effects of technology on journalism. They learn and experiment with various delivery models of news through new media; learn how appropriate styles of writing are determined by the medium; evaluate how technology has changed both the editorial and business side of the media; and learn about various types of advertising.

- Cruising the Blogosphere
- The Adaptable Writer

Unit 7: Hard News
Students learn how reporters develop and maintain sources; how news is organized within a media outlet; how beats are organized, assigned, and monitored; and the differences between local, national and international news.

- Covering the Globe
- And the Beat Goes On
- On the Trail
- Correspondent's Column
- A Picture's Worth a Thousand Words
- Back To the Drawing Board
- That's a Wrap

Unit 8: Soft News
Students learn the differences between hard and soft news; the characteristics of features, profiles, reviews, and sports stories; and the appropriate styles of leads and story structures for each of these types of stories. They learn how to express their creativity through appropriate writing flourishes with soft news genres and how to fairly critique an artistic work such as a film or book.

- Genres of Journalism
Unit 9: Opinion News
Students learn when it is appropriate to include personal opinions and reactions in a piece of journalism. They explore the use of satire and its relationship to the news; techniques of successful opinion columnists; and persuasive language and rhetorical strategies. They learn to evaluate opinion writing for its effectiveness and sense of fairness.
  * Tell Me What You Really Think
  * Tricks of the Trade

Unit 10: Final Project
Students complete a final project.
  * Making a Difference
  * On the Trail
  * Correspondent’s Column
  * A Picture’s Worth a Thousand Words
  * Back To the Drawing Board
  * That’s a Wrap

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Public Speaking (Speech)
PEIMS Course Title/Number: Communication Applications/ 03241400
Course Code: ENG-020V1TX-K
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: Students are introduced to public speaking as an important component of their academic, work, and social lives. They study public speaking occasions and develop skills as fair and critical listeners, or consumers, of spoken information and persuasion. Students study types of speeches (informative, persuasive, dramatic, and special occasion), read and listen to models of speeches, and prepare and present their own speeches to diverse audiences. Students learn to choose speaking topics and adapt them for specific audiences, to research and support their ideas, and to benefit from listener feedback. They study how to incorporate well-designed visual and multimedia aids in presentations and how to maintain a credible presence in the digital world. Students also learn about the ethics of public speaking and about techniques for managing communication anxiety.

Course length: One Semester

Materials: Online course

Materials required by the student: Student must provide a webcam and recording software

Course Outline
Course Introduction
Public Speaking in Daily Life
Elements of Public Speaking
Effective Listening
The Function of Feedback
The Speaker-Listener Connection
Managing Nervousness
Make a Speech
View, Reflect, and Plan
What is a Narrative?
Public Speaking: Not Public Writing
Stories That Resonate
Know Your Audience
Narratives in Ads & Appeals
Managing Nerves
Make a Speech
View, Reflect, and Plan
The Impact of Personal Narratives
Effective Introductions
Developing Your Personal Narrative
Public Speaking & Self-Presentation
Set Aside Barriers to Listening
Managing Nerves: Helpful Distractions
Make a Speech
View, Reflect, and Plan
Stick to the Script
How to Read, When You Read
Research Your Scripted Reading
Acting & Speaking
One-Sided Conversation
Slow Down!
Make a Speech
View, Reflect, and Plan
Your Voice Represents You
Volume & Pacing in Voice-Only
Preparing for Voice-Only
Your Online Persona
Verbal Clutter
Make a Speech
View, Reflect, and Plan
Beyond the Basics
Guiding Listeners with Transitions
Effective Conclusions
Reliable Resources & Speaker’s Credibility
It’s Not All About You
Simple Visual Aids
Make a Speech
View, Reflect, and Plan
Organization: Why Bother?
Patterns: Spatial & Causal
Patterns: Narrative & Process
Your Audience Needs to Know
An Unspoken Contract
Using Props in a Speech
Make a Speech
View, Reflect, and Plan
Patterns: Topical, Problem-Solution
Patterns That Compare
Effective Slide Presentations 1
Effective Slide Presentations 2
Evaluate Problematic Slides
Live and in Person
Make a Speech
Read, Reflect, and Plan
Speaking to Persuade
Persuading Ethically
Listening Critically
Researching a Persuasive Topic
Change Is a Process
Credibility as a Persuasive Speaker
Managing Nerves
Appeals to the Heart
Appeals to the Mind
Coordinating Content & Goals
Handling Audience Interruptions
Assessing a Speech
Managing Nerves in the Long Run
Music Appreciation

PEIMS Course Title/Number: Music Theory/ 03152700
Course Code: AV-MUSICa-HS-TX08
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: This course introduces students to the history, theory, and genres of music. The course explores the history of music, from the surviving examples of rudimentary musical forms through to contemporary pieces from around the world. The first semester covers early musical forms, classical music, and American jazz. The second semester presents modern traditions, including gospel, folk, soul, blues, Latin rhythms, rock and roll, and hip hop. The course explores the relationship between music and social movements and reveals how the emergent global society and the prominence of the Internet are making musical forms more accessible worldwide. To comply with certain state standards for the arts, a student “performance practicum” is required for full credit each semester. The performance practicum requirement can be met through participation in supervised instrumental or vocal lessons, church or community choirs, community musical performances, or any other structured program that meets at regular intervals and provides opportunities for students to build vocal and/or instrumental skills. Parents or guardians will be required to present their proposed practicum to the students’ teachers for approval, and validate their children’s regular participation in the chosen performance practicum.

Course length: Two Semesters

Materials: Finale Notepad music notation software

Materials required by the student: None

Topic 7.1 Music Logs
Topic 7.2 Jazz: 1860 - 1950
Topic 7.3 Jazz: 1950 - Present
Topic 7.4 Improvisation
Topic 7.5 Musical Theater Film and Television
Topic 8.1 The Blues
Topic 8.2 Gospel Music
Topic 8.3 Soul Music
Topic 8.4 Motown
Topic 9.1 Shared Heritage
Topic 9.2 Folk Music
Topic 9.3 Folk Music
Topic 9.4 Country Music
Topic 10.1 Rock and Roll
Topic 10.2 Important People In Music
Topic 10.3 Rock and Roll Evolution
Topic 10.4 Promoting Music
Topic 11.1 Hip-Hop Music and Culture
Topic 11.2 Important People In Music
Topic 11.3 Other Styles
Topic 11.4 Careers In Music

Skills for Health

PEIMS Course Title/Number: Health/ 03810100
Course Code: OTH-010V1TX-A
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: This course focuses on important skills and knowledge in nutrition; physical activity; the dangers of substance use and abuse; injury prevention and safety; growth and development; and personal health, environmental conservation, and community health resources. The curriculum is designed around topics and situations that engage student discussion and motivate students to analyze internal and external influences on their health-related decisions. The course helps students build the skills they need to protect, enhance, and promote their own health and the health of others.

Course length: One Semester

Materials: Online course

Materials required by the student: None

Topic 1.1 What Is Health?
Topic 1.2 Skills for Health
Topic 2.1 Mirror On the Wall
Topic 2.2 Effective Communication
Topic 2.3 Managing Stress
Topic 2.4 Support for Problems
Topic 3.1 Why Eat Healthfully?
Topic 3.2 Before You Swallow
Topic 3.3 Managing Weight
Topic 3.4 Food Safety
Topic 4.4 Injury Free
Topic 5.1 Alcohol
Topic 5.2 Tobacco
Topic 5.3 Other Drugs
Topic 6.1 Injuries and Risks
Topic 6.2 Be Safe Think Safe
Topic 6.3 Preventing Violence
Topic 6.4 Save a Life or Limb
Topic 7.1 Relationships
Topic 7.2 Marriage and Parenthood
Topic 7.3 Pregnancy and Birth
Topic 7.4 Decisions About Sex
Topic 7.5 Preventing Pregnancy
Topic 8.1 Diseases and Disorders
Topic 8.2 Disease Prevention
Topic 8.4 The Environment

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Master Syllabi for Grade 9-12 Courses

Reaching Your Academic Potential
PEIMS Course Title/Number: Reading Application and Study Skills/ 03270100
Course Code: OTH-040V1TX-K
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

Course Description: Students learn essential academic skills within the context of their learning style, individual learning environment, and long-term goals. This course helps students develop habits for more successful reading, writing, studying, communication, collaboration, time management, and concentration. It also provides insights into how the brain works when they are learning, and ways to maximize its potential.

Course length: One Semester
Materials: Online course
Materials required by the student: None

Course Scope and Sequence
Unit 1: Reaching Your Academic Potential
Students learn how their academic potential is tied to self-awareness, and learn about the role of brain development in improving academic potential during teen years.

- Course Introduction: Reaching Your Academic Potential
- Thinking About Thinking
- You Have Strengths

Unit 2: Your Mind and Your Mindset
Students learn about multiple definitions of intelligence and how mindset and self-efficacy can affect behavior and outcomes. They look at myths regarding learning, achievement, success, college, and career.

- Defining Intelligence
- Urban Legends of Intelligence and Identity
- Choice and Consequence

Unit 3: Learning as Process and Preference
Students learn the fundamental processes of learning within the brain, identify their personal preferences in learning, and learn how those preferences relate to personal preferences in careers.

- How the Brain Learns
- Your Own Learning Preferences
- Learning Preferences Go To Work

Unit 4: Effective Work Habits
Students look at brain functions related to concentration and distraction, look at their own current behavior, and identify strategies to reduce distractions. They also identify characteristics of good work environments and design an improvement plan for their own work environment.

- Do Not Disturb! Avoiding Distractions
- Work Habits for Life
- Design Time: Your Space

**Unit 5: Memory and Studying for Tests**
Students look at how the brain processes information and commits it to memory. They look at the purpose of testing and learn coping skills to reduce test anxiety, and then create a test study plan.

- Memory
- What Testing is For
- Taking a Test? Take a Breath.

**Unit 6: Taking Tests**
Students develop strategies for coping with test anxiety, look at different test-taking techniques appropriate for different kinds of questions and different kinds of tests, and learn about academic integrity.

- Your Strategy for Tests
- Academic Integrity on Tests
- Your Own Test Case

**Unit 7: Making Decisions and Setting Goals**
Students learn how parts of the brain are involved in decision-making and explore the role of critical-thinking, reasoning, and value systems in decision making. They learn the processes for making decisions and setting goals and set a short-term goal identifying milestones and potential barriers. They learn that the choices they make in the short term will set the right path for life beyond high school.

- Making Decisions 101
- Setting Goals 101
- Making Goals Real

**Unit 8: The Career Ahead**
Students learn the specialized functions of the right and left hemispheres of the brain; how an individual's preferred hemisphere may be a factor in career preference; and the psychological, financial, and personal rewards and sacrifices associated with careers. They take the Career Interest Profiler assessment, and investigate some of the careers identified.

- Career Choices and the Brain
- Career Choices and Rewards
- Career Interest Profiler
Unit 9: Focus on Reading
Students learn how the brain functions during reading and apply self-efficacy principles to reading. They identify habits of good readers and develop reading strategies. They read career-oriented materials in order to gain an understanding of the nature, preparation, commitment, and workload associated with specific careers.

- Reading and the Brain
- Reading and You
- Remembering What You Read
- Reading in Action

Unit 10: Focus on Writing
Students learn how the brain functions during writing and apply self-efficacy principles to writing. They review the stages of the writing process, and write a mission statement and career goal.

- Writing and the Brain
- Getting Ready to Write
- The Writing Process
- Writing in Action

Unit 11: Focus on Math
Students learn how the brain understands and manipulates numbers and apply self-efficacy principles to math. They learn the characteristics of successful math students and identify strategies and resources to improve math fluency. Students look at real-world applications of math.

- Math and the Brain
- Succeeding at Math
- Math and the Real World

Unit 12: Communication
Students look at how the brain functions during spoken communication and compare and contrast appropriate communication styles used in different settings. They identify non-verbal factors in communication and strategies for remembering the content of communication.

- Communication and the Brain
- Communication Styles
- Listening and Body Language
- Capturing What You Hear
- You in Front of Others

Unit 13: Research
Students look at different forms and purposes of research and how to determine if resources are valid. They learn how to organize and present their findings, and how to construct proper citations. They apply principles of good research to determine colleges that fit their personal criteria.
• Research and Valid Resources
• Orderly Research Means Usable Research
• Research, Plagiarism, and Academic Integrity
• Research for Your Future

Unit 14: Creativity and Collaboration
Students explore creativity and effective habits for collaborating with others. They learn what it means to be a good “netizen” and analyze various scenarios of teamwork on the job.

• Creativity 101
• Collaboration and Criticism
• Teams and Leaders
• Collaboration and Careers

Unit 15: Academic Potential and You
Students apply fundamental concepts of this course to their life in high school and beyond. They identify short-term and long-term goals, and the specific academic requirements to reach those goals. They also identify strengths they already possess and areas in which they could use improvement. Finally, they identify sources of support that will help them reach their goals and overcome challenges.

• The Test Case Who Is You

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Physical Education

PEIMS Course Title/Number: Physical Education/ PES00052
Course Code: AV-PHYSEDa-HS-TX05
Course Requirements/Prerequisite Requirements: none
Credits to be earned: .5 credit upon completion with grade of 70 or above

**Course Description:** This course combines online instructional guidance with student participation in weekly cardiovascular, aerobic, muscle-toning, and other activities. Students fulfill course requirements by keeping weekly logs of their physical activity. The course promotes the value of lifetime physical activity and includes instruction in injury prevention, nutrition and diet, and stress management. Students may enroll in the course for either one or two semesters, and repeat for further semesters as needed to fulfill state requirements.

**Course length:** One Semester (need 2 semester to graduate)

**Materials:** Online course

**Materials required by the student:** Webcam or some other type of video recording device

**Course Outline**

- **Week 1:** Liability Waiver, Student Info, Mentor Info
  - Getting To Know You Discussion
- **Week 2:** Pre-Assessment
- **Week 3:** Physical Fitness
  - Assignment: Benefits of Fitness
- **Week 4:** Fitness Analysis
  - Assignment: Fitness Analysis
- **Week 5:** Goal Setting
  - Assignment: Fitness Goals
  - Assignment: Begin 12 Week Fitness Log
- **Week 6:** Getting Started
  - Assignment: Starting Discussion
- **Week 7:** FITT Principles
  - Assignment: Exercise Brochure
- **Week 8:** Fitness Components
  - Assignment: 5 Components
- **Week 9:** Target Zone
  - Assignment: Heart Rate
  - Assignment: Submit Unit 1 and 2 Journal Entries
  - Assignment: Submit Fitness Check Up 1
  - Assignment: Submit Fitness Log Weeks 1-4
- **Week 10:** MIDTERM EXAM
- **Week 11:** Posture and Technique
  - Assignment: Posture Quiz
Week 12: Warm Up and Cool Down
  • Assignment: Warm Up Quiz

Week 13: Safety
  • Assignment: Safety Discussion
  • Assignment: Submit Fitness Check Up 2
  • Assignment: Submit Fitness Log Weeks 5-8

Week 14: Diet and Exercise
  • Assignment: Diet Analysis

Week 15: Caloric Needs
  • Assignment: Caloric Needs Activity

Week 16: Weight Management
  • Assignment: Assessing Food Intake
  • Assignment: Submit Unit 3 and 4 Journal Entries
  • Assignment: Submit Fitness Check Up 3
  • Assignment: Submit Fitness Log Weeks 9-12

Week 17: FINAL EXAM
Week 18: Post Assessment
  • Submit Fitness Experiment

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