

**Physics I Honors
Syllabus
2019 - 2020**

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Course Description

The course will be taught as an introductory course consisting of two parts: lectures and supporting laboratories. The course will focus on both conceptual topics and mathematical problems in Physics. The student will be expected to have a strong background in algebra and some basic trigonometry concepts. The students may be exposed to higher order math concepts like Calculus, but will not be tested in these concepts.

Course Materials

The textbook for this course is **Physics Principles & Problems** by Zitzewitz, Haase, Harper and Kilgo (ISBN 978-0-07-665993-7). Additional resources will be provided as needed. Students must bring their journal to every class. A calculator is required for homework and will be provided to students while on campus for class work and tests.

Topics Covered	
<i>Fall Semester</i>	<i>Spring Semester</i>
Introduction: Processes for Physics Investigation	Conservation of Momentum
Kinematics in One Dimension and Graphing Motion	Thermodynamics
Newton's Laws Of Motion	Waves
Two Dimensional Motion	Electrical and Magnetic Forces and Fields
Universal Gravitation	Current Electricity
Conservation of Energy	Atomic, Nuclear, and Quantum Physics

Absences

It is the student's responsibility to report to the instructor the day they return. For excused absences, the student will be given the opportunity to complete work missed during the absence and turn it in for full credit. The time frame for turning in missing work is one school day for each day absent. *Any assignment that was given the last day the student was in class will be due the day after they return.*

Grading Policy

The grade for this course will be calculated as follows:
40% Tests and Projects + 50% Classwork/Laboratory/Quizzes + 10% Homework = 80% of semester grade. The Semester final exams will count for 20% of the semester grade. Extra Credit will be at the discretion of the instructor and based on individual classes.

Students will have 48 hours after a grade is entered into the Teacher Access Center (TAC) system in order to address a grade discrepancy. Grade discrepancies will only be addressed via email unless otherwise discussed and/or announced in class. In addition, students are required to send an appropriate email:

- Type "Grade Discrepancy" in the subject line;
- Include detailed information regarding the assignment(s) and/or grade(s);
- Include student name and class period.

After conducting a thorough research, the instructor will reply to the student's inquiry via email or in person and update the grade if necessary.

Homework

Homework will not be accepted late. Homework will be assigned as necessary and will be due at a date determined by the instructor. Homework will be posted in class and on the class website. The Homework will be turned in online and/or in paper form. The assignment must be neat and presentable; if the assignment is not legible, it will **not** be graded.

Quizzes

Planned and pop quizzes will be given during the first ten minutes of class and will only cover material that was covered previously or new material like assigned reading or watching a video. A quiz missed due to an excused absence will be given to the student when he returns to class. Quizzes fall in the daily grade category, and will be weighted as any daily (classwork) grade or lab grade.

Testing

The test will consist of conceptual problems and mathematical problems. A breakdown of the number of questions and types of questions will be provided to the student before the test. Exams time will last the full period unless accommodations are required per individual student needs per 504, SpEd, etc.

Class Journals

All students are required to keep and maintain a journal that will contain in-class problems, notes, etc.

A composition book can be used as the journal; each journal should have a table of contents, numbered pages and each entry must be dated. These journals are the student's responsibility. *Journal grades fall in the daily grade category, and will be weighted as any daily (classwork) grade or lab grade.*

If the student were to lose or damage their journal, it is their responsibility to replace the journal and all the entries.

Laboratory

All students will take part in all labs. The lab groups will consist of 3 or 4 students unless we are limited by equipment. Students will use a lab journal to record data. The entry will contain your information taken during the lab such as times, measurements and results that will allow you to write the student's report. The students will report findings in either an informal report or a formal report. The informal lab reports will be completed in class and the students will receive direction on desired sections before the lab. **The informal lab will count as a daily grade however each report will be weighted higher than a daily grade.**

The formal lab report will follow a desired format that will consist of the required sections which will be outlined in a rubric that will be handed out at the onset of the lab. The lab report will be typed, contain graphs and tables in the text and have error analysis. **The formal lab report will count as a major project and be weighted the same as a test grade.** It is essential to attend all classes scheduled for labs. If the student were to miss a lab due to an excused absence, the student will have the opportunity to complete the lab during raptor time, lunch, before and after school.

Absence/Make-up Work

Please contact the teacher ASAP upon returning to school. *It is the student's responsibility to make arrangements to obtain all agendas, class notes, assignments, etc. missed while absent.*

Missing Assignment/Late Work

All work is due to the instructor at the time it is asked for in class. The following assignments will NOT be accepted late:

- Daily Work
- Tests
- Quizzes
- Science Labs

Projects may be accepted up to 2 days late. Projects turned in late will incur the following deductions:

1. Projects turned in on the due date, at any time after the teacher collects the assignment, will be deducted 10 points.
2. Projects turned in 1 school day late (i.e., the very next school day), will be deducted 10 points.
3. Projects turned in 2 school days late will be deducted 20 points.
4. Projects turned in more than 2 school days late will receive a ZERO.

Make-Up Test Policy (Different from Retest Policy)

If absent on day of test, it is the student's responsibility to contact his/her teacher upon returning to school, and make arrangements to complete the exam(s) missed. Tests must be made up within three school days from the day it was originally given. The student is solely responsible to acknowledge test dates which are provided by the teacher. Make-up tests will cover the same material but may be different in format from the original test.

Retest Policy

Any student scoring 69% or below on a test will be permitted to retake that test after fulfilling the retest requirements established by the teacher. **It is the student's responsibility to submit to the teacher a request for retest by email within five days of the posted grade.** All retests will cover the same material but may be different in format from the original exam. *The highest potential grade earned on a retest will be a 75.*

Science Department Requirements

- If you want a retest then come another afterschool session to retest at a designated time chosen by the instructor.
- Email the instructor requesting the retesting. MUST CC your parents. If they don't have email then parent's signature must be included and dated.
- *The highest potential grade earned on a retest will be a 75.*
- **Projects/Labs cannot be redone!!!**
- **NO RETAKES ON END OF SEMESTER OR FINAL EXAMS!!!!!!** *All make-up test will be administered AFTER SCHOOL. All students MUST attend a reteach session along with other requirements in order to retest.*

Laboratory Safety and Dress Code

Students must wear "Closed-Toe" shoes for all lab activities (see Lab Safety Contract). If you are not wearing proper footwear, you may not be allowed to participate in the laboratory activity.

General requirements, as per OSHA 1910.136(a): *"The employer shall ensure that each affected employee uses protective footwear when working in areas where there is a danger of foot injuries due to falling or rolling objects, or objects piercing the sole, and where such employee's feet are exposed to electrical hazards."*

Tutoring

Tutoring will be held at times agreed upon by the teacher and students. These times will be clearly posted and will be determined by availability of both the students and teacher. These times and days are subject to change throughout the semester.

Class Website

The class website, <http://swschoolworld.judsonisd.org/webpages/...../>, will provide the students and parents with important information about the class such as lecture notes, weekly assignments, upcoming test dates, lab dates, tutoring times, etc.

Class Rules

- The classroom rules are simple and are meant to bring out the best in the student.
- Be prepared for class.
- Be in your seat, have your journal ready.
- Check to see if you need to sharpen your pencil or borrow a pencil.
- Be respectful to everyone and everything in the classroom.
- No personal electronics unless being used for a lesson.
- No loud or excessive talking.
- All questions are valid, do not make fun of other people's questions or comments
- Be neat.
- Clean up after yourself before you leave the class.
- Return Calculators to holder at end of class.
- Take pride in your homework, don't turn in messy work.
- Be honest.
- No cheating-zero tolerance.
- Write Honor Code Pledge on all pledged assignments.