MVLA
2024-25
COURSE INFORMATION SHEET

Course Title: AP Physics 1
School: Los Altos High School
UC/CSU requirement: Yes / Yes
Textbook and/or other learning resources: Openstax College Physics 2e

Course Description/Student Learning Outcomes:

The purpose of this course is to teach students about classical Newtonian mechanics and to prepare them to successfully pass the College Board's Advanced Placement Physics 1 exam. The curriculum for this course is determined by the College Board. Students will learn to build mathematical models of the physical universe using concepts, principles in physics, algebra and trigonometry. Students will learn to translate between multiple representations of physical principles. Students will learn to design experiments, collect and analyze data to confirm a hypothesis. Students will learn to make qualitative statements supported by quantitative evidence.

Course Outline/Units of Study/CTE Industry Standards(If applicable to your course):

The AP Physics 1 course studies kinematics, Newton's laws of motion, work, energy, power, linear momentum, torque, rotational dynamics, energy & momentum of rotating systems, oscillations and fluids.

Assessment and Grading (BP 5121 / AR 5121): To ensure that every student has an equal opportunity to demonstrate their learning, the course instructors implement aligned grading practices and common assessments with the same frequency.

1. **Grading categories and their percentage weights:**
   Tests & Quizzes = 45%
   Laboratory = 30%
   Classwork & Homework = 15%
   Semester Final = 10%

2. **Achievement evidence collected within each grading category:**
   Tests and quizzes are formatted in free response and/or multiple choice questions.
   Laboratory work combines pre-lab mathematical models with data collection and analysis using spreadsheets.
   Classwork and Homework are formatted in free response and multiple choice questions.
   The final exam is formatted as a multiple choice exam using the College Board's AP Classroom.

3. **Grading scales:**
   Letter grades are assigned based on overall percentage:
   A = 100-90%, B = 89.9-80.0%, C = 79.9-70.0%, D = 69.9 – 60.0%, F < 59.9

4. **Homework/outside of class practices (AR 6154):**
   Students should dedicate 60 - 75 minutes between each class period in a state of academic mental focus, not distracted by external stimulus, working towards mastery in physics by completing homework assignments. To maximize credit students should follow the Solution- Guidelines

5. **Excused absence make-up practices (Education Code 48205(b)):**

6. **Academic integrity violation practices (LAHS Academic Integrity Policy):**
   Students are encouraged to work together on classwork, homework and lab work to share ideas. However, every student should turn in their own work, not work copied or taken from another student. Lab groups might have the same data, but the programming of the spreadsheet and written work should be unique to each student.

7. **Late work practices:**
   Unexcused late work is not accepted for credit.

8. **Revision practices:**
   See the Correct To Learn Portfolio.

9. **Extra credit practices:**
   Students may have their semester grade increased up to 2.0 % by maintaining a Correct To Learn Portfolio.

10. **Additional grading practices:**

11. **LMS Used:**
    Google Classroom

Instructors' email addresses:

joe.manildi@mvla.net adam.randall@mvla.net

Additional information:

Students should:

- organize their work in a 3 ring binder, folder or notebook.
- bring a scientific calculator to class everyday.
- write in pencil, not permanent ink.
- use self control to not use digital devices during class for non academic purposes.
- be prepared to be in class for the entire instructional period.
- try to learn from their experience with lessons, labs, classwork and homework such that they remember what they have learned for the rest of their lives.
- use the restroom before or after class.
- not eat during class.
- not bring food or drinks into the classroom.
- be respectful of their peers, teachers and classroom materials.