

Fairfield Ludlowe High School - Fairfield Warde High School

AP Physics C

Insert Teacher Name

Insert Room Number

Insert Full Year/Semester

Insert Period

Insert Email Address

COURSE DESCRIPTION

AP Physics C is a two-semester, calculus-based, college-level physics course that addresses both Mechanics and Electricity and Magnetism. The Mechanics portion of the course will cover kinematics, Newton's laws of motion; work, energy, and power; systems of particles and linear momentum; circular motion and rotation; oscillations; and gravitation. The Electricity and Magnetism topics covered include electrostatics; conductors, capacitors, and dielectrics; electrical circuits; magnetic fields; and electromagnetism. Introductory differential and integral calculus is used throughout the course.

COURSE ENDURING UNDERSTANDINGS

BIG IDEA 1: CHANGE Interactions produce changes in motion.BIG IDEA 2: FORCE INTERACTIONS Forces characterize interactions between objects or systems.BIG IDEA 3: FIELDS Fields predict and describe interactions.BIG IDEA 4: CONSERVATION Conservation laws constrain interactions

UNITS OF STUDY

- Unit 1: Kinematics
- Unit 2: Newton's Laws of Motion
- Unit 3: Work, Energy, and Power
- Unit 4: Systems of Particles and Linear Momentum
- Unit 5: Rotation
- Unit 6: Oscillations
- Unit 7: Gravitation
- Unit 8: Electrostatics
- Unit 9: Conductors, Capacitors, and Dielectrics
- Unit 10: Electric Circuits
- Unit 11: Magnetic Fields
- Unit 12: Electromagnetism

COURSE POLICIES AND REQUIREMENTS

GRADING

Cumulative/In-Progress Grade:

- 10% of the grade will be based on formative assessments, homework completion, or behavior (see FPS BOE <u>Policy 6154</u>AR)
- 90% will be based on summative assessments based on a minimum of eight assessments (see FPS BOE Policy 6146AR)

End-of-the-Year Grade:

- 80% of the overall course grade will reflect the student's mastery of course content and skills during the school year through the Cumulative/In-Progress Grade.
- 10% of the End-of-the-Year course grade will be based on the Mid-Year Assessment
- 10% of the End-of-the-Year course grade will be based on the Final Assessment.

Grade Reporting

- All grades will be communicated through Infinite Campus
- Summative assessment results will be reported back to the student within ten school days from the date of submission or the due date.

Guidelines for Late Work (see FPS BOE Policy 6146AR):

• Late work will be accepted for both summative and formative tasks within a defined timeline agreed upon between the student and the teacher

The total points may be reduced as a penalty for late work

MATERIALS:

Course Text: Knight, <u>Physics for Scientists and Engineers</u> (ie. Textbook, Binder, Calculator, Highlighters)

EXPECTATIONS OF STUDENTS:

EXTRA HELP:

Insert Course Expectations Here