

# PHYSICS, ASSOCIATE IN ARTS DEGREE

**Banner Code:** 2\_AA\_PHYS

**Control Number:** 18358

**Financial Aid Eligible**

The Associate in Arts Degree in Physics prepares students for further study in physics or related physical science disciplines. It also provides a background in physics that includes skills appropriate for entry-level employment in science-related industries or laboratories. Coursework includes instruction in all of the main areas of classical physics (mechanics, waves, sound, thermodynamics, electromagnetism, and optics), exposure to some of the more modern concepts of physics (including special relativity, atomic and nuclear physics), and prepares students to think critically and apply reasoning skills to analyze real world situations.

## Program Level Learning Outcomes

Upon completion of this program, students will be able to:

1. Explain the basic principles and concepts of physics.
2. Use these basic principles and concepts to solve problems in the various areas of physics.
3. Explain the importance of physics both historically and as an active, unfinished area of work in which many people today are actively engaged.
4. Describe the methods of physicists.

Review Graduation Requirements (<https://catalog.cccd.edu/golden-west/graduation-requirements/associate-degree/>), General Education (<https://catalog.cccd.edu/golden-west/general-education/>), and Program Maps (<https://programmap.goldenwestcollege.edu/academics/>).

Course	Title	Units
<b>Required Courses</b>		
PHYS G185	Calculus Based Physics: Mechanics	4
PHYS G280	Calculus Based Physics: Electricity/ Magnetism	4
PHYS G285	Calculus Based Physics: Modern	4
MATH G180	Calculus 1	4
MATH G185	Calculus 2	4
<b>Major Total</b>		<b>20</b>
<b>GE Pattern (Local, CSU GE-Breadth, or IGETC)</b>		<b>18-39</b>
<b>Total Units</b>		<b>60</b>