

2024- 2025

Physics Associate in Science Degree for Transfer

Complete the following program of study. (Major C.3664.AS-T) Major requirements (25 units minimum).

A physics student acquiring the Associate in Science Degree in Physics for Transfer (AS-T in Physics) generally transfers to a four-year institution to complete a bachelor's degree. Physics graduates at the bachelors' level are qualified for a variety of technical positions with government or industry, and they are also well prepared to enter a graduate program in any other science or in engineering. Physics majors are welcomed into professional programs such as law, business, or medicine. Teaching at the high school level with a bachelor's degree or at a two-year college with a masters' degree are additional career options for the physics major. For the physicist who obtains the Ph.D., experimental or theoretical research and/or teaching at the university level or basic research in government or industry are options for gainful employment.

Many four-year colleges and universities offer bachelor's degrees in physics. There are some systems and institutions that offer the advanced degrees in physics. Requirements vary from system to system and from campus to campus for each level of degree. The advice of a counselor and consultation of institutional catalogs for specific information is highly recommended.

Name: _____ Student ID: _____ Date: _____

Course Overview and Selection

Required Core:

Course	Course Description	Units	C - ID	Completed	In Progress	Planned
PHYS 4A	Physics for Scientists and Engineers	4	PHYS 205 or PHYS 205S			
PHYS 4B	Physics for Scientists and Engineers	4	PHYS 210 or PHYS 200S			
PHYS 4C	Physics for Scientists and Engineers	4	PHYS 215 or PHYS 200S			
MATH 5A	Math Analysis I	5	MATH 210, 211 or 900S			
MATH 5B	Math Analysis II	4	MATH 220 or 900S			
MATH 6	Math Analysis III	5	MATH 230 or 900S			

Total units for major does not include required general education or pre-requisite courses.

Program Learning Outcome:

1. Apply algebra, trigonometry, and/or first-year calculus to solve physical problems within the topics covered in class.
2. Apply dimensional analysis to determine the units for an unknown quantity or to check the validity of equations.
3. Distinguish between important physical observables when they are measured or calculated.
4. Correctly report the units of an observable when it is measured or calculated.

To obtain the Physics Associate in Science Degree for Transfer, students must complete the following requirements:

1. Completion of 60 semester units or 90 quarter units that are eligible for transfer to the California State University, including both of the following:
 - a. The Intersegmental General Education Transfer Curriculum (IGETC) or the California State University General Education – Breadth requirements.
 - b. A minimum of 18 semester units or 27 quarter units in a major or area of emphasis, as determined by the community college district.
2. Obtainment of a minimum grade point average of 2.0. Associate Degrees for Transfer (ADTs) also require that students must earn a "C" grade or better in all courses required for the major or area of emphasis.

Notes:

- Certification of either the California State University General Education Breadth (CSU GE-Breadth) or the Intersegmental General Education Transfer Curriculum (IGETC-CSU version) is required. CSU GE- Breadth and IGETC advising sheets are available in Student Services, AC2-133 or online at [CCC GE \(CSU/UC\) GE and Major Sheets](#)
- Courses may double count in the major and CSU GE-Breadth or IGETC.

To see what CSU campuses accept this degree go to www.icangotocollege.com.

Faculty Advisors: Abbott, Inan.