

Associate in Science for Transfer Degree: Physics 2.0

The Student Transfer Achievement Reform Act (Senate Bill 1440, now codified in California Education Code sections 66746-66749) guarantees admission to a California State University (CSU) campus for any community college student who completes an “associate degree for transfer”, a newly established variation of the associate degrees traditionally offered at a California community college. The Associate in Arts for Transfer (AA-T) or the Associate in Science for Transfer (AS-T) is intended for students who plan to complete a bachelor's degree in a similar major at a CSU campus. Students completing these degrees (AA-T or AS-T) are guaranteed admission to the CSU system, but not to a particular campus or major. In order to earn one of these degrees, students must complete:

1. Completion of 60 semester units or 90 quarter units that are eligible for transfer to the California State University, including the California General Education Transfer Curriculum (Cal-GETC)
2. Obtainment of a minimum grade point average of 2.0. Associate Degrees for Transfer also require that students must earn a C, or Pass (P), or better in all courses required for the major or area of emphasis. This degree may not be the best option for students intending to transfer to a particular CSU campus or to university or college that is not part of the CSU system.

Students should consult with a counselor when planning to complete the degree for more information on university admission and transfer requirements. At the time of catalog publication, a student may earn an AS-T in Physics 2.0. Additional majors are being developed. Please see a counselor or visit <http://www.canyons.edu> for more information.

Degree Student Learning Outcome:

Students will be able to:

- Reason conceptually and logically about physical phenomena using scientific models involving the fundamental physics principles of kinematics, kinetics, energy conservation, electromagnetism, thermodynamics, optics, and modern physics.

- Utilize appropriate instruments to measure and examine examples of physics phenomena and relate the results of experimental data to the concepts discussed in the lecture portion of the class.

Program Requirements:

Units Required: 38 - 39

	Units:
PHYSIC-220 Physics for Scientists and Engineers: Mechanics of Solids and Fluids	4.0
PHYSIC-221 Physics for Scientists and Engineers: Electricity, Magnetism, and Waves	4.0
PHYSIC-222 Physics for Scientists & Engineers: Thermodynamics, Optics, Relativity & Modern Physics	4.0
MATH-211 Calculus I	5.0
or	
MATH-211X Calculus I with Support	6.0
MATH-212 Calculus II	5.0
MATH-213 Calculus III	5.0
MATH-214 Linear Algebra	4.0
MATH-215 Differential Equations	4.0

Plus three units from the following:

CMPSCI-111	Introduction to Algorithms and Programming/Java	3.0
CMPSCI-235	C Programming	3.0
CMPSCI-236	C++ Object Oriented Programming	3.0