

MATHEMATICS 2.0 - ASSOCIATE IN SCIENCE FOR TRANSFER

Mathematics has been an important academic discipline in its own right for over 2500 years. In addition, mathematics provides the foundation for the study of physical, biological, health, and computer sciences, engineering, statistics, economics, and many other disciplines. Mathematics graduates are employed as computer programmers, actuaries, data analysts, financial analysts, operations researchers, and educators. Others continue their studies and pursue advanced degrees in business, medicine, and law.

The Associate in Science in Mathematics 2.0 for Transfer (AS-T) degree is intended for students who plan to complete a baccalaureate degree in Mathematics or a related field of study at a California State University. Students who complete this degree are guaranteed admission to the CSU system, *but not to a particular campus or major*. Students transferring to a CSU campus that accepts the AS-T will be required to complete no more than 60 semester units after transfer to earn a baccalaureate degree.

To be awarded the Associate in Science in Mathematics 2.0 for Transfer degree, students must:

(1) Complete 60 semester units or 90 quarter units which are eligible for transfer to the California State University (CSU) system, including both of the following:

- (A) The California General Education Transfer Curriculum (Cal-GETC)
- (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) Obtain a minimum grade point average of 2.0.

While a minimum of 2.0 is required for admission, some majors may require a higher GPA. Please consult with a counselor for more information.

Associate Degrees for Transfer (ADTs) also require that students earn a "C" or better in all courses required for the major or area of emphasis. A "P" (Pass) grade is also an acceptable grade for courses in the major if the course is taken on a Pass/No Pass basis.

Program Learning Outcomes

- Develop creative and logical solutions to various abstract and practical problems.
- Use mathematics to model and solve applied problems in engineering and science.
- Demonstrate didactic reasoning to construct elementary proofs to theorems.

Course	Title	Units
Core Requirements: Select Option 1 or Option 2		
<i>Option 1:</i>		
MATH 071	Calculus I With Analytic Geometry	5
MATH 072	Calculus II With Analytic Geometry	5
MATH 073	Multivariable Calculus	5
MATH 078	Differential Equations	4
MATH 079	Linear Algebra	3
<i>Option 2:</i>		

MATH 066	Calculus I Late Transcendentals for STEM	4
MATH 067	Calculus II Late Transcendentals for STEM	4
MATH 073	Multivariable Calculus	5
MATH 078	Differential Equations	4
MATH 079	Linear Algebra	3
List A: Select one course from the following:		3-4
COMSC 041	Programming Concepts and Methodology I	
COMSC 075	Computer Science I: Introduction to Program Structures	
PHYS 007A	Calculus-Based General Physics for Scientists and Engineers - I	

Total Requirements

Course	Title	Units
Major Requirements		23-26
General Education Requirements (Cal-GETC) ¹		34
Transferable Electives (as needed to complete 60 units)		
Total Units		60

¹ *Some GE courses may be double-counted within the major and will reduce the number of units. General electives may be needed to reach 60 units. Please consult with a counselor to determine which courses are applicable.*