

# Science, Technology, Engineering, and Mathematics Career and Academic Pathways (CAPs)

# **Program Map: Associate of Science for Transfer for Mathematics (IGETC)**

Total number of units: 61-65 units Top Code/Academic Plan: 1701.00 Updated on February 27, 2022

Semester 1	Course Code	Course	Units	Notes	Advising Notes
Program/GE Course	MATH 261	Calculus I	5	Prerequisite MATH 241 (or 241S) and 260 (or 260S). May be waived by the Math department dependent on high school coursework. Advisory: take MATH 241/241S the summer prior to term 1 for review and/ or preparation.	Main campus; all day options.
GE Course	ENGLISH 101	College Reading and Composition I	3	Meets IGETC Area 1A.  This course has sections that are part of the Honors Program. Check the current catalog for the section number(s). To apply for admission to the Honors Program, please visit the ELAC Counseling Center. For additional information about the Honors Program, please visit the ELAC Honors Program website or contact Dr. Bermudez at <a href="mailto:bermudn@elac.edu">bermudn@elac.edu</a> .	This course may have sections that include a low cost (LCT) or no cost textbook (ZTC). Check the current catalog for the section number(s). You can search for classes in the ELAC and LACCD Schedule of Classes under "Class Search Type" as "Zero Textbook Cost" or "Low-Cost Textbook Classes."
GE Course	COMM 101	Public Speaking	3	COMM 101 recommended, but is a CSU requirement ONLY, thus may not be needed for those only interested in applying to UC - see counselor for details; this course meets IGETC Area 1C.	
GE Course	IGETC Area 5B		3 - 5	Some transfer institutions may have specififc science recommendations or requirements; be sure to see a counselor to verify.	

### Total Units 14 to 16

Intersession	Course Code	Course	Units	Notes	Advising Notes
Program/GE Course	MATH 227 /227S	Statistics	4	To fulfill the requirements of the AS-T, you must take one of MATH 270 or 275. If you do not take both, then you need MATH 227 / 227S or PHYSICS101.	
				MATH 227 has sections that are part of the Honors Program. Check the current catalog for the section number(s). To apply for admission to the Honors Program, please visit the ELAC Counseling Center. For additional information about the Honors Program, please visit the ELAC Honors Program website or contact Dr. Bermudez at <a href="mailto:bermudn@elac.edu">bermudn@elac.edu</a> .	

# Total Units 4

Semester 2	Course Code	Course	Units	Notes	Advising Notes
Program/GE Course	MATH 262	Calculus II	5		Main campus; all day options.
GE Course	ENGLISH 102 or ENGLISH 103	College Reading and Composition II or Composition and Critical Thinking	3	Either of these will meet IGETC Area 1B.  This course has sections that are part of the Honors Program. Check the current catalog for the section number(s). To apply for admission to the Honors Program, please visit the ELAC Counseling Center. For additional information about the Honors Program, please visit the ELAC Honors Program website or contact Dr. Bermudez at <a href="mailto:bermudn@elac.edu">bermudn@elac.edu</a> .	This course may have sections that include a low cost (LCT) or no cost textbook (ZTC). Check the current catalog for the section number(s). You can search for classes in the ELAC and LACCD Schedule of Classes under "Class Search Type" as "Zero Textbook Cost" or "Low-Cost Textbook Classes."
GE Course	IGETC Area 5A		3 - 5	Recommend: PHYSICS 011 (4 unit class) as a Prerequisite to PHYSICS 101 or Challenge with Physics Dept. This course will also meet IGETC Area 5C, as it includes the lab section.	

Semester 2	Course Code	Course	Units	Notes	Advising Notes
GE Course	IGETC Area 3A		3		

#### Total Units 14 to 16

College level English and Math should be completed within the first year of study. Follow placement guidance in the application process or meet with a counselor to find the right course level.

Intersession	Course Code	Course	Units	Notes	Advising Notes
GE Course	IGTEC Area 3A or 3B		3	Students will need 9 units (typically 3 courses) from Area 3, thus at least one needs to be from 3A and one needs to be from 3B; see a counselor for more details.	

#### Total Units 3

Semester 3	Course Code	Course	Units	Notes	Advising Notes
Program/GE Course	MATH 263	Calculus III	5		Main campus; all day options.
GE Course	IGETC 3B		3	International students must take HISTORY for UC grad requirement; will also meet CSU grad requirement IGETC Area 3B or C. The department recommends Political and Social History of the United States.	
GE Course	IGETC 4		3		
GE Course	IGETC 4		3		

#### Total Units 14

Semester 4	Course Code	Course	Units	Notes	Advising Notes
Program/GE Course	MATH 270	Linear Algebra	3	Pre-requisite is Calculus II; To fulfill the requirements of the AS-T, you must take one of MATH 270 or 275. If you do not take both, then you need MATH 227 / 227S or PHYSICS 101.	
Program/GE Course	MATH 275	Ordinary Differential Equations	3	Pre-requisite is Calculus III; To fulfill the requirements of the AS-T, you must take one of MATH 270 or 275. If you do not take both, then you need MATH 227 / 227S or PHYSICS 101.	
GE Course	POL SCI 001	or any other course in IGETC Area 4	3	POL SCI 001 neets CSU graduation requirments.  This course has sections that are part of the Honors Program. Check the current catalog for the section number(s). To apply for admission to the Honors Program, please visit the ELAC Counseling Center. For additional information about the Honors Program, please visit the ELAC Honors Program website or contact Dr. Bermudez at bermudn@elac.edu.	This course may have sections that include a low cost (LCT) or no cost textbook (ZTC). Check the current catalog for the section number(s). You can search for classes in the ELAC and LACCD Schedule of Classes under "Class Search Type" as "Zero Textbook Cost" or "Low-Cost Textbook Classes."
Electives			3	Course does need to be at least CSU transferable to meet the 60 minimum units.	

# Total Units 12

#### **Degree Path and Requirements:**

This is a degree for students intending to transfer to CSU. This may also help you meet requirements to a UC, please see a counselor.

# **Department Advising Notes:**

This map is a suggested term-by-term sequence of courses to complete the program in a recommended time frame. This is an efficient and recommended plan, but actual plans may vary by individual student need. This map cannot replace a meeting with <u>counselors</u>.

# **Program Description**

The Associate in Science Degree for Mathematics for Transfer is designed to award an Associate in Science degree to those who are intending to transfer to the California State University system in mathematics. The Degree is intended to meet the needs of mathematics students who do not require significant coursework in the sciences to complete their degree. The requirements were chosen solely to meet the requirements for the Transfer Model Curriculum in Mathematics and may not be adequate preparation for transfer to insitutions outside of the California State University System.

## **Career and Transfer Opportunities**

The degree program offers training leading to career in research, education, business, industry, and government. In addition, many areas, such as the physical and biological sciences, engineering, business, finance and economics depend upon the use of mathematics in developing solutions to practical problems. Transfer after completing this program and the future jobs that graduates can secure after completing their 4 year or graduate level degree. Visit the <a href="Iransfer Center">Iransfer Center</a> for transfer and guaranteed transfer information, which varies based on transfer college. Insert hyperlink. Make <a href="mailto:an appointment">an appointment</a> with a counselor for transfer information. Students can visit <a href="Career and Job Services">Career and Job Services</a> for career counseling and further exploration. Check out these <a href="Mathematics">Mathematics</a> information. Students can visit <a href="mailto:careers">Career and Job Services</a> for career counseling and further exploration. Check out these <a href="Mathematics">Mathematics</a> information. Students can visit <a href="mailto:careers">Career and Job Services</a> for career counseling and further exploration. Check out these <a href="mailto:m

#### **Youtube Videos**

<u>Mathmatician Career Video</u> <u>Statistician Career Video</u>

# **Program Map**

A suggested sequence of classes to complete a degree, certificate, or program of study. Students should consult an academic counselor for variations to this plan based on part-time or full-time status, transfer plans, pre-requisites needed, etc.

# **Prerequisite Course**

A specific course that must be completed before advancing to the next course.

Check the online catalog at elac.edu for the latest and most accurate information.

#### Contact

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