MATHEMATICS DEGREE REQUIREMENTS

• Core Requirements for All Mathematics •

A. Math 2A____ 2B____ 2D/H2D____
3A____ 3D____ 13____

B. Math 9 ____

C. *One of the following sequences:*
• Chem 1A____B____C____; **or**
• Physics 7C____D____E____

Upper-div: Math 120A____ 121A____
130A____ 140A____ 140B____

• No specialization/concentration (Pure Mathematics) •

Core requirements for all Mathematics Majors plus:
Math 2E/H2E____
Math 120B____ 121B____ 147____
Five additional 4-unit math courses (100-189):
____ ____ ____ ____ ____

• Specialization in Mathematical Biology[1] •

Core requirements for all Mathematics Majors plus:
Math 2E/H2E____

*Replace **Item C** in the Core Requirements with the following:*
• Bio Sci 93____ 94____ **AND**
• *Two courses selected from:*
  Chem 1A____ 1B____
  Bio Sci 97____
  Physics 2____ 7C____ 7D____

A. *All of the following:*
Math 105A/LA____ 105B/LB____
112A____ 112B____ 113A____ 113B____
113C____ **OR** 115____

B. *Two elective courses (at least one from Math (100-189). The second may be either upper-division Math or a 4-unit upper-division Biological Sciences course with advanced approval from the advisor for this specialization.*
Elec. #1._____ Elec. #2._____

• Concentration in Data Science[1] •

Core requirements for all Mathematics Majors plus:
Math 2E/H2E____

*Replace **Item C** in the Core Requirements with the following:*

Math 10____ Stats 7____ Physics 7C____

A. *All of the following:*
Math 105A____ 105B____ 121B____
130B____ 110A____ 110B____

B. *Three elective courses from[2]:*
Stats 110____
I&C Sci 105____
Math 115____ 117____ 118____ 130C____
133A____ 133B____ 140C____
162A____ 162B____ 173A____ 173B____
175____ 176____
CompSci 171____ 172B____ 177____
178____ 179____ 183____
184A____ 184C____

• Specialization in Applied and Computational Mathematics[1] •

Core requirements for all Mathematics Majors plus:
Math 2E/H2E____

A. *All of the following:*
Math 105A/LA____ 105B/LB____
112A____ 112B____ 115____ 121B____

B. *Three elective courses from:*
Math 107/107L____ 112C____ 117____
118____ 130B____ 130C____
133A____ 133B____ 140C____ 176____

Two approved upper-division courses in an area of application outside of Mathematics. Approval must be obtained in advance from the advisor for this specialization. The student is responsible for satisfying any prerequisites for these courses.

Elec. #1._____ Elec. #2._____

• Specialization in Mathematics for Education[1] •

Core requirements for all Mathematics Majors plus:
Math 8____
Math 105A/LA____ 120B____
130B____ 150____ 161____
180A____ 184____ 184L____ **AND**
One additional math course numbered 100-189: ____

Physical Sciences 5____ 105____

• Concentration in Mathematical Finance[1] •

Core requirements for all Mathematics Majors plus:

A. *All of the following:*
Math 2E/H2E____
Math 130B____ 133A____ 133B____

B. *Three elective courses from:*
Math 105A/LA____ 105B/LB____ 107/L____
112A____ 112B____ 112C____
115____ 117____ 118____ 121B____
130C____ 133C____ 140C____ 176____

C. *Eight required economics courses:*
Econ 20A____ 20B____
Econ 105A____ 105B____ 105C____
Econ 122A____ **OR** 123A____
Econ 132A____
Econ 134A____

• Concentration in Mathematics for Education/Secondary Teaching Certification•

Admission requires approval in advance. The admission process begins with completing an Intent form at the CalTeach Resource and Advising Center.

Core requirements for all Mathematics Majors plus:
Math 8____

A. *All of the following:*
Math 105A/LA____ 120B____
130B____ 150____ 161____ 180A____
184____ 184L____ **AND**
One additional math course numbered 100-189: ____

B. *All of the following:*
Phy Sci 5____ 105____

Chem/Physics 193____

Educ 55____ 109____ 143A____ 143B____
148____ **AND**
two quarters of Educ 158____ ____

This **concentration** allows students to earn a bachelor's degree and complete the required coursework and field experience for a California Preliminary Single Subject Teaching Credential at the same time.

NOTE: Students may pursue either the concentration in Mathematics for Education/Secondary Teaching Certification **OR** the specialization in Mathematics for Education, but not both.

• [1]For ALL Specializations/Concentrations EXCEPT CalTeach •
http://www.math.uci.edu/undergraduate-studies/concentrations-and-specializations
An application should be completed at least 3 quarters prior to graduation. **Admission into a concentration or specialization is not guaranteed.** The department may limit the number of students admitted into this concentration during impacted years.
• [2]Three elective courses from list provided. At least one of the electives must be from outside the Mathematics department.

Effective Fall 2019