# BACHELOR OF ARTS IN MATHEMATICS: CONCENTRATION IN TEACHING – MATH ASSOCIATE DEGREE FOR TRANSFER (ADT) ROADMAP

This is a sample pathway for students who transfer to San Francisco State University in the current Bulletin year with an AS-T in Mathematics. At least 12 units in the major (MATH 226, MATH 227, MATH 228) and all lower-division GE requirements have been satisfied. Additional units in the major may have been satisfied. Check with a major advisor about the most appropriate course sequence. **Degree completion guaranteed in 60 units; see the Associate Degree for Transfer (ADT) section for more information (http://bulletin.sfsu.edu/undergraduate-admissions/transfer-students/)**.

## To Do at SF State:

Enough total units to reach 120 minimum for graduation; 30 units minimum at the upper-division level; to include the following:

#### University-Wide Requirements: 9-15 Units

- American Institutions (0-6 units): US History, US Government, California State and Local Government requirements if not taken before transfer.
- · Upper-Division GE (9 units): Courses required for the major may double-count if approved for UD GE.
- Students entering this major with the AS-T in Mathematics are not required to fulfill SF State Studies requirements.
- Complementary Studies: Consult with a department advisor on how transfer units and/or SF State units can be applied to ensure degree completion within 60 units.

### Mathematics for Teaching Major: 30-33 Units

MATH 226, MATH 227, and MATH 228 met in transfer.

- Core (15 units)
- Concentration (15–18 units)
- · Students must meet with a major advisor during their first semester.

#### University Electives: 12 or More Units

Depends on course choices made at the community college, how transferred units are applied to the requirements above, and course choices at SF State. Some courses may meet more than one requirement, e.g., both in UD GE and the major.

Course	Title	Units
First Semester		
Select One (Major Core):		3
MATH 209	Mathematical Computing	
CSC 101	Introduction to Computing	
CSC 309	Computer Programming	
MATH 301GW	Exploration and Proof - GWAR (Major Core)	3
MATH 325	Linear Algebra (Major Core)	4
GE Area UD-B: Upper-Division Physical and/or Life Sciences		3
University Elective		3
	Units	16
Second Semester		
MATH 324	Probability and Statistics with Computing (Major Concentration)	3
MATH 350	Geometry (Major Concentration)	3
Select One:		4

CSC 215

Intermediate Computer Programming (if CSC 101 taken)

Real Analysis I (Major Core)   Capstone Course for Secondary Teachers of Mathematics (Major Concentration) 2   Mathematics in the Middle School Classroom   Math in Middle Schools II   Math in Middle School III   Units	3 3 3 4 13
Capstone Course for Secondary Teachers of Mathematics (Major Concentration) <sup>2</sup> Mathematics in the Middle School Classroom Math in Middle Schools II	3
Capstone Course for Secondary Teachers of Mathematics (Major Concentration) <sup>2</sup> Mathematics in the Middle School Classroom Math in Middle Schools II	3
Capstone Course for Secondary Teachers of Mathematics (Major Concentration) <sup>2</sup> Mathematics in the Middle School Classroom	3
Capstone Course for Secondary Teachers of Mathematics (Major Concentration) <sup>2</sup> Mathematics in the Middle School	3
Capstone Course for Secondary Teachers of	3
Capstone Course for Secondary Teachers of	
Real Analysis I (Major Core)	3
Units	15
/american-institutions/#usg)	3
	3
Field Study for Secondary Teachers (Major Concentration) <sup>1</sup>	3
	3
Elementary Number Theory (Major Concentration) <sup>1</sup>	3
Units	16
s/#USHaGR)	3
	3
	0
	Elementary Number Theory (Major Concentration) <sup>1</sup> Modern Algebra (Major Core) Field Study for Secondary Teachers (Major Concentration) <sup>1</sup>

<sup>1</sup> MATH 310 and MATH 375 are offered in Fall Semesters only.

<sup>2</sup> MATH 475 is offered Spring Semesters only.