



# DEPARTMENT OF CHEMISTRY & BIOCHEMISTRY CHEMISTRY BACHELOR OF ARTS CLASS OF 2024

# NAME:

TERM 1	TERM 2	TERM 3	TERM 4	TERM 5	TERM 6	TERM 7	TERM 8
GE B1 & B3 CHEM 120A 5 units	CHEM 120B 5 units	CHEM 301A 3 units	CHEM 301B 3 units	CHEM 361A 3 units	CHEM 361B 3 units	CHEM 421 3 units	CHEM Elective 3 units
GE B4 MATH 150A 4 units	MATH 150B 4 units	CHEM 306A 2 units	CHEM 306B 2 units	CHEM 325 3 units	GE B2 3 units	CHEM 495 1 unit	CHEM 495 2 units
GE A1 or A2 3 units	GE A1 or A2 3 units	CHEM 315 3 units	CHEM 316 2 units	GE C1 or C2 3 units	GE D2 3 units	GE D2 3 units	GE E/Z 3 units
GE A3 CNSM 101 3 units	GE C1 3 units	PHYS 211, 211L 4 units	PHYS 212, 212L 4 units	UD writing 3 units	Elective 3 units	Elective 3 units	Elective 3 units
CHEM 190 1 unit		GE C2 3 units	GE D1 3 units	UD GE B5 3 units	UD GE C3 3 units	Elective 3 units	Elective 3 units
						UD GE D4/Z 3 units	
16 units	15 units	15 units	14 units	15 units	15 units	16 units	14 units

120	TOTAL UNITS
15	Elective
16	Chemistry BA related
44	Chemistry BA required
3	Upper division writing
3	CNSM required
9	GE upper division
30	GE lower division

# INSTRUCTIONS FOR COMPLETING THE CHEMISTRY BACHELOR OF ARTS

- 1. Meet with your assigned faculty advisor each semester to plan and review your academic progress.
- 2. Visit your College of Natural Sciences and Mathematics Student Success Team in MH 488 to review GE and graduation requirements.
- 3. Complete GE courses in areas A1, A2, A3 and B4 with a C or better.
- 4. Complete a total of 12 units in GE Area B.
- 5. One course from GE Area Z can also fulfill a requirement in another category (e.g., D4). Check your Titan Degree Audit for courses that appear in both categories.
- 6. Apply for Graduation through your Student Center at the start of Term 7.

# Revised 2 June 2020

Chemistry B.A. 🥃

## CHEMISTRY BACHELOR OF ARTS

The Bachelor of Arts in Chemistry is offered for students who are planning careers that require a sound background in fundamental chemistry, but not specialized training needed by a professional chemist. The B.A. program is particularly suited for those who plan to go into areas such as secondary education, technical sales, food processing, chemical patent law, forensic science, environmental law, and business administration (MBA). The B.A. degree can also be used to pursue graduate school.

The following courses are required to complete the B.A. in Chemistry.

## CHEMISTRY REQUIRED COURSES

#### • Complete the **fourteen** courses listed below:

Course	Course Title	
CHEM 120A	General Chemistry	
CHEM 120B	General Chemistry	
CHEM 190	Orientation to Chemistry & Biochemistry	
CHEM 301A	Organic Chemistry	
CHEM 301B	Organic Chemistry	
CHEM 306A	Organic Chemistry Lab	
CHEM 306B	Organic Chemistry Lab	
CHEM 315	Theory of Quantitative Chemistry	
CHEM 316	Quantitative Chemistry Laboratory	
CHEM 325	Inorganic Chemistry	
CHEM 361A	Introduction to Physical Chemistry	
CHEM 361B	Introduction to Physical Chemistry	
CHEM 421	Biological Chemistry	
CHEM 495	Senior Research	

• Complete three units of upper division CHEM electives; choose from:

Course	Course Title	
CHEM410	Computational Chemistry	
CHEM411A-G	Instrumental Analysis (1 unit each)	
CHEM422	Biochemistry Laboratory	
CHEM425	Advanced Inorganic Chemistry	
CHEM429	Medicinal Chemistry	
CHEM430	Bioorganic Chemistry	
CHEM431	Advanced Organic Chemistry	
CHEM436	Atmospheric Chemistry	
CHEM438	Environmental Biochemistry	
CHEM445	Nutritional Biochemistry	
CHEM472B	Advances in Biotechnology Laboratory	
CHEM467	Medicinal Chemistry Laboratory	
CHEM480T	Topics in Chemistry	

• Complete the six courses listed below:

Course	Course Title	
MATH 150A	Calculus I	
MATH 150B	Calculus II	
PHYS 211	Elementary Physics	
PHYS 211L	Elementary Physics: Laboratory	
PHYS 212	Elementary Physics	
PHYS 212L	Elementary Physics: Laboratory	

• Complete **one** course listed below to satisfy the University Upper Division writing requirement:

Course	Course Title
ENGL 301	Advanced College Writing
ENGL 360	Technical Writing
ENGL 363	Scientific Writing

### GENERAL EDUCATION REQUIREMENTS

• Area A. Complete one course in each subarea for a total of 9 units of lower division.

Subarea	Title	
A1	Oral Communication	
A2	Written Communication	
A3	Critical Thinking (CNSM 101)	

• Area B. Complete one course in each subarea; the course in B3 must be associated with the course taken to satisfy B1 or B2. Area B courses must include 9 lower division and 3 upper division units (\*).

Subarea	Title
B1	Physical Science
B2	Life Science
В3	Laboratory Activity
B4	Mathematics/Quantitative Reasoning
B5 (*)	Implications/Explorations in Math and Natural Sciences

• Area C. Complete 3 units from C.1; 3 units from C.2; 3 units from C.3; and 3 units from either C.1 or C.2 for a total of 9 lower division and 3 upper division units (\*).

Subarea	Title
C1	Introduction to Arts
C2	Introduction to Humanities
C3 (*)	Explorations in the Arts/Humanities

• Area D. Complete 9 lower division and 3 upper division units (\*).

Area	Title	
D1	Introduction to Social Sciences	
D2	American History, Institutions & Values	
D3	American Government	
D4 (*)	Explorations in Social Sciences	

#### • Area E. Complete 3 units.

Area	Title
Е	Lifelong Learning and Self Development

• Area Z. Cultural Diversity Requirement (3 units). One GE Course in B, C, D, or E must double-count as a Z course (check TDA or CSUF website for courses that appear in both categories).

Area	Title
Z	Cultural Diversity