



BIOCHEMISTRY

Bachelor of Science

School of Mathematics, Science & Engineering

Program Overview

The Bachelor of Science degree in Biochemistry is designed to give students a strong foundation in the chemical and biological sciences providing for employment or future study in a variety of specialized areas. This degree is the recommended for students pursuing a career in biotechnology, medical research, pharmaceutical chemistry, or the health professions.

Career Opportunities

The biochemistry degree prepares students for a variety of career and professional opportunities including:

- Biochemical Research
- Biotechnology
- Environmental Science
- Food Quality Control
- Intellectual Property Law
- Education
- Drug Development
- Forensics
- Health Professions including:
 - Medicine
 - Pharmacy
 - Dentistry

Faculty

Faculty members in the Department of Chemistry have a strong commitment to undergraduate education. Faculty teach a full range of courses in their specialty areas including analytical, organic, inorganic, physical chemistry, and biochemistry. They are dedicated to developing students with a strong foundation in chemistry through coursework and research.

Rafael Adrian - Baylor University, Ph.D., Associate Professor
Alakananda Chaudhuri - Jadvpur University, Ph.D., Professor
Julian Davis - University of Texas at Austin, Ph.D., Associate Professor
Robert Garner - Ohio State University, Ph.D., Assistant Professor
Edward Gonzalez - University of Texas at Austin, Ph.D., Associate Professor
S. Bin Kong - University of Florida, Ph.D., Professor
Betsy Leverett - Purdue University, Ph.D., Assistant Professor
Brian McBurnett - University of Texas at Austin, Ph.D., Professor
John Stankus - Stanford University, Ph.D., Associate Professor
Dr. Rachell Booth, Associate Professor

Contact

Dr. Rafael Adrian
University of the Incarnate Word
4301 Broadway, CPO 311
San Antonio, TX 78209
adrian@uiwtx.edu

Website

www.uiw.edu/chemistry

Bachelor of Science in Biochemistry
SCHOOL OF MATH, SCIENCE, & ENGINEERING
2015-2017

Freshman Year: Fall	Hrs.
CHEM 1301 Chemical Principles I	3
BIOL 1402 Unity of Life and Lab	4
DWHP 1200 Dimension of Wellness	2
ENGL 1311 Composition I	3
HIST 13XX	3
PEHP 11XX	1
Total hours	16

Sophomore Year: Fall	Hrs.
CHEM 2311 Organic Chemistry I	3
CHEM 2111 Organic Chemistry I Lab	1
MATH 2312 Calculus I	3
ENGL 2310 World Literature Studies	3
PHIL 1381 Introduction to Philosophy	3
RELS 13XX	3
Total hours	16

Junior Year: Fall	Hrs.
CHEM 4351 Biochemistry I	3
CHEM 4151 Biochemistry Lab	1
BIOL 34XX (4 credits from: 3411, 3461 or 3471)	4
PHYS 2305 Physics I	3
PHYS 2103 Physics I Lab	1
Modern Language II	3
Total hours	15

Senior Year: Fall	Hrs.
CHEM4431/L Physical Chemistry I & Lab	4
CHEM 4260 Chemistry Research	2
Social Science Core	3
Elective	3
Elective (upper division)	3
Total Hours	15

Freshman Year: Spring	Hrs.
CHEM 1302 Chemical Principles II	3
CHEM 1203L General Chemistry Lab	2
BIOL 1403 Evolution, Ecology, and Biodiversity	4
MATH 1311 Pre-Calculus	3
ENGL 1312 Composition II	3
Total hours	15

Sophomore Year: Spring	Hrs.
CHEM 2312 Organic Chemistry II	3
CHEM 2112 Organic Chemistry II Lab	1
MATH 2313 Calculus II	3
RELS/PHIL 33XX	3
Modern Language I	3
Fine Arts Core	3
Total hours	16

Junior Year: Spring	Hrs.
CHEM 3421/L Quant. Analysis & Lab	4
CHEM 4352 Biochemistry II	3
BIOL 34XX (4 credits from: 3411, 3461 or 3471)	4
PHYS 2306 Physics II	1
PHYS 2106 Physics II Lab	3
Total hours	15

Senior Year: Spring	Hrs.
CHEM 34XX, CHEM 44XX or BIOL 34XX	4
Elective (upper division)	3
Elective	3
Elective	3
Elective	3
Total Hours	16

Core Curriculum - Total Hours 43
Major - Total Hours 81
Degree - Total Hours 124