



SAMPLE PROGRAM OF STUDY

B.S. degree, Medical Science emphasis, with Math 9A placement. This is only a sample program; students will work out their specific programs of study with their advisers.

Freshman year	Fall	Winter	Spring
Biochemistry	95	—	96
Biology	—	5A, 5A lab	5B
Chemistry	1A, 1A lab	1B, 1B lab	1C, 1C lab
English	1A	1B	1C
Hum/soc elective	—	—	—
Math	7A	7B	46*
Sophomore year			
Biochemistry	—	015 lab	100*
Biology	5C	—	—
Chemistry	8A, 8A lab	8B, 8B lab	8C, 8C lab
Hum/soc elective	—	—	—
Physics	2A, 2A lab	2B, 2B lab	2C, 2C lab
Statistics	100A	—	—
Junior year			
Biochemistry	110A, 98I	110B, 184	110C
Biology	102	—	—
Chemistry	109/110A	—	—
Hum/soc elective	—	—	—
Senior year			
Biochemistry	—	162 lab	120
Biochemistry elective	180/183/187*	180*	180/186*
Biology	161A	161B	171
Cell Biology	—	101	—
Hum/soc elective	—	—	—

* Recommended, not required

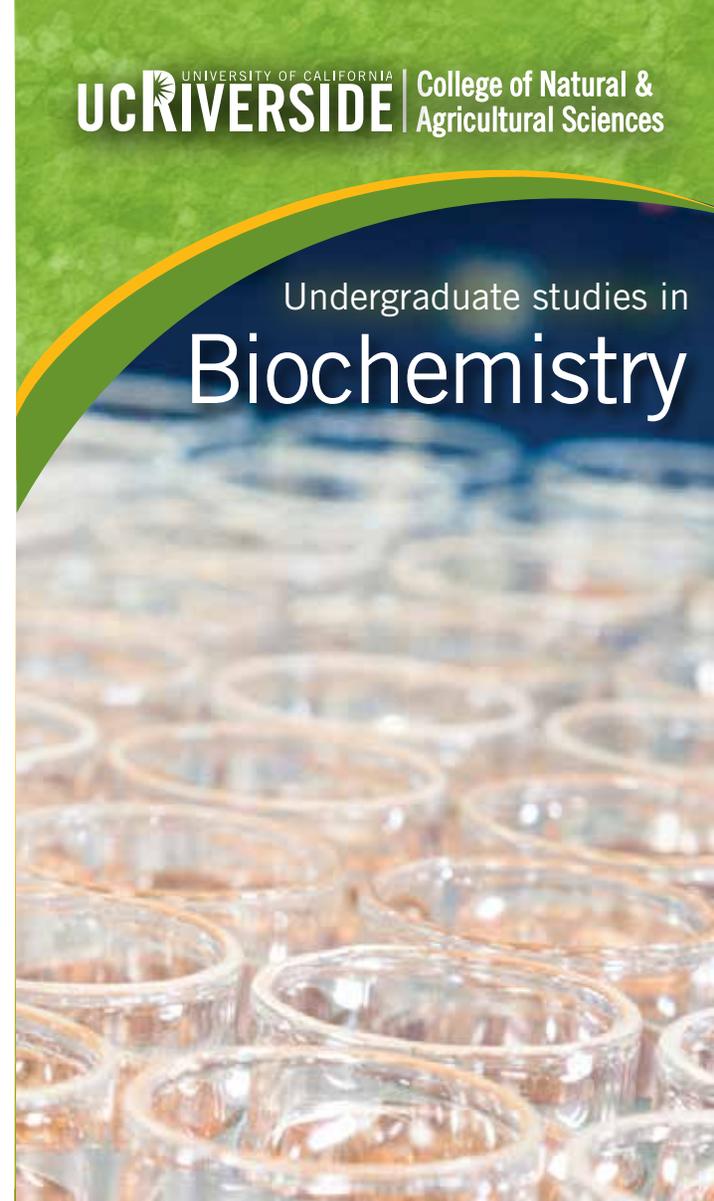


ADVISING

Additional information can also be found in the UCR General Catalog at catalog.ucr.edu. For help in selecting courses, and for information about policies and procedures, contact a Professional Academic Advisor: CNAS Undergraduate Academic Advising Center 1223 Pierce Hall
Phone: (951) 827-7294
Website: cnasstudent.ucr.edu

For advice about careers, graduate programs, and letters of recommendation, contact: Undergraduate Faculty Advisor
Dr. Richard Debus
Department of Biochemistry
E-mail: richard.debus@ucr.edu
Website: biochemistry.ucr.edu

Undergraduate studies in Biochemistry



Growing great science
Making new discoveries
Building great minds



Biochemistry at the University of California, Riverside

ABOUT BIOCHEMISTRY

A bachelor's degree in the diverse discipline of biochemistry allows entry into such fields as biotechnology, cell biology, and the health professions. The Department of Biochemistry offers a B.S. or B.A. degree, and students choose one of three emphases—biology, chemistry, or medical sciences.

ABOUT THE DEPARTMENT

The Department of Biochemistry maintains prominent strength in several areas:

- The 15 departmental faculty and more than 30 cooperating faculty maintain active research programs in basic biochemistry as well as in interdisciplinary subjects.
- Each undergraduate major is assigned a faculty advisor.
- Rigorous laboratory requirements and individual research opportunities are key factors in student success.
- A large graduate program serves as a resource for undergraduates.

CAREER PATHS

- Research careers with federal, state, local, industrial, and university laboratories
- Business careers in sales/marketing, technical writing, scientific journalism, regulatory affairs, and administration
- Teaching careers at the elementary, secondary, and postsecondary levels
- Professional careers in medicine and intellectual property/patent law

RESEARCH OPPORTUNITIES

Biochemistry majors are encouraged to engage in research as an important part of their education. Three undergraduate research courses are offered: BCH 97, Research, for freshmen and sophomores; BCH 190, Special Studies; and BCH 197, Research for Undergraduate Students, for juniors and seniors. Up to 9 units of BCH 190 and 197 may be counted toward the major.

Many faculty members advertise openings for undergraduates on their laboratory websites. Students contact them directly to apply for a position and to discuss the scope of the project to be undertaken.

BIOCHEMISTRY FACULTY RESEARCH SPECIALTIES

- Dr. Gregor Blaha: The coupling of transcription and translation in bacteria.
- Dr. Sihem Cheloufi: Stem cell and cancer research, developmental biology and regenerative medicine, chromatin architecture and regulatory RNAs
- Dr. Richard Debus: Oxygen production in photosynthesis
- Dr. Stephanie Dingwall: Teaching pedagogy
- Dr. Li Fan: Structure and function of proteins in DNA replication and repair
- Dr. Daniel Gallie: Regulation of translation
- Dr. Russ Hille: Enzyme structure/function
- Dr. Paul Larsen: Signal transduction in plants
- Dr. Xuan Liu: Tumor-suppressor proteins
- Dr. Ernest Martinez: Regulation of gene transcription
- Dr. Jernej Mum: RNA and chromatin biochemistry, neurobiology, stem cells and cancer biology
- Dr. Sean O'Leary: Single-molecule biophysics and mechanisms of gene expression
- Dr. Jeff Perry: Structural biochemistry of signal transduction
- Dr. Jikui Song: Structural biology of epigenetic regulation
- Dr. Stephen Spindler: Caloric restriction and aging

In addition, majors may choose to work with one of the more than 30 cooperating faculty members.