

 FLORIDA ATLANTIC UNIVERSITY	NEW/CHANGE PROGRAM REQUEST Undergraduate Programs		UUPC Approval <u>3/25/24</u> UFS Approval _____ Banner _____ Catalog _____
	Department ^{N/A} College Wilkes Honors College		
Program Name Biological Chemistry	<input type="checkbox"/> New Program* <input checked="" type="checkbox"/> Change Program*	Effective Date (TERM & YEAR) Fall 2024	
<p>Please explain the requested change(s) and offer rationale below or on an attachment.</p> <p>Add PCB 4841 Honors Cellular Neuroscience as an elective to the Biological Chemistry concentration.</p>			
<p><small>*All new programs and changes to existing programs must be accompanied by a catalog entry showing the new or proposed changes.</small></p>			
Faculty Contact/Email/Phone William O'Brien/wobrien@fau.edu/561-799-8033		Consult and list departments that may be affected by the change(s) and attach documentation	
Approved by Department Chair <u></u> College Curriculum Chair <u>Rachel Corr</u> College Dean <u></u> UUPC Chair <u>Corey Sorge</u> Undergraduate Studies Dean <u>Dan Meeroff</u> UFS President _____ Provost _____		Date <u>2/29/24</u> <div style="border: 1px solid red; padding: 2px;">2/23/24</div> <u>2/29/24</u> <u>3/25/24</u> <u>3/25/24</u> _____ _____	

Email this form and attachments to mjennings@fau.edu seven business days before the UUPC meeting.

CONCENTRATION IN BIOLOGICAL CHEMISTRY

Students must earn a "C" or better in each course taken to fulfill a concentration requirement.

The biological chemistry concentration is designed for those students who wish to go on to graduate school, medical school, or who desire to work for biotech firms, government agencies or environmental organizations. It strongly emphasizes complementary coursework from both the biology and chemistry disciplines. To promote the interconnectedness of these disciplines, students choosing a research advisor in one discipline are strongly encouraged to have their second reader from the other discipline. Our interdisciplinary curriculum will benefit students who choose to pursue graduate studies in biology, chemistry, or biochemistry.

Advisory Board:

[Dr. Chitra Chandrasekhar](#) | [Dr. Veljko Dragojlovic](#) | [Dr. Eugene Smith](#) | [Dr. Catherine Trivigno](#)

Electives:

Electives are shown below. Students concentrating in Biological Chemistry must take at least four electives totaling at least 12 credits. Two of these electives must be from Biology and two must be from Chemistry. Both Biology electives should have a molecular component. At least one of the chemistry electives must be a course with a lab. Other FAU courses may be counted only with the prior approval of the Concentration Advisor. Students are reminded that they need 45 upper-level (3000 or 4000-level) credits to graduate. Electives should be chosen to complement post-undergraduate plans.

Courses

CONCENTRATION IN BIOLOGICAL CHEMISTRY

Course #	Course Name
BSC 1010, 1010L	Honors Biological Principles with Lab
BSC 1011, 1011L	Honors Biodiversity with Lab
PCB 3063	Honors Genetics
PCB 4102	Honors Cell Biology
CHM 2045, 2045L	Honors General Chemistry I with Lab
CHM 2046, 2046L	Honors General Chemistry II with Lab

Course #	Course Name
CHM 2210, 2204L	Honors Organic Chemistry I with Lab
CHM 2211, 2205L	Honors Organic Chemistry II with Lab
BCH 3033, 3033L	Honors Biochemistry with Lab
STA 2023	Honors Introductory Statistics
MAC 2311	Honors Calculus I
MAC 2312*	Honors Calculus II
PHY 2048, 2048L	Honors General Physics I with Lab
PHY 2049, 2049L or PHY 2054,	Honors General Physics II with Lab or College Physics 2
	4 Electives; 2 in Biology and 2 in Chemistry, with at least one chemistry lab.
IDS 4970	Honors Thesis (two semesters)
	Total Credits

** MAC 2312 only required if taking PHY 2049*

BIOLOGY ELECTIVES*

At least 1 biology elective to be taken at the Wilkes Honors College. Both Biology electives should have a molecular component.

Course #	Course Name
MCB 3020, 3020L*	Honors Microbiology with Lab
PCB 4024	Honors Molecular Cell Biology
BSC 4403L	Honors Biotechnology Lab
BSC 4930	Honors Immunology
BSC 4930	Honors Intro to Drug Development
BSC 4930	Honors Intro to Structural Molecular Biology
BSC 4930	Honors Molecular Pharmacology
ZOO 4742	Honors Principles of Human Neuroanatomy
PCB 4253	Honors Developmental Biology
BSC 4930	Honors Endocrinology
PCB 4234	Honors Biology of Cancer
PSB 3441	Honors Drug and Behavior
PSB 4243	Honors Neuroscience of Addiction
BSC 4022	Molecular Genetics of Aging
MCB 4203	Medical Bacteriology
MCB 4503	Virology
PCB 4233	Immunology
PCB 4522	Molecular Genetics
PCB 4594	Genes and Development
PCB 4832C	Neurophysiology
PCB 4842	Cellular Neuroscience and Disease
PCB 4841	Honors Cellular Neuroscience (to be added)

Note: Students in the Max Planck Honors Program may count Introduction to Neuroscience Research (PSB 4003, 1 credit) and two distinct MPHP Enrichment courses (1 credit each) as their 3 credit, Biology elective.

CHEMISTRY ELECTIVES*

Course #	Course Name
CHM 3085	Honors Environmental Chemistry
CHM 3121, 3121L	Honors Quantitative Analysis with Lab
CHM 3290	Honors Chemistry of Natural Products
CHM 3400	Honors Introduction to Physical Chemistry
CHM 4135, 4135L	Honors Instrumental Methods of Analysis with Lab
CHM 4231	Honors Spectroscopy
CHM 4473	Honors Quantum Chemistry
CHM 3609, CHM 3609L	Honors Inorganic Chemistry with Lab
CHM 4905	Honors Directed Independent Study in Chemistry
CHM 4915	Honors Directed Independent Research in Chemistry

** At least one chemistry elective must be a course with a lab. Special Topics in Biology (BSC 4930) or Chemistry (CHM 4933) may be used to fulfill the Biology and Chemistry electives upon approval of the Biological Chemistry advisory board.*