

Biology—Biomedical Sciences

Bachelor of Science



Semester 1

Course	Credits	Grade		✓
ENGL 101: Composition & Rhetoric I	3	C*		<input type="checkbox"/>
BIOL 121/L: Foundations of Biology I with Lab	4	C		<input type="checkbox"/>
BIOL 130: Freshmen Biology Seminar	1	C		<input type="checkbox"/>
CHEM 101/111: Principles of Chemistry I with Lab	4	C		<input type="checkbox"/>
MATH 103: College Algebra or MATH 107: Precalculus	3-4	C		<input type="checkbox"/>
UNIV 100: CU Foundations	1			<input type="checkbox"/>

16-17

Semester 2

Course	Credits	Grade		✓
ENGL 102: Composition & Rhetoric II	3	C*		<input type="checkbox"/>
BIOL 122/L: Foundations of Biology II with Lab	4	C		<input type="checkbox"/>
CHEM 102/112: Principles of Chemistry II with Lab	4	C		<input type="checkbox"/>
MATH 104: College Trigonometry (If taken MATH 107, take an Elective/Minor)	3			<input type="checkbox"/>

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Semester 3

Course	Credits	Grade		✓
*BIOL 201: Ecology and Field Methods or BIOL 369: Evolution	3-4			<input type="checkbox"/>
CHEM 331: Organic Chemistry I	3			<input type="checkbox"/>
MATH 105: Elementary Statistics	3			<input type="checkbox"/>
General Education Course	3			<input type="checkbox"/>
General Education Course	2-3			<input type="checkbox"/>

14-16

Semester 4

Course	Credits	Grade		✓
BIOL 230: Sophomore Biology Seminar	1			<input type="checkbox"/>
CHEM 341/347: Biochemistry with Lab	4			<input type="checkbox"/>
BIOL 302: Cell and Molecular Biology	4			<input type="checkbox"/>
General Education Course (PSY 101 recommended)	3			<input type="checkbox"/>
General Education Course	3			<input type="checkbox"/>

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The **Bachelor of Science in Biology** degree with Biomedical Sciences emphasis is designed for students planning to attend a graduate school (in fields such as agriculture, biochemistry, cell biology, ecology, environmental science, genetics, etc.), veterinary school, or a human health professional school (such as medical, dental, chiropractic, or pharmacy).



MILESTONE COURSES

Courses marked as Milestone Courses are crucial for staying on track to complete your degree in four years. Take them in the recommended semester to stay on track! If you see a recommended minimum grade, this is the grade you need to earn to have the best chance for success in this degree! Grades marked with an asterisk are required to pass.



LANDMARKS

Points where you see a landmark icon on the four-year plan indicate you have reached a point of action outside regular coursework! See the Helpful Hints for information on each landmark.

Helpful Hints

- Use this plan in consultation with your Academic Advisor.
- This four-year plan assumes you begin your degree in the Fall semester. Courses in **bold** are only offered during the semester shown.
- Semesters 1 & 2: MATH 103 and MATH 104 are *not* required for this degree, but are recommended. Also, MATH 103 & 104 or equivalent proficiency is required for PHYS 101.
- See the [Academic Catalog](#) and discuss with your advisor about courses that fulfill the Directed Elective requirements and align with your career goals.

Semester 5

Course	Credits	Grade	✓
BIOL 401: Genetics	4		<input type="checkbox"/>
PHYS 101: Introductory Physics	4		<input type="checkbox"/>
Directed Elective	4		<input type="checkbox"/>
General Education Course (SOC 101 recommended)	3		<input type="checkbox"/>
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Semester 6

Course	Credits	Grade	✓
*BIOL 202: Animals as Organisms	4		<input type="checkbox"/>
PHYS 102: Intermediate Physics	4		<input type="checkbox"/>
Directed Elective	4		<input type="checkbox"/>
General Education Course	3		<input type="checkbox"/>
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Semester 7

Course	Credits	Grade	✓
Directed Elective	4		<input type="checkbox"/>
Directed Elective	4		<input type="checkbox"/>
General Education Course	3		<input type="checkbox"/>
Elective/Minor	3		<input type="checkbox"/>
14			

Semester 8

Course	Credits	Grade	✓
BIOL 455: Biology Capstone	2		<input type="checkbox"/>
Directed Elective	4		<input type="checkbox"/>
General Education Course	3		<input type="checkbox"/>
Elective/Minor	3		<input type="checkbox"/>
Elective/Minor	3-4		<input type="checkbox"/>
15-16			



ADVISING

When you choose to pursue this degree, you will be assigned an advisor who is an expert in the field of Biology. This advisor can help you with course selection, career planning, resume building, and help you with tracking your path to degree completion.

CAREERS

- Chiropractor
- Dentist
- Environmental Consultant
- Medical Doctor
- Pharmacist
- Research Technician
- Science Educator
- Veterinarian
- Research Scientist

STUDENT ORGANIZATIONS

- PATCH
- CU ACS
- Sigma Zeta (honor society)

COMPLEMENTARY MINORS

- Chemistry
- Computer Science
- Geology
- Mathematics
- Physics
- Psychology
- Business Administration
- Neuroscience

Helpful Hints

- Students must take either BIOL 202 or BIOL 301.
- Students must take either BIOL 201 or BIOL 369.
- Semester 8 Landmark—Students completing the biology capstone will analyze a current issue in biology, write a critical review, and give an oral presentation which is open to the public. **At the end of the course, comprehensive program assessments are administered; a passing grade must be obtained.** Students have the option to take BIOL 470: Senior Independent Research I (3) and BIOL 471: Senior Independent Research II (3) instead of BIOL 455.