BIOLOGY (B.SC.) (59 CREDITS)

Offered by: Biology (Faculty of Science)
Degree: Bachelor of Science; Bachelor of Arts and Science
Program credit weight: 59

Program Description

The Biology Major covers a range of fundamental biological concepts spanning molecules and cells to organisms and ecosystems, including development, behaviour and evolution. The areas of focus include:

1. molecular, cellular and developmental biology,
2. conservation, ecology and evolution, and
3. neurobiology and behaviour.

Degree Requirements — B.Sc.

This program is offered as part of a Bachelor of Science (B.Sc.) degree.

To graduate, students must satisfy both their program requirements and their degree requirements.

- The program requirements (i.e., the specific courses that make up this program) are listed under the Course Tab (above).
- The degree requirements—including the mandatory Foundation program, appropriate degree structure, and any additional components—are outlined on the Degree Requirements page.

Students are responsible for ensuring that this program fits within the overall structure of their degree and that all degree requirements are met. Consult the Degree Planning Guide on the SOUSA website for additional guidance.

Note: For information about Fall 2025 and Winter 2026 course offerings, please check back on May 8, 2025. Until then, the "Terms offered" field will appear blank for most courses while the class schedule is being finalized.

Required Courses (31 credits)

Expand allContract all

Course	Title	Credits
BIOL 200	Molecular Biology.	3
BIOL 201	Cell Biology and Metabolism.	3
BIOL 205	Functional Biology of Plants and Animals.	3
BIOL 206	Methods in Biology.	3
BIOL 215	Introduction to Ecology and Evolution.	3
BIOL 216	Biology of Behaviour.	3
BIOL 301	Cell and Molecular Laboratory.	4
BIOL 302	Fundamentals of Genetics and Genomics.	3
BIOL 311	Advanced Methods in Organismal Biology.	3
COMP 204	Computer Programming for Life Sciences.	3

Complementary Courses (27-28 credits)

Core (12-13 credits)

3 or 4 credits selected from CHEM block:

Expand allContract all

Course	Title	Credits
CHEM 204	Physical Chemistry/Biological Sciences 1.	3
CHEM 212	Introductory Organic Chemistry 1.[1]	4

[1] If a student has already taken CHEM 212 Introductory Organic Chemistry 1. or its equivalent, the credits can be made up with CHEM 204 Physical Chemistry/Biological Sciences 1., or CHEM 222 Introductory Organic Chemistry 2., or a 3- or 4-credit Biology complementary course to be approved by the Biology Adviser.

9 credits (3 credits from each of Blocks A, B and C):

Block A-Ecology and Evolution

Expand allContract all

Course	Title	Credits
BIOL 304	Evolution.	3
BIOL 305	Animal Diversity.	3
BIOL 308	Ecological Dynamics.	3

Block B-Molecular and Cellular

Expand allContract all

Course	Title	Credits
BIOL 300	Molecular Biology of the Gene.	3
BIOL 303	Developmental Biology.	3
BIOL 313	Eukaryotic Cell Biology.	3

Block C-Neuro/Behaviour

Expand allContract all

Course	Title	Credits
BIOL 306	Neural Basis of Behaviour.	3
BIOL 307	Behavioural Ecology.	3

Other (15 credits)

15 credits other Biology courses at the 300-500 levels, of which 6 credits must be at the 400-500 levels; may include up to 6 credits of research, and may include up to 6 credits of other non-BIOL science courses subject to Adviser approval.