

BIOLOGY



Associate Degree for Transfer

A Degree with a Guarantee.SM

Student Transfer Achievement Reform (STAR) Act (SB1440)

Associate in Science

Transfer Preparation* (Major Code: 01514)

Biology is a natural science that focuses on the biological, physical and chemical processes in living organisms. This discipline explores how organisms acquire and use energy to maintain homeostasis, how they reproduce, and how they interact with each other and their environment. Biological processes are emphasized as a means of answering these questions. Biologists rely heavily on a chemistry foundation since living organisms are chemical systems.

Program Student Learning Outcomes

- Upon successful completion of the Biology Program, students will be able to communicate clearly in a way that reflects knowledge and understanding of biological processes and structures.
- Upon successful completion of the Biology Program, students will be able to approach and examine issues related to the biological sciences from an evidence-based perspective and communicate this information in a clear manner.
- Upon successful completion of the Biology Program, students will be able to demonstrate information literacy skills to access, evaluate, and use resources.
- Upon successful completion of the Biology Program, students will be able to use and apply the scientific method to critically evaluate hypotheses.

The following is required for all AA-T or AS-T degrees:

- Completion of minimum 60 semester or 90 quarter units of transferable degree applicable courses.
- Minimum overall grade point average (GPA) of at least 2.0 in all transferable coursework, including a minimum "C" grade (or "Pass") required in each course for Cal-GETC.
- Minimum 18 semester or 27 quarter units in major or area of emphasis with a minimum grade of "C" (or "Pass") for each course in the major.
- Completion of the California General Education Transfer Curriculum (Cal-GETC) pattern.

SDSU Note: San Diego State University (SDSU) accepts this ADT for transferring into Biology BS, Biology (Cellular and Molecular Biology) BS, Biology (Ecology) BS, Biology (Evolutionary Biology) BS, Biology (Marine Biology) BS, and Biology (Zoology) BS majors. Check SDSU Transfer Pathways (<https://admissions.sdsu.edu/transfers/transfer-pathways/>) and consult with an academic counselor.

Code	Title	Units
Required Core		12
BIOL 210	GENERAL ZOOLOGY	
BIOL 211	INTRODUCTION TO CELL AND MOLECULAR BIOLOGY	
BIOL 212	BIOLOGY OF PLANTS	
List A		15-16
CHEM 200	GENERAL CHEMISTRY I *	
CHEM 210	GENERAL CHEMISTRY II	
MATH 250	ANALYTIC GEOMETRY AND CALCULUS I	
or MATH 121 & MATH 122	APPLIED CALCULUS I and APPLIED CALCULUS II	
PHYS 150	FUNDAMENTALS OF PHYSICS I	3
PHYS 151	FUNDAMENTALS OF PHYSICS LABORATORY I	1
PHYS 152	FUNDAMENTALS OF PHYSICS II	3
PHYS 153	FUNDAMENTALS OF PHYSICS LABORATORY II	1
Total Units		35-36

Code	Title	Units
Recommended Electives: BIOL 207 and/or BIOL 215		

* CHEM 170 is a prerequisite to CHEM 200

* Students planning to transfer to a four-year college or university should complete courses specific to the transfer institution of choice. University requirements vary from institution to institution and are subject to change. Therefore, it is important to verify transfer major preparation and general education requirements through consultation with a counselor in either the Counseling Center or Career and Transfer Connections. See catalog Transfer Courses Information (<http://catalog.swccd.edu/student-success-support-program/student-services-and-college-services/other-services/transfer-courses/>) section for further information.