B.A. in Biological Sciences: Biology Education Major (FIUteach)
Fall 2025

Program Description

The (B.A.) degree in Biological Sciences with Biology Education Major offers students options. This degree in the discipline offers an enriching program in Biology and prepares students for teaching in the 21st century classroom. Graduates of this program can choose to teach Biology in grades 6-12, pursue graduate school or work in the various industries requiring a strong background in Biology.

Admission Requirements & Application

- A minimum lower-division GPA of 2.5 or better on a 4.0 scale
- Successful completion of 60 credit hours of lower-division coursework or an AA degree from an accredited institution
- A passing score on all sections of the FTCE: General Knowledge Exam (GK). *(All students must pass the General Knowledge Exam (GK) by the time they reach 72 credits in their program of study)*
- University Core Curriculum/General Education must be completed
- Major pre-requisites (listed below) must be taken and passed with a minimum grade of C

FIU Course(s):		Credit Hours:
Prerequisites (27 credits)		
BSC 2010 & 2010L	General Biology I and Lab	3 + 1
BSC 2011 & 2011L	General Biology II and Lab	3 + 1
CHM 1045 & 1045L	General Chemistry I and Lab	3 + 1
CHM 1046 & 1046L	General Chemistry II and Lab	3 + 1
General Physics I	**Choose 1 course:** PHY2053 – Physics without Calculus I (*Uses Algebra and Trigonometry)* PHY2048 – Physics with Calculus (*Uses Calculus I)* **	4
Mathematics	**Choose 1 option:** MAC 1147 – Pre-Calculus Algebra and Trigonometry (4 cr) MAC 2311 – Calculus I (4 cr) *Students should take MAC 1147. Only students who have started the MAC1114/MAC1140 sequence at their previous institution may request permission from the Math Department to get into the next course in the sequence.*	4
Statistics	**Choose 1 course:** STA 2023 - Statistical Methods *Consult with academic advisor to discuss the possibility of substituting this course with other approved Statistics course.	3

Program of Study

The program of studies is as follows:

- Total credits:120
    - The balance of the 120-credit hour requirement for graduation should be chosen in consultation with the student's departmental and/or advisor(s)
- All courses and FTCE testing requirements must be satisfied prior to Student Teaching
- All program courses must be completed with a minimum grade of "C"

Course:		Credit Hours:
Required Courses (13 credits)		
BSC 3848	Science and Career Literacy (Prerequisites: BSC 2010 and BSC 2011)	1
PCB 3043	Ecology (Prerequisites: BSC 2010 and BSC 2011)	3
PCB 3063	Genetics (Prerequisites: BSC 2010)	3
PCB 4674	Evolution (Prerequisites: PCB 3043, PCB 3063)	3
BCH 3034	Cellular Chemistry (Prerequisites: BSC2010, CHM1045 and CHM1045L	3
Upper Division Biology Elective – Consult with advisor for course options (12 credits)		
Upper Division Lectures	Biology Electives Students must complete 4 lecture courses from the acceptable Upper Division Biology Electives maintained by the Biology Department. The 4 lecture courses may be chosen at the student's discretion from courses in any of the distribution areas. The following courses are not allowed as Biology BA Electives: BSC 4481, BSC 4482, Student Research Labs (BSC3915 and BSC4914); Cooperative Education credits; Biology of Women; Research Methods in Biological Sciences (BSC3910); and courses for non-science majors (BOT1010, MCB2000, BSC2023, EVR3013, OCB2000, and OCE3014)	12
Laboratory Requirement (2 credits)		
Upper Division Labs	**Choose two** upper-division labs *(Note: 2-cr. labs count for one lab)*	2
Biology Education (FIUteach) Track (29 credits)		
SMT 2661* **AND** SMT 2662* **OR** SMT 2044*	Step 1: Inquiry Approaches to Teaching Mathematics and Science (Prerequisite: Freshman/Sophomore standing) Step 2: Inquiry-Based Lesson Design in Mathematics and Science (Prerequisite: SMT 2661) 1 & 2 Combined: Inquiry-Based Approaches and Lesson Design for Teaching Mathematics and Science (Prerequisite: Junior/Senior standing)	1 and 1 or 2
SMT 3100	Knowing, Learning, and Adolescent Development in Mathematics and Science (F, S)	3
SCE 4194	Perspectives in Science and Math Education (GL) (Spring)	3
SMT 4301*	Classroom Management and Interactions in STEM (Prerequisites: SMT 3100) (F, S)	3
RED 4325*	Subject Area Reading (Fall/Spring/Summer)	3
TSL 4324*	ESOL Issues and Strategies for Content Teachers (GL) (Fall/Summer)	3
BSC 3910	Research Methods in Biological Sciences (Prerequisite: SMT 2662 or SMT 2044) (Fall)	3
SMT 4664*	Educational Assessment and Project-Based Instruction in Mathematics and Science (Prerequisites: SMT 4301) (F, S)	3
SCE 4944*	Student Teaching (Spring/Fall)	6

***Course requires field experience hours. Other courses may also have field requirements.**

Student Teaching

All courses must be completed prior the start of Student Teaching and both the FTCE: Professional Exam and FTCE: Subject Area Exam must be taken, passed, and official scores received by FIU three weeks prior to Student Teaching. Students must be FULLY admitted to their program in order to apply for Student Teaching. Students may apply for Student Teaching in the Office of Field Experiences in ZEB 130 by February 1st for the Fall semester Student Teaching and June 1st for Spring semester Student Teaching.

Graduation Requirements

1. FIU cumulative GPA of 2.5 or better on a 4.0 scale
2. University Foreign Language Requirement (FLENT/FLEX) must be met
3. University Summer Enrollment Requirement must be met
4. 45 semester hours must be in upper division courses
5. All program and University requirements must be met

For more information on our programs visit our websites: Secondaryed.fiu.edu or FIUteach.fiu.edu