



## DEGREE SHEET / 2019-2020 CATALOG

Student name:

Eagle ID:

Eagle Email:

Phone:

### BS in Biology

This program prepares you to pursue a graduate degree in biology or to go on to professional schools in the health sciences. Training in biology also prepares you for a wide variety of career choices, including careers in research in academic, government, and private research laboratories, science teaching, positions in the biomedical, biotechnology, and pharmaceutical industries, and other related fields. While many positions are open to those holding a BS degree, some may only be open to those holding advanced graduate degrees.

GENERAL EDUCATION REQUIREMENTS (31 Credits)	SEMESTER	GRADE
<b>AREA I: COMMUNICATIONS (6 Credits)</b>		
ENG 1110 Composition I (3) <i>Pre-requisites: ENGL 109 or adequate score on the Course Placement Evaluation</i>		
<b>Choose one of the following courses (3).</b>		
ENGL 1120 Technical Communication (3) <i>Pre-requisite: ENGL 1110</i>		
ENGL 1210 Composition II (3) <i>Pre-requisite: ENGL 1110</i>		
<b>AREA II: MATHEMATICS (3 Credits)</b>		
MATH 1220 College Algebra (3) <i>Pre-Requisite: Math 1215</i>		
<b>AREA III: LABORATORY SCIENCES (4 Credits)</b>		
BIOL 1110/L General Biology with Lab (4) <i>Pre-requisite: ENGL 109 or adequate score on Course Placement Evaluation</i>		
Area III Course (4)		
<b>AREA IV: SOCIAL/BEHAVIORAL SCIENCES (3 Credits)</b> <i>Pre-requisite: ENGL 109 or adequate score on the Course Placement Evaluation</i> <i>You must select one Area IV course.</i>		
Area IV Course (3)		
<b>AREA V: HUMANITIES (3 Credits)</b> <i>Pre-requisite: ENG 109 or adequate score on the Course Placement Evaluation</i> <i>You must select one Area V course.</i>		
Area V Course (3)		

<b>AREA VI: FINE ARTS (3 Credits)</b> <i>You must select one Area VI course</i>		
Area IV Course (3)		
<b>ADDITIONAL NINE CREDIT HOURS (9 Credits)</b>		
COMM 130 Public Speaking (3) <i>Pre-requisite: ENGL 109</i>		
ENVS 2130 Critical Thinking in Science (3)		
<b>Choose one of the following Civics Courses (3)</b>		
POLS 1110 Introduction to Political Science (3)		
POLS 1120 American National Government (3)		
CJUS 1110 Introduction to Criminal Justice (3)		
HIST 1110 United States History I (3)		
HIST 1120 United States History II (3)		
<b>PROGRAM REQUIREMENTS (BS - 89 Credit minimum)</b>		
<b>BIOLOGY CORE CURRICULUM (16 CREDITS)</b>		
BIOL 2110/L Principles of Biology: Cellular and Molecular Biology and Lab (4) <i>Pre-requisites: ENGL 1110 and CHEM 1215/L</i>		
BIOL 2410/L Principles of Biology: Genetics with Lab (4) <i>Pre-requisite: BIOL 2110/L</i>		
<b>OR</b>		
BIOL 2210/L Human Anatomy and Physiology-I with Lab (4)		
BIOL 2610/L Principles of Biology: Biodiversity, Ecology, and Evolution with Lab (4) <i>Pre-requisites: ENGL 1110, MATH 1220, and CHEM1215/L</i>		
BIOL 2640/L Plant and Animal Form and Function with Lab (4) <i>Pre-requisites: MATH 1220, BIOL 2110/L, and CHEM1215/L</i>		
<b>OR</b>		
BIOL 2225/L Human Anatomy and Physiology II with Lab (4) <i>Pre-requisite: BIOL 2210/L</i>		
<b>SEMINAR AND RESEARCH EXPERIENCE (7 CREDITS)</b>		
BIOL 3392 Undergraduate Research Experience (3) <i>Pre-requisite: Permission of Instructor</i>		
BIOL 4472 Undergraduate Seminar in Biology (1) <i>Pre-requisite: Permission of Instructor</i>		
BIOL 4492 Biology Capstone Project (3) <i>Pre-requisite: Permission of Instructor</i>		
<b>SUPPORTIVE COURSES IN MATH, CHEMISTRY, AND PHYSICS (35 CREDITS)</b>		
MATH 1350 Introduction to Statistics (3) <i>Pre-requisite: MATH 1215</i>		



## **SUGGESTED SEQUENCE OF COURSES**

### **FIRST SEMESTER (16 Credits)**

ENGL 1110 English Composition I (3)  
BIOL 1110/L General Biology with Lab (4)  
MATH 1220 College Algebra (3)  
ENVS 2130 Critical Thinking in Science (3)  
COMM 1130 Public Speaking (3)

### **SECOND SEMESTER (16 Credits)**

CHEM 121/5L General Chemistry for STEM Majors I with Lab (4)  
MATH 1250 Trigonometry and Pre-Calculus (4)  
PHYS 1230/L Algebra Based Physics with Lab (4)  
BIOL 2110/L Principles of Biology: Cell and Molecular Biology with Lab (4)

### **THIRD SEMESTER (16 Credits)**

BIOL 2410/L Principles of Biology: Genetics with Lab (4)  
**or**  
BIOL 2210/L Human Anatomy and Physiology-I with Lab (4)

BIOL 2610/L Principles of Biology: Biodiversity, Ecology and Evolution with Lab (4)  
CHEM 1225/L General Chemistry for STEM Majors II with Lab (4)  
MATH 1510 Calculus (4)

### **FOURTH SEMESTER (14 Credits)**

BIOL 2640/L Plant and Animal Form and Function with Lab (4)  
**or**  
BIOL 2225/L Human A&P-II with Lab (4)

CHEM 3301/L Organic Chemistry I with Lab (4)  
MATH 1350 Introduction to Statistics (3)  
Area I Communication (3)

### **FIFTH SEMESTER (15 Credits)**

BIOL 3329 Cellular and Molecular Biology (4)  
PHYS 1240/L Algebra Based Physics II with Lab (4)  
Upper Division Elective (4)  
Area IV Social and Behavioral Science (3)

### **SIXTH SEMESTER (15 Credits)**

Civics course (3)  
Upper Division Elective (4)  
Upper Division Elective (4)  
CHEM 4421/L Biochemistry with Lab (4)

### **SEVENTH SEMESTER (14 Credits)**

BIOL 3392 Undergraduate Research Experience (3)  
Upper Division Elective (4)  
Upper Division Elective (4)  
Area V Humanities (3)

**EIGHTH SEMESTER (14 Credits)**

BIOL 4472 Undergraduate Seminar in Biology (1)

BIOL 4492 Biology Capstone Project (3)

Upper Division Elective (4)

Area VI Fine Arts (3)

# EDUCATIONAL PLANNING FORM (Semester)

FALL SEMESTER	SPRING SEMESTER	SUMMER
<b>Total Units</b>	<b>Total Units</b>	<b>Total Units</b>
FALL SEMESTER	SPRING SEMESTER	SUMMER
<b>Total Units</b>	<b>Total Units</b>	<b>Total Units</b>
FALL SEMESTER	SPRING SEMESTER	SUMMER
<b>Total Units</b>	<b>Total Units</b>	<b>Total Units</b>
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