

2017-2018 B.S. Biology – Environmental Biology Concentration

UNIVERSITY CORE

A. Core Foundations

CORE 101	_____	3
CORE 102	_____	3
HNRS 103*	_____	3
CORE 201 COMS 114 PHIL 111: 213	_____	3
CORE 202 PHIL 112	_____	3

NOTE: Courses listed in multiple areas can only be used to fulfill a single area requirement.

Students can use two courses with their major prefix to fulfill core requirements.

B. Core Skills & Knowledge**

MATHEMATICAL SCIENCES (3SH)	
MATH 119, 138, 151, 152	_____ 3
NATURAL SCIENCES (4 SH)	
CHEM 101	_____ 4
HUMANITIES (3 SH)	
_____	_____ 3
One of the following: CLSS:110 CCST: 110 ENGL 200, HIST 101, 102 PHIL 111, 112, 200; POSC 110; RELN 111, 112, 203, 206	
VISUAL & PERFORMING ARTS (3 SH)	
_____	_____ 3
One of the following: ART 111, 215, 216 CVPA 266 DNCE 111 MUSC 100, 121, 123 THEA 100, 180	
SOCIAL/BEHAV. SCIENCES (3 SH)	
_____	_____ 3
SOCY 110 or 121 recommended	
One of the following: ANSC 101, APST 200 ECON 205, 206, GEOG 101, 102, 103 HIST 111, 112 POSC 120 PSYC 121 RELN 205 SOCY 110, 121	

A. National & International Perspectives**

U. S. PERSPECTIVES (3 SH)	
ECON 205/206 recommended	_____ 3
One of the following: APST 200 ECON 101, 205, 206, ENGL 203 GEOG 201, 202, 203 HIST 111, 112 POSC 120, SOCY 110	
GLOBAL PERSPECTIVES (3SH)	
GEOG 140 recommended	_____ 3
One of the following: CVPA 266, ENGL 201, 202 FORL 103 GEOG 101, 102, 140, 280 HIST 101, 102 INST 101 ITEC 112 PEAC 200 RELN 112, 205, SOCY 121, THEA 180 WMST 101	

COLLEGE CORE

B. Supporting Skills & Knowledge

NATURAL SCIENCES OR MATH (3-4 SH)	
STAT 219	_____ 3
HUMANITIES, VISUAL & PERFORMING ARTS, OR FOREIGN LANGUAGES (3-4 SH)	
_____	_____ 3-4
One of the following: CLSS 110 CCST 110 ENGL 200 HIST 101, 102 PHIL 111, 112, 200; POSC 110; RELN 111, 112, 203, 206; CVPA 266; Or ART 100, 215, 216 DNCE 111, MUSC 100, 121, 123 THEA 100, 180 Or CHNS 101: 102, 201: 202 ARAB 101, 102, 201, 202, FORL 100, 109, 200, 210, 209, 309, 409; FREN 100, 200:210, 300, 320 GRMN 100, 200: 210, 300 LATN 101 102, 201, 350; RUSS 100, 200, 210, 300; SPAN 101: 102, 105 201, 202	
SOCIAL/ BEHAV. SCI. OR HEALTH & WELLNESS (3SH)	
SOCY 110 or 121 recommended	_____ 3
One of the following: ANSC 101, APST 200 ECON 205, 206 GEOG 101, 102, 103 HIST 111, 112 POSC 120; PSYC 121 RELN 205 SOCY 110, 121 HLTH 111,200 NURS 111 NUTR 214; RCPT 200	

Biology Major Environmental Biology Concentration

Course number	Credits	Course name	Fall/Spring Summer	Prerequisites (All BIOL prerequisites require C or better)
BIOL 160*	_____ (2)	Introductory Seminar in Biology	F/S	Freshmen only
BIOL 460*	_____ (2)	Advanced Seminar in Biology	F/S	BIOL 131, 132, 231, and 232 (232 may be concurrent)
*OR Transfer students or others who do not take BIOL 160 must take 4 hours of BIOL 460 (2:2) or 2 hours BIOL 460 plus one additional 3XX/4XX level BIOL elective (excluding BIOL 310, 311, 322, 334, 491, 492 and 495).				
BIOL 131	_____ (4)	Ecology and Adaptation	F/S	
BIOL 132	_____ (4)	Biology of Cells and Microorganisms	F/S	
BIOL 231	_____ (4)	Genetics, Evolution, and Development	F/S	BIOL 132
BIOL 232	_____ (4)	Organismal Biology	F/S	BIOL 131
BIOL 131, 132, 231 and 232 may only be taken TWICE, and must be completed with C or higher before taking any 3XX or 4XX level BIOL Electives.				
CHEM 101	_____ (4)	General Chemistry	F/S/SU	
CHEM 102	_____ (4)	General Chemistry	S/SU	CHEM 101
B.S Requirements				
CHEM 301	_____ (4)	Organic Chemistry I	F/SU	CHEM 102
CHEM 302	_____ (4)	Organic Chemistry II	S/SU	CHEM 301
STAT 219	_____ (3)	Statistics for Biology	F/S/SU	
MATH 119/138/151/152	_____ (3)	Math Core Curriculum see above	F/S/SU	
BIOL 390	_____ (3)	Conservation Biology	S	BIOL 131, 132, 231 & 232: or BIOL 105 & at least one of the following: GEOS 241 or GEOS 335 or GEOG 305
GEOS 250	_____ (4)	Introduction to GIS	F/S	
3-6 credit hours from any combination of hours in the following:				
BIOL 491 and or	_____	Directed Research and Study		C or better in 8 credits in Biology & a GPA of 2.5 in BIOL courses
BIOL 492 and or	_____	Undergraduate Research	F/S/SU	C or better in 8 credits in Biology & a GPA of 2.5 in BIOL courses
BIOL 495	_____	Internship in Biology	F/S/SU	C or better in 16 credits in Biology of lab science & a GPA of 2.5 in BIOL courses & permission of the department chair
One of the courses below: _____ (4)				
BIOL 333		Population and Community Ecology	F (odd years)	BIOL 131, 132, 231, 232 and STAT 219 or STAT 200
BIOL 476		Forest and Wetland Ecology	F (even years)	BIOL 131, 132, 231 & 232: or BIOL 105 & at least one of the following: GEOS 241 or GEOS 335 or GEOG 305
One of the courses below: _____ (3-4)				
BIOL 392		Environmental Toxicology (4)	TBD	BIOL 131, 132, 231, and 232
CHEM 215		Environmental Chemistry (3)	TBD	CHEM 102 or CHEM 103
One of the courses below: _____ (3)				
GEOS 241		Environmental Regulation	S	GEOG 140
ECON 375		Environmental Economics	TBD	ECON 206
SOCY 370		Environmental Sociology	TBD	SOCY 110 or SOCY 121

11-12 credit hours chosen from the below courses: _____ (11-12). Courses taken for requirements listed above may not be counted as electives:

BIOL 215 Plants and Society (4)	BIOL 353 Comparative Behavior (3)	BIOL 425 Evolution (3)	CHEM 215 Environ Chemistry (3)
BIOL 216 General Zoology (4)	BIOL 361 Parasitology (4)	BIOL 462 Invertebrate Zoology (4)	GEOL 474 Hydrogeology (4)
BIOL 217 Flora of Virginia (4)	BIOL 380 Ornithology (4)	BIOL 464 Vertebrate Zoology (4)	GEOS 335 Biogeography (3)
BIOL 333 Population/Community Ecology (4)	BIOL 392 Environ Toxicology (4)	BIOL 476 Forest & Wetland Ecology (4)	
BIOL 351 Comparative Physiology (4)	BIOL 408 Principles Microbiology (4)	BIOL 481 Special Topics when relevant (4)	