

Name _____

Major Applied Biological Sciences

Degree BS

Applied Biological Sciences/Secondary Education Concentration

I. English Proficiency (6 hrs) (University requirement - "C" min required)	Hrs Cr		Trans from	Gr
	ASU	Tr		
ENG 101 First-Year Comp (3) and ENG 102 First-Year Comp (3) or, if eligible, ENG 105 Adv First-Year Comp (3) (see Catalog for eligibility requirements)				
Sub Total (I)				

II. General Studies (35 hrs) (see Catalog for approved courses)

A. Humanities & Social Sciences (15 hrs) Combined requirement: Six hours in one area, nine hours in the other, and three hours must be upper-division.)

Humanities/Fine Arts (6-9 hrs min.) (HU)

Social/Behavioral Sciences (6-9 hrs min) (SB)

Awareness Areas- Cultural, Global and Historical awareness areas must be satisfied. Courses that are listed for a core and awareness area may satisfy both requirements concurrently, as may courses that are listed for more than one awareness area.

C:				
G:				
H:				

B. Literacy/Critical Inquiry (6 hrs min)

L				
L:				

C. Natural Sciences (8 hrs min) SQ/SG- At least four hours must be SQ

SQ/SG: BIO 187 General Biology 1 SG (4)				
SQ/SG: BIO 188 General Biology 2 SQ (4)				

D. Mathematical Studies (6 hrs min) One MA (mathematics course) and one CS (Computer/statistics/quantitative applications) course.

MA: MAT 210 Brief Calculus (3)				
CS: ABS 350 Applied Statistics or Equivalent (3)				
Sub Total (II)				

III. Applied Biological Sciences Core (*May be cross listed with General Studies)

BIO 187 General Biology I (4) SG				
BIO 188 General Biology II (4) SQ				
ABS 270 Sustainable Biological Systems (3)				
ABS 302 Ethical and Policy Issues in Biology (2)				
BIO 340 General Genetics (4)				
ABS 350 Applied Statistics or Equivalent (3) CS				

Choose one of the three courses below:

BIO 360 Animal Physiology (3)				
OR				
ABS 498 Applied Plant Physiology (4)				
OR				
ABS 311 Applied Cell Biology (3)				
MAT 210 Brief Calculus (3) MA				
CHM 113 General Chemistry (4) SQ				
Total: (30 - 31)				

General Elective required for all Freshmen

ASU 101: The ASU Experience (1)				
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IV. Secondary Education Concentration Biology Coursework	Hrs Cr		Trans from	Gr
	ASU	Tr		
Choose between the two courses below:				
ABS 207 Applied Plant Taxonomy (3)				
OR				
ABS 355 Vertebrate Zoology (4)				
ABS 370 Ecology (3)				
MIC 205 Microbiology (3)				
MIC 206 Microbiology Laboratory (1)				
ABS 490 Applied Biological Sciences Seminar (1)				
CHM 116 General Chemistry SQ (4)				
PHY 101 Introduction to Physics SQ (4)				
Approved Upper-Division Electives (3)				
Total: (22 - 23)				

Note: BIO 187, BIO 188, MAT 210, and ABS 350 must be used for both General Studies and concentration requirements to allow graduation within 120 hours.

General elective required for all Freshman:

ASU 101: The ASU Experience (1)				
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V. Secondary Education Course Work

BIO 480 Methods of Teaching Biology (3)				
BIO 482 Adv Methods of Teaching Bio (3)				
EDC 354 Educational Media in the Classroom (3)				
EDC 405 Classroom Management K-12 (3)				
EDC 425 Integrated Learning Exp IV: Adv. Mgt & Prof. Knowledge (2)				
EDC 355 Accom. Instruction for Diverse Learners (3)				
EDP 311 Educational Psychology for Future Teachers (3)				
EDP 313 Childhood and Adolescence (3)				
RDG 301 Literacy & Instr in Cont Areas (3)				
SED 403 Middle and Secondary School Principles, Curriculum, and Methods (3)				
ELL 415 Structured English Immersion (SEI) Methods (3)				
SDE 474 (0-1)				
SDE 484 (10)				
Total: (43-51)				

Strongly Recommended:

MCE 446 Understanding the Culturally Diverse Child (3) C				
SPE 311 Orientation to Education of Exceptional Children (3) SB				
ELL 416 Advanced SEI Methods (3)				

TOTAL PROGRAM HOURS:

I. English				
II. General Studies				
III. ABS Core				
IV. Secondary Educ/Biology Coursework				
V. Secondary Educ Course Work				
Total Program Hours				

Graduation Requirements (Regular Curriculum -120 hours)
Total upper-division hours _____ (minimum required -45)

