

Bachelor of Science in Wildlife and Fisheries Science<sup>a</sup>  
**Wildlife Health Concentration – 2021-22 Catalog**

Department of Forestry, Wildlife and Fisheries  
 University of Tennessee, Knoxville

Student \_\_\_\_\_ Advisor \_\_\_\_\_

Fall Semester	<b>Year 1</b>	Spring Semester
_____ (3) BIOL 150 - Organismal/Ecological Biology _____ <b>OR</b> BIOL 158 - Honors		_____ (2) BIOL 159 – Skills of Biological Investigations
_____ (3) MATH 125 - Basic Calculus		_____ (3) BIOL 160 - Cellular and Molecular Biology
_____ (3) ENGL 101 - English Composition I <b>OR</b> ENGL 118 - Honors		_____ (4) CHEM 122 <b>and</b> CHEM 123- Gen Chem I/Gen Chem I lab
_____ (1) WFS 101 - Current Topics in Wildlife Health		_____ (3) ENGL 102 - English Composition II
_____ (1) WFS 100 - Intro to Wildlife & Fisheries Science		_____ (3) FWF 250 - Conservation
_____ (3) Arts & Humanities Elective <sup>b</sup>		
14		15

Fall Semester	<b>Year 2</b>	Spring Semester
_____ (3) ANSC 220 - Animal Anatomy and Physiology		_____ (2) BIOL 260 - Ecology
_____ (4) CHEM 132 <b>and</b> CHEM 133 - Gen Chem II/Gen Chem II lab		_____ (2) BIOL 269 - Ecology Field-Based Laboratory
_____ (3) FWF 315 - Principles of Wildlife & Fisheries Management		_____ (3) CHEM 260 - Foundations of Organic Chemistry
_____ (3) Arts and Humanities Elective <sup>b</sup>		_____ (1) CHEM 269 - Foundations of Organic Chem Lab
_____ (3) Social Science Elective <sup>b</sup>		_____ (3) MATH 115 - Stat Reason <b>OR</b> STAT 201 Intro Stats
		_____ (3-4) ANSC 340 - Animal Breeding and Genetics <b>OR</b> BIOL 240 - General Genetics
16		14-15

Fall Semester	<b>Year 3</b>	Spring Semester
_____ (3) CHEM 360 - In-depth Organic Chemistry		_____ (4) PHYS 222 - Elements of Physics II
_____ (1) CHEM 359 - In-depth Organic Chemistry Lab		_____ (3) Wildlife Ecology and Management Elective <sup>e</sup>
_____ (4) PHYS 221 - Elements of Physics I		_____ (3) Cultures & Civilizations Elective <sup>b</sup>
_____ (3) Communications Elective <sup>c</sup>		_____ (3-4) Economics Elective <sup>h</sup>
_____ (4) Science Electives <sup>g</sup>		
15		13-14

Fall Semester	<b>Year 4</b>	Spring Semester
_____ (4) BCMB 401 - Biochemistry I		_____ (3) BCMB 311 - Advanced Cellular Biology
_____ (2) BIOL 220 - General Microbiology		_____ (3) WFS 401 - Ecology & Mgt of Wildlife Health
_____ (2) BIOL 229 - General Microbiology Lab		_____ (6) Wildlife Ecology and Management Electives <sup>e</sup>
_____ (3) WFS 431 - Wildlife Physiology and Nutrition		_____ (3) Technical Elective <sup>d</sup>
_____ (3-5) Physiology Elective <sup>f</sup>		
_____ (3) Cultures and Civilizations Elective <sup>b</sup>		
17-19		15

<sup>a</sup> 120 hours required for graduation; courses listed by department, number and title are required.

<sup>b</sup> General Education electives - choose from the University General Education list. Students must complete one course from the Social Sciences list, two courses from the Arts and Humanities list, and two courses from the Cultures and Civilizations list. One of these courses must also be a Communicating through Writing (WC) course.

<sup>c</sup> Communications elective - choose from ALEC 240; ANSC 360; CMST 210, CMST 217, CMST 240, CMST 247.

<sup>d</sup> Technical elective – choose from ANSC 320, ANSC 330, ANSC 380, ANSC 489; ESS 326; EPP 525; FWF 430; GEOG 311, GEOG 411, GEOG 413.

<sup>e</sup> Wildlife Ecology and Management elective - choose from WFS 433, WFS 434, WFS 443, WFS 444, WFS 445.

<sup>f</sup> Physiology elective – choose from BCMB 230, BCMB 440; WFS 450.

<sup>g</sup> Science elective - any 300-level and above course(s) not already required for the major in WFS, FORS, FWF, EPP, ANSC, EEB, MICR, or BCMB.

<sup>h</sup> Economics elective - choose from AREC 201; ECON 201, ECON 207, ECON 211, ECON 213.

## **Elective Choices:**

### Communications elective –

- ALEC 240 Presentation and Sales Strategies for Agricultural Audiences
- ANSC 360 Equine and Food Animal Evaluation
- CMST 210 Public Speaking
- CMST 217 Honors: Public Speaking
- CMST 240 Business and Professional Communication
- CMST 247 Honors: Business and Professional Communication

### Technical elective –

- ANSC 320 Reproductive Physiology and Lactation
- ANSC 330 Comparative Animal Nutrition
- ANSC 380 Animal Health Management
- ANSC 489 Companion and Exotic Animal Management
- ESS 326 GIS/GPS Applications in Agriculture and Environmental Science
- EPP 525 Medical and Veterinary Entomology
- FWF 430 Introduction to Geographic Information Systems (GIS) for Natural Resources
- GEOG 311 Geovisualization and Geographic Information Science
- GEOG 411 Intermediate Geographic Information Science
- GEOG 413 Remote Sensing of the Environment

### Wildlife Ecology and Management electives –

- WFS 433 Amphibian Ecology and Conservation
- WFS 434 Ecology and Conservation of Tropical Mammals
- WFS 443 Fisheries Science
- WFS 444 Ecology and Management of Wild Mammals
- WFS 445 Ecology and Management of Wild Birds

### Physiology elective –

- BCMB 230 Human Physiology
- BCMB 440 General Physiology
- WFS 450 Fish Physiology

### Economics elective –

- AREC 201 Economics of the Global Food and Fiber System
- ECON 201 Introductory Economics: A Survey Course
- ECON 207 Honors: Introductory Economics
- ECON 211 Principles of Microeconomics
- ECON 213 Principles of Macroeconomics