

This roadmap is a recommended semester-by-semester plan of study for this major. However, courses and milestones designed as critical (!) must be completed in the semester listed to ensure a timely graduation.

Critical	Course Subject and Title	Credit Hours	Min. Grade	Major GPA	Attribute	Notes
<b>Semester One [16 Credits]</b>						
<b>Note: Students not placed into MATH 12002 (required in semester 3) should take MATH 11010 (Kent Core course) in first year of study</b>						
!	BSCI 10110 Biological Diversity	4		■	KBS	
!	CHEM 10060 General Chemistry I	4		■	KBS	
!	CHEM 10062 General Chemistry I Laboratory	1		■	KBS	
	UC 10097 Destination Kent State: First Year Experience <sup>1</sup>	1				
	Kent Core Requirement	3				
	Kent Core Requirement	3				
<b>Semester Two [15 Credits]</b>						
!	BSCI 10120 Biological Foundations	4		■	KBS	
!	CHEM 10061 General Chemistry II	4		■	KBS	
!	CHEM 10063 General Chemistry II Laboratory	1		■	KBS	
	Kent Core Requirement	3				
	Kent Core Requirement	3				
<b>Semester Three [16 Credits]</b>						
!	CHEM 20481 Basic Organic Chemistry I (4) or CHEM 30481 Organic Chemistry I (3)	3 - 4		■		
!	Organic Chemistry option <sup>3</sup>	0 - 1		■		
	Kent Core Requirement	3				
	Kent Core Requirement	3				
	Kent Core Requirement	3				
	Botany Core Course <sup>2</sup>	4		■		
<b>Semester Four [13 Credits]</b>						
!	BSCI 30156 Elements of Genetics	3		■		
!	Organic Chemistry option <sup>3</sup>	0 - 3		■		
	Botany Core Course <sup>2</sup>	4		■		
	BSCI and/or CHEM and/or PHY electives <sup>4</sup>	3		■		
	General Electives <sup>5</sup>	3				
<b>Semester Five [16 Credits]</b>						
	MATH 12002 Analytic Geometry and Calculus I	5		■	KMC	
	Foreign Language <sup>6</sup>	4 - 5				
	Botany Core Course <sup>2</sup>	4		■		
	BSCI and/or CHEM and/or PHY electives <sup>4</sup>	3		■		
<b>Semester Six [16 Credits]</b>						
	MATH 12003 Analytic Geometry and Calculus II or MATH 30011 Basic Probability and Statistics	3 - 5		■		
	Foreign Language <sup>6</sup>	4 - 5				
	BSCI and/or CHEM and/or PHY electives <sup>4</sup>	9		■		
<b>Semester Seven [15 Credits]</b>						
	BSCI 40163 Evolution	3		■		
	BSCI 40600 Writing in the Biological Sciences	1	C <sup>7</sup>	■	WIC	
	BSCI and/or CHEM and/or PHY electives <sup>4</sup>	8		■		
	General Electives <sup>5</sup>	3				
<b>Semester Eight [12 Credits]</b>						
	BSCI and/or CHEM and/or PHY electives <sup>4</sup>	3		■		
	General Electives <sup>5</sup>	9				

### Graduation Requirements Summary

Minimum Total Hours	Minimum Upper-Division Hours 30000 – 40000 level course	Minimum Kent Core Hours	Minimum	
			Major GPA	Overall GPA
120	42	36	2.000	2.000

1. UC 10097 is not required of transfer students with 25 credits (excluding College Credit Plus) or students age 21+ at time of admission.

2. Botany Core Course (12 credits)

**Choose from the following:**

BSCI 30267 Plant Physiology (4)	BSCI 30270 General Plant Biology (3)
BSCI 30271 General Plant Biology Laboratory (1)	BSCI 30274 Forestry (3)
BSCI 30275 Local Flora (4) (ELR)	BSCI 30277 Economic Botany (2)
BSCI 40162 Soil Biology (3)	BSCI 40164 Molecular Systematics and Phylogenetics (4)
BSCI 40272 Plant Anatomy (4)	

3. Organic Chemistry option (1-3 credits) – If CHEM 30475 is chosen, must be taken in Semester Three. If CHEM 20482 or CHEM 30482 is chosen, must be taken in Semester Four.

**Choose from the following:**

CHEM 20482 Basic Organic Chemistry II * (2)	CHEM 30475 Organic Chemistry Laboratory I (1) (ELR)
CHEM 30482 Organic Chemistry II (3)	<i>* CHEM 20482 may be substituted with CHEM 30284 Introductory Biological Chemistry with Faculty advisor approval.</i>

4. BSCI and/or CHEM and/or PHY electives (26 credits)

**Choose from the following:**

BSCI Biology courses ** (in consultation with advisor) (11-26)	PHY 13001 General College Physics I (4) (KBS) <b>and</b>
CHEM 30475 Organic Chemistry Laboratory I (1) (ELR)	PHY 13021 General College Physics Laboratory I (1) (KBS)
CHEM 30476 Organic Chemistry Laboratory II (1)	<b>or</b> PHY 23101 General University Physics I (5) (KBS)
CHEM 20482 Basic Organic Chemistry II (2)	PHY 13002 General College Physics II (4) (KBS) <b>and</b>
<b>or</b> CHEM 30482 Organic Chemistry II (3)	PHY 13022 General College Physics Laboratory II (1) (KBS)
	<b>or</b> PHY 23102 General University Physics II (5) (KBS)
<b>**Must choose one of the following (maximum 6 credit hours of any combination allowed) *** :</b>	
BSCI 30105 Career Pathways in Biology (1)	BSCI 40192 Internship in Biological Sciences (3-12) (ELR)
BSCI 40199 Senior Honors Thesis (1-10) (ELR)	BSCI 40196 Individual Investigation (1-3) (ELR)
BSCI 40191 Senior Seminar (1)	<b>***no more than 4 credit hours may be S/U graded</b>

5. Number of credits required depends on meeting minimum 120 credit hours and minimum 42 upper-division credit hours.

6. Fulfills College General Requirement

7. A minimum C (2.00) grade must be earned in BSCI 40600 to fulfill the writing-intensive requirement.

**The following courses may not be used in the elective category for majors or minors in the Department of Biological Sciences**

BSCI 10001 Human Biology	BSCI 10002 Life on Planet Earth
BSCI 10003 Laboratory Experience in Biology	BSCI 10005 Anatomy for Veterinary Technicians
BSCI 11020 Foundational Anatomy and Physiology II	BSCI 11010 Foundational Anatomy and Physiology I
BSCI 20019 Biological Structure and Function	BSCI 16001 Horticultural Botany
BSCI 20022 Basic Microbiology Laboratory	BSCI 20021 Basic Microbiology
BSCI 21020 Anatomy and Physiology II	BSCI 21010 Anatomy and Physiology I
BSCI 26003 Plant Identification and Selection I	BSCI 26002 Ecological Principles of Pest Management
BSCI 30050 Human Genetics	BSCI 26004 Plant Identification and Selection II
	BSCI 40020 Biology of Aging

**University Requirements:** Bachelor's degree-seeking students must meet Kent Core (general education requirements), diversity, writing-intensive and experiential learning requirements. For more information about these requirements, please read the following sections in the University Catalog: Kent Core – [www.kent.edu/catalog/kent-core](http://www.kent.edu/catalog/kent-core); Diversity Course Requirement – [www.kent.edu/catalog/diversity](http://www.kent.edu/catalog/diversity); Writing-Intensive Course Requirement – [www.kent.edu/catalog/wic](http://www.kent.edu/catalog/wic); Experiential Learning Requirement – [www.kent.edu/catalog/elr](http://www.kent.edu/catalog/elr).

**Attribute Legend:** DD Diversity–Domestic; DG Diversity–Global; ELR Experiential Learning; KAD Kent Core Additional; KBS Kent Core Basic Sciences; KCM Kent Core Composition; KFA Kent Core Fine Arts; KHU Kent Core Humanities; KMC Kent Core Mathematics and Critical Reasoning; KSS Kent Core Social Sciences; WIC Writing Intensive