

Bachelor of Science in Conservation Biology Research Track (123 Cr.) **Four-Year Curriculum Plan**

Suggested four-year plan for freshmen entering LMU Fall semester. Always consult LMU's Undergraduate Catalog and discuss with your academic advisor every semester prior to registering for classes. Timing of courses may deviate from this plan based on several factors

First Year — Fall Semester			
CBIO 194 Pre-conservation Seminar	1		
ENGL 101 Composition I*	3		
UACT 100 Strategies for College Success*	1		
BIOL 111 General Biology I & Lab*# Prerequisite: ACT/SAT reading score of 23 placement in ENG 101 or higher, OR successful completion of BIOL 100	4		
SOCI or PSYC 100*#	3		
CHEM 111 General Chemistry I & Lab# Prerequisite: Successful completion (C- or better) in Math 105, Math 115, or Math 120 or a Math ACT of 21, Fall	4		
Total Credits	16		

Total Credits 16

- You should be exploring opportunities to participate in service initiatives.
- Have you joined a club? Think about the Wildlife Society or Earth Club

Second Year — Fall Semester			
History Requirement*	3		
BIOL 224 Ethics in Life Science Research	3		
Upper-Level Major Elective#	4		
MATH 270 Probability & Statistics#	3		
BIOL 290 Writing in the Life Sciences#	1		
Total Credits	14		

- You should be exploring career opportunities and internships
- Keep track of the number of 300/400 level courses you take. You need to complete at least 42 credits for graduation

Third Year — Fall Semester	Cr.
Biodiversity: Invertebrate Option [#] See page 2 for choices	4
Upper-Level Major Elective [#] See page 2 for choices	4
BIOL 370 Ecology & Lab [#] Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs, Fall	4
BIOL 397/X JR Science Seminar [#] Prerequisite: Successful completion (C- or better) of ENGL 102 or equivalent	1

Total Credits

- Make plans to take graduate school entrance exams (e.g. GRE)
- Identify graduate programs and/or internships in the field of interest

Fourth Year — Fall Semester	Cr.			
Biodiversity: Plant Option#	4			
Biodiversity: Vertebrate Option#				
Upper-Level Major Elective#	4			
CBIO 421 Geographic Info. Systems I#	3			
Prerequisite: Successful completion (C- or better) of ISYS 100, Fall even years				
BIOL 483 Research in Biology#	1			
Total Credits	16			

- Complete the Intent to Graduate form during your Academic Advising Meeting.
- Start applying to graduate programs and searching for jobs in field of interest

First Year — Spring Semester	Cr.
ENGL 102 Composition II* Prerequisite for BIOL 290	3
LNCN 100 Lincoln's Life & Legacy*	1
BIOL 112 General Biology II & Lab*# Prerequisite: Successful completion (C- or better) of BIOL 111 with lab	4
CHEM 112 General Chemistry II & Lab [#] Prerequisite: Successful completion (C- or better of CHEM 111 with lab, Spring	4
MATH 150 Calculus I Prerequisite: Successful completion (C- or better) of MATH 120 or ACT sub-score of 26 or higher	4

Total Credits 16

Total Credits

Think about how you can explore career options during the summer

Second Year — Spring Semester				
History Requirement*	3			
Biodiversity: Vertebrate Option [#] See page 2 for choices	4			
BIOL 315 Molecular Genetics & Lab# Prerequisite: Successful completion (Cor better) of BIOL 111 and 112 and CHEM 111 with labs	4			
BIOL 380 Research Design & Analysis# Prerequisite: Successful completion (C- or better) of MATH 270, BIOL 111 and 112 with labs	3			
CBIO 200 Conservation Biology [#] Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs, Spring	3			

Narrow down career options. Gather information on what is needed to achieve those careers, i.e. internships, experience, professional/graduate school

Third Year — Spring Semester	Cr.
COMM 200 Fund Speech & Comm.*	3
Fine Arts Elective*	3
Fine Arts Elective*	3
Upper-Level Major Elective# See page 2 for choices	3
ECON 212 or 213 Micro/Macroeconomics#	3
Total Credits	15

- Study for graduate school exams and take exams over the summer
- Apply for summer internships in field of interest or research experiences

Fourth Year — Spring Semester	Cr.
BIOL 410 Evolution#	3
Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs, Spring odd years	
CIVX 300 American Civics*	2
Upper-Level Major Elective#	3
CBIO 400 Conserv Bio. App. & Analy. # Prerequisite: Successful completion (C- or better) of BIOL 200, 370 with labs and two biodiversity courses, Spring	3
CBIO 422 Geographic Info Systems II [#] Prerequisite: Successful completion (C- or better) of CBIO 421, Spring odd years	3
BIOL 483 Research in Biology#	1
BIOL 497/Z Senior Science Seminar#	1

- Look for opportunities to present research
- Apply to jobs in career interest, if entering the workforce

*LMU Core Curriculum Requirement: See LMU undergraduate catalog for details

Major-Specific Requirement/Collateral Requirement: These courses must be passed with at least a C- or better to progress in the program. See LMU catalog for specific grade requirements.

16

Total Credits

Course Options for Program Track Electives

Biodiversity Invertebrate Options Must select <i>one</i> of the following courses	Cr.
BIOL 340 Invertebrate Zoology Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs, Fall	4
BIOL 350 Entomology Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs, Fall even years	4
If the course has a corresponding laboratory course, the laboratory course be taken Must be passed with a C- or better to progress in the program.	e MUST

Biodiversity Plant Options Must select one of the following courses	Cr.
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BIOL 320 Principles of Botany	4
Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with	
labs, Spring	
BIOL 330 Field Botany	4
Prerequisite: completion (C- or better) of BIOL 111 and 112 with labs, Fall	
If the course has a corresponding laboratory course, the laboratory course	MUST
be taken	
 Must be passed with a C- or better to progress in the program. 	

Biodiversity Vertebrate Options Must select two of the following courses	Cr.
CBIO 330 & Lab Ichthyology Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Fall odd years	4
CBIO 340 & Lab Herpetology Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Fall odd years	4
CBIO 350 & Lab Ornithology Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Spring even years	4
CBIO 360 & Lab Mammalogy Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Fall even years	4
If the course has a corresponding laboratory course, the laboratory course has taken.	e MUST

Credit Hour Requirements

Must be passed with a C- or better to progress in the program.

In order to graduate you need to complete a minimum of 122 credit hours. At least 36 of these hours must be at the 300/400 level. Track your hours in each of these categories as you progress to ensure timely completion of the program.

	# of credit hours				
Semester	Current semester	300/400	Total Earned (Add all semesters)	Total 300/400 (Add all semesters)	Cumulative GPA
1 st Yr. Fall					
1 st Yr. Spring					
2 nd Yr. Fall					
2 nd Yr. Spring					
3 rd Yr. Fall					
3 rd Yr. Spring					
4 th Yr. Fall					
4 th Yr. Spring					

Upper-Level Major Electives	Cr.
Must select 18 credits from the following courses	4
BIOL 310 Comparative Vertebrate Anatomy Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs and CHEM 111 and 112 with labs, Fall	4
BIOL 336 General Microbiology Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs and CHEM 111 and 112 with labs, Spring	4
BIOL 360 Immunology Prerequisites: Successful completion (C- or better) of BIOL 111 and 112 with labs and	3
BIOL 365 General Physiology Prerequisite: Successful completion (C- or better) of BIOL 310 with lab. Corequisite:	4
BIOL 365L lab, 1 credit hour. Spring. BIOL 441 Biochemistry I Prerequisite: Successful completion (C- or better) of BIOL 111 and 112 with labs and	3
CHEM 221 and 222 with labs, Fall BIOL 442 Biochemistry II	4
Prerequisite: Successful completion (C- or better) of BIOL 442 with lab, Spring	4
BIOL 450 Molecular Cell Biology Prerequisite: Successful completion (C- or better) of BIOL 315 with lab and BIOL 441, Spring	4
CBIO 210 Wildlife Management Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Fall	3
CBIO 220 Freshwater Fisheries Management Prerequisite: Successful completion (C- or better) of BIOL 111 and BIOL 112 with labs, Spring even years	4
CBIO 250 Soils Prerequisite: Successful completion (C- or better) of CHEM 111 with Lab, Fall odd	4
CBIO 370 Land Use & Environmental Policy Prerequisite: Successful completion (C- or better) of CHEM 111 with lab, Fall odd	3
CBIO 410 Environmental Issues in Appalachia Offered as needed	3
CBIO 420 Wetland Ecosystems Prerequisite: Successful completion (C- or better) of BIOL 370 with lab, Fall even years	3
CBIO 430 Terrestrial Ecosystems Prerequisite: Successful completion (C- or better) of BIOL 370 with lab, Spring even years	3
CBIO 440 Freshwater Ecosystems Prerequisite: Successful completion (C- or better) of BIOL 370 with lab, Spring odd years	3
CHEM 221 Organic Chemistry I Prerequisite: Successful completion (C- or better) of CHEM 112 with lab, Fall	4
CHEM 222 Organic Chemistry II Prerequisite: Successful completion (C- or better) of CHEM 222 with lab, Spring	4
CHEM 230 Environmental Chemistry Prerequisite: Successful completion (C- or better) of CHEM 220 with lab, Spring	4
GEOG 300 Environmental Geography Prerequisite: Successful completion (C- or better) of ENGL 102 and Gen Ed core curriculum, Behavioral and Social Sciences	4
GEOG 440 Geography of Appalachia Prerequisite: Successful completion of ENGL 102 or its equivalent	3
PHYS 211 General Physics I Prerequisit: Math ACT sub-score of 26 or higher, or (2) successful completion (grade of C- or better) in MATH 120 Trigonometry, or (3) successful completion (grade of C- or better) in MATH 150 Calculus I	4
PHYS 212 General Physics II Prerequisite: successful completion (grade of C- or better) in PHYS 211	4
VHS 300 Vet. Parasitology & Entomology Prerequisite: Successful completion (C- or better) of BIOL 112 with lab and Junior Standing	4
VHS 310 Wildlife Diseases Prerequisite BIOL 112/112	3
VHS 330 One Health • If the course has a corresponding laboratory course, the laboratory course MUST b	3 e taken
Must be passed with a C- or better to progress in the program.	