

APPLIED AND AGRICULTURAL BIOLOGY (ENVIRONMENTAL BIOLOGY) - BACHELOR OF SCIENCE IN AGRICULTURE

A Suggested Plan of Study for Students

This roadmap assumes student placement in MATH 1220G College Algebra and ENGL 1110G Composition I. The contents and order of this roadmap may vary depending on initial student placement in mathematics and English. It is only a suggested plan of study for students and is not intended as a contract. Course availability may vary from fall to spring semester and may be subject to modification or change.

First Year		Credits
Semester 1		
ENGL 1110G or ENGL 1110H	Composition I ¹ or Composition I Honors	4
MATH 1220G	College Algebra ¹	3
EPWS 1110 & 1110L	Applied Biology and Applied Biology Lab	4
ACES 1120	Freshman Orientation	1
Area IV: Social and Behavioral Science Course ²		3
Credits		15
Semester 2		
ENGL 2210G or ENGL 2210H	Professional and Technical Communication ¹ or Professional and Technical Communication	3
MATH 1430G	Applications of Calculus I ¹	3
BIOL 2610G	Principles of Biology: Biodiversity, Ecology, and Evolution ¹	3
ACOM 1130G	Effective Leadership and Communication in Agriculture	3
Area V: Humanities Course ²		3
Credits		15
Second Year		
Semester 1		
CHEM 1215G	General Chemistry I Lecture and Laboratory for STEM Majors	4
BIOL 2110G	Principles of Biology: Cellular and Molecular Biology	3
EPWS 380V	Science & Society	3
Area VI: Creative and Fine Arts Course ²		3
Elective Course		2
Credits		15
Semester 2		
CHEM 1225G	General Chemistry II Lecture and Laboratory for STEM Majors	4
BIOL 311	General Microbiology ¹	3
BIOL 313 or BIOL 322	Structure and Function of Plants (Fall Only) ¹ or Zoology	3
VWW: Viewing a Wider World Course ³		4
Credits		14

Third Year		
Semester 1		
CHEM 2115	Survey of Organic Chemistry and Laboratory	4
AGRO 305	Principles of Genetics	3
SOIL 2110	Introduction to Soil Science	3
EPWS 310	Plant Pathology (Fall Only) ¹	4
A ST 311	Statistical Applications ¹	3
Credits		17
Semester 2		
PHYS 1230G & PHYS 1230L	Algebra-Based Physics I and Algebra-Based Physics I Lab	4
EPWS 301	Agricultural Biotechnology (Spring Only) ¹	3
VWW: Viewing a Wider World Course ³		3
Departmental Elective Course ⁴		3
Elective Course		3
Credits		16
Fourth Year		
Semester 1		
EPWS 311	Introduction to Weed Science	4
EPWS 302	General Entomology	4
EPWS 492	Diagnosing Plant Disorders	3
TOX 361	Basic Toxicology	3
Elective Course		1
Credits		15
Semester 2		
EPWS 447	Seminar	1
EPWS 455	Advanced Integrated Pest Management (Odd Year Spring Only) ¹	3
ENVS 301	Principles of Ecology	3
EPWS 314	Plant Physiology ¹	3
Departmental Elective Course ⁴		3
Credits		13
Total Credits		120

¹ These courses have prerequisites and it is the students responsibility to check and fulfill all course prerequisites listed for these courses.

² See the General Education (<https://catalogs.nmsu.edu/nmsu/general-education-viewing-wider-world/>) section of the catalog for a full list of courses.

³ See the Viewing a Wider World (<https://catalogs.nmsu.edu/nmsu/general-education-viewing-wider-world/#viewingawiderworldtext>) section of the catalog for a full list of courses.

⁴ Departmental Elective Course List (two required):

- AGRO 365 Principles of Crop Production (Odd Years Fall Only)
- AGRO 471 Plant Mineral Nutrition (Odd Years Spring Only)
- EPWS 325V Insects, Humans, and the Environment
- EPWS 420 Environmental Behavior of Pesticides
- EPWS 451 Special Topics (Spring Only)
- ENVS 370 Environmental Soil Science
- GEOG 381 Cartography and GIS