

Degree Requirements for Biology Majors (2007-2008)

The following contains information on the courses required to fulfill a degree in Biology at New Mexico State. **A minimum of 128 credits must be taken, 48 at the 300 level or above.** Below you will find a listing of courses that must be taken to fulfill departmental requirements as well as College of Arts and Sciences requirements. You must earn a **C or better** in all departmentally required classes.

BIOLOGY DEPARTMENTAL REQUIREMENTS

Biology courses (at least 22cr., upper division¹):

Mandatory courses:

- BIOL 111G&L Natural History of Life and Lab
- BIOL 211 G&L Cellular & Organismal Biology and Lab
- BIOL 305 Principles of Genetics
- BIOL 467 Evolution

In addition to the above classes, students must take one class in each of the following biological areas.

Note: At least one of these must have a laboratory or field component².

Cellular Integration (3cr.):

- BIOL 311 General Microbiology
(optional 2 cr. lab available)
- BIOL 377 Cell Biology
- BIOL 474 Immunology
- BIOL 490 Neurobiology

Organismal Integration (3-4 cr.):

- BIOL 314 Plant Physiology
- BIOL 354 Human Physiology
(optional 1 cr. lab available)
- BIOL 381 Animal Physiology

Evolutionary Pattern (3-4cr.):

(Note: all except 439 have a required lab)

- BIOL 312 Plant Taxonomy
- BIOL 313 Structure & Function of Plants
- BIOL 322 Zoology
- BIOL 330 Comp. Anatomy & Embryology
- BIOL 439 Animal Behavior
- BIOL 447 Ornithology
- BIOL 465 Invertebrate Zoology

Ecology (3cr.):

- BIOL 301 Principles of Ecology
- BIOL 473 Ecology of Microorganisms

Other departmental requirements (required non-biology classes)

(Note: all of these courses are required)

- CHEM 111 General Chemistry I
- CHEM 112 General Chemistry II
- CHEM 211 Organic Chemistry **or** CHEM 313 Organic Chemistry I
- CHEM 314 Organic Chemistry II
- CHEM 315 Organic Chemistry Lab
- BCHE² 341 Survey of Biochem **or** BCHE 395 Biochemistry
- MATH 142G Calc for Bio & Mngmt Sci **or** MATH 191 Calculus & Analyt. Geometry I
- E ST² 311G Statistical Applications ← (Stats Required)
- PHYS³ 211 General Physics I **or** PHYS 221 General Physics for Life Sciences I
- PHYS 211L Gen Phys Lab I PHYS 211L Gen Phys Lab I
- PHYS³ 212 General Physics II **or** PHYS 222 General Physics for Life Sciences II
- PHYS 212 L General Physics Lab II PHYS 212 L General Physics Lab II

¹ BA students require 20 hours upper division

² Not required for BA degree

³ BA students may take 1 course from ASTR, CS, GEOL or PHYS110G to fulfill Physics requirement

NEW MEXICO COMMON CORE REQUIREMENTS

In each area the total credits needed must come from courses in different disciplines.

Area 1 – Communication (9-10 cr.)

ENGL 111G, 111H, or SPCD 111G
ENGL 203G, 211G, **218G**, 311G or 318G
COMM 253G or 265G, HON 265G

Second Language – complete 212/214 level

_____ 111
_____ 112/113
_____ 211/213
_____ 212/214

Area 2 – Mathematics (3cr.)

Satisfied by taking departmental requirements

American Sign language option: complete 476 level

Complete in sequence, CD 374,375,476

Waiver option: completed 3 yrs of H.S.

Area 3 – Laboratory Sciences (8cr.)

Satisfied by taking departmental requirements

VEIWING A WIDER WORLD (6cr.)

Viewing a Wider World courses are a prescribed list of 300- and 400-level general education courses. You must take 2 courses from 2 different colleges, other than the College of Arts & Science.

(see list of VWW courses offered in the Class Schedule)

A total of 15 credits (5 classes) must come from Areas 4 & 5.

2 classes from Area 4

2 classes from Area 5

1 class from either Area 4 or 5

Area 4 – Social/Behavioral Sciences (6-9cr.)

ANTH 120G, 125G, 201G, 202G, 203G

HON 223G, 235G, 237G

CJ 101

ECON 201G, 251G, 252G

GEOG 112G, 120G

GOVT 100G, 110G, 150G, 160G

HON 248G, 249G

LING 200G

PSY 201G

HON 203G, 232G

SOC 101G, 201G

W S 201G, 202G

Area 5 – Humanities and Fine Arts (6-9cr.)

ART 101G, 110G, 295, 296, HON 216G

ENGL 115G, 116G, 220G, 244G

HIST 101G, 102G, 201G, 202G, 211G, 212G, 221G,

HON 221G, 222G, 239G, 241G, 242G

MUS 101G, 201G, HON 208G

PHIL 101G, 136G, 201G, 211G, 223G

HON 225G, 226G, 227G, 228

THTR 101G, HON 270G