

Proposal to Revise the BA Program Curriculum in Biological Sciences

Currently, students in the BA degree program in Biological Sciences are required to complete 33 BISC credits. Within the core, students can choose one of the following two courses: Cell Biology, BISC305 or Molecular Biology of the Cell, BISC401.

The department faculty voted to approve the following change to the curriculum: students will now be required to take *both* BISC305 and BISC401, and the total required BISC credits will be increased from 33 to 36.

There were several reasons behind these proposed changes. First, it was determined that there is not that much overlap in the course content, and that both courses cover non-redundant content that is vital for current students of biology. Furthermore, students planning to go on to post-baccalaureate professional or graduate programs will, in most cases, find both courses highly relevant. Finally, students who had been selecting BISC305 as their option, and therefore not taking BISC401, were precluded from taking many of our 600-level classes, which require BISC401 as a prerequisite. BA degree students are required to take a 600-level BISC course as part of the curriculum, so this restriction was proving to create scheduling problems for a large number of our majors.

There is precedent in other units for requiring 36 credit hours of major course work.

UNIVERSITY FACULTY SENATE FORMS

Academic Program Approval

This form is a routing document for the approval of new and revised academic programs. Proposing department should complete this form. For more information, call the Faculty Senate Office at 831-2921.

Submitted by: ___ Gary Laverty _____ phone number_ 831 8180 _____

Department: ___ Biological Sciences _____ email address __laverty@udel.edu _____

Action: __ Revise major

(Example: add major/minor/concentration, delete major/minor/concentration, revise major/minor/concentration, academic unit name change, request for permanent status, policy change, etc.)

Effective

term _____ 14F _____
(use format 04F, 05W)

Current

degree _____ BA _____
(Example: BA, BACH, BACJ, HBA, EDD, MA, MBA, etc.)

Proposed change leads to the degree of: _____ BA _____
(Example: BA, BACH, BACJ, HBA, EDD, MA, MBA, etc.)

Proposed name: _____ not applicable

Proposed new name for revised or new major / minor / concentration / academic unit
(if applicable)

Revising or Deleting:

Undergraduate major / Concentration: _____ Biological Sciences BAAS _____
(Example: Applied Music – Instrumental degree BMAS)

Undergraduate minor: _____
(Example: African Studies, Business Administration, English, Leadership, etc.)

Graduate Program Policy statement change: _____
(**Must attach** your Graduate Program Policy Statement)

Graduate Program of Study: _____
(Example: Animal Science: MS Animal Science: PHD Economics: MA Economics: PHD)

Graduate minor / concentration: _____

Note: all graduate studies proposals must include an electronic copy of the Graduate Program Policy Document, highlighting the changes made to the original policy document.

List new courses required for the new or revised curriculum. How do they support the overall program objectives of the major/minor/concentrations)?

(Be aware that approval of the curriculum is dependent upon these courses successfully passing through the Course Challenge list. If there are no new courses enter "None")

NONE

Explain, when appropriate, how this new/revised curriculum supports the 10 goals of undergraduate education: <http://www.ugs.udel.edu/gened/>

Several years ago we formulated a set of learning goals for our majors' curriculum. This revision does not affect our learning goals, but simply adds additional content to the curriculum.

Identify other units affected by the proposed changes:

(Attach permission from the affected units. If no other unit is affected, enter "None")

None

Describe the rationale for the proposed program change(s):

(Explain your reasons for creating, revising, or deleting the curriculum or program.)

Majors will now be required to take both BISC305 (Cell Biology) and BISC401 (Molecular Biology of the Cell), rather than having a choice between these two. Total required BISC credits is increased from 33 to 36. Our faculty feel that both areas of biology are particularly important fields of biology inquiry, and that both courses are critical to preparation for graduate or professional post baccalaureate programs. Furthermore, many of our 600-level literature-based courses (majors are required to take one) require BISC401 as a prerequisite.

Program Requirements:

(Show the new or revised curriculum as it should appear in the Course Catalog. If this is a revision, be sure to indicate the changes being made to the current curriculum and **include a side-by-side comparison** of the credit distribution before and after the proposed change.)

Majors will now be required to take both BISC305 (Cell Biology) and BISC401 (Molecular Biology of the Cell), rather than having a choice between these two. Total required BISC credits is increased from 33 to 36.

Side-by-side comparison of the relevant changes to catalog description are below, followed by the full catalog description with changes indicated by ~~strikeout~~ and red font.

Current Description

Degree Requirements

All of the following:

Biology Courses¹

Course Name and Number	Credit Hours
BISC 207-208 Introductory Biology I and II	8
BISC 302 General Ecology	3
BISC 306 General Physiology	3
a. BISC 305 Cell Biology, OR b. BISC 401 Molecular Biology of the Cell	3
BISC 403 Genetic and Evolutionary Biology	3

Additional Biology courses at the 300 level or above to a total of 33 credit hours.^{1, 11}
Six of the 33 credits may come from a list of approved courses from other academic units.

Proposed Change

Degree Requirements

All of the following:

Biology Courses¹

Course Name and Number	Credit Hours
BISC 207-208 Introductory Biology I and II	8
BISC 302 General Ecology	3
BISC 306 General Physiology	3
BISC 305 Cell Biology	3
BISC 401 Molecular Biology of the Cell	3
BISC 403 Genetic and Evolutionary Biology	3

²Additional Biology courses at the 300 level or above to a **total of 36 credit hours**.^{1, 11}

Six of the **36 credits** may come from a list of approved courses from other academic units.²

Current catalog description. (Changes indicated by strike-out and red font)

DEGREE: BACHELOR OF ARTS
MAJOR: BIOLOGICAL SCIENCES

CURRICULUM CREDITS

University and College requirements.

MAJOR REQUIREMENTS

Minimum grade C- required in all BISC courses for a total of at least 33 credits in biology.

Core:

BISC 207/BISC 208	Introductory Biology I and II	8
BISC 302	General Ecology	3
BISC 306	General Physiology	3
BISC 305 OR BISC 401	Cell Physiology OR Molecular Biology of the Cell	3
BISC401	Molecular Biology of the Cell	3
BISC 403	Genetic and Evolutionary Biology	3

Biology Lab:

One of the following lab courses. The corresponding lecture is a prerequisite. (THE LECTURE AND THE LAB CANNOT BE TAKEN SIMULTANEOUSLY EXCEPT FOR BISC 312, WHICH MAY BE TAKEN CONCURRENTLY WITH BISC 302).

BISC 312	Field Ecology	3
BISC 315	Experimental Cell Biology	3
BISC 316	Experimental Physiology	3
BISC 411	Experimental Molecular Biology	3
BISC 413	Advanced Genetics Laboratory	3
BISC 484	Computer Based Genetics Laboratory	3

Literature-based Biology:

A literature-based 600 level course chosen from a list on the department website 3-4

Biology Electives:

Biology electives at the 300-level or above to total ~~33~~ **36** credit hours in Biological Sciences. BISC 100, BISC 207, and BISC 208 count towards the total of ~~33~~ **36** credits needed for the major.

ROUTING AND AUTHORIZATION: (Please do not remove supporting documentation.)

Department Chairperson _____ Date _____

Dean of College _____ Date _____

Chairperson, College Curriculum Committee _____ Date _____

Chairperson, Senate Com. on UG or GR Studies _____ Date _____

Chairperson, Senate Coordinating Com. _____ Date _____

Secretary, Faculty Senate _____ Date _____

Date of Senate Resolution _____ Date to be Effective _____

Registrar _____ Program Code _____ Date _____

Vice Provost for Academic Affairs & International Programs _____ Date _____

Provost _____ Date _____

Board of Trustee Notification _____ Date _____

Revised 10/23/2007 /khs