Significant Changes in the Requirements for the Minor in Biology

New Degree Program
New Major
New Minor
New Certificate of Graduate Study Program (COGS & COGA)
Major changes of degree requirements/major/minor certificate program
Changes to College name, School, Department, or Degree
Quasi curricular change

Signatures Required: representing approval before submission to Office of the Senate

Department Chair: Date: 2/11/06
Department CURRICULUM Chair: Date: 2/11/06
Academic DEAN: Date:

COLLEGE CURRICULUM COMMITTEE: Open Hearing Date: Approved Date: 2/23/06
Not Approved

Signature: College Curriculum Chair

Signature: SENATE CURRICULUM CHAIR Date: 2/9/06

Comments:

Signature: Executive Vice President/Provost: Date: 2/9/06
Approved: 1
Not Approved:

Signature: REGISTRAR Date: 2/9/06
Course Description Received & Approved
Hegis Taxonomy & Course

Notification Forward:

SCC CHAIR Academic Dean
IR Department Chair
CAP VP/Student Affairs
Registrar Other-
SIGNIFICANT CHANGES IN THE REQUIREMENTS FOR
THE MINOR IN BIOLOGY

REVISED MARCH 2006

DETAILS:

a. Proposal Title: Significant Changes in the Requirements for the Minor in Biology

b. Sponsor(s): Joanne Scott, Ph.D., Associate Professor, Biological Sciences Department, and the Biological Sciences Department

c. Credit Hours: 23-24 hours total

d. Course Levels: Undergraduate

e. Prerequisites: N/A

f. Suggested Time & Scale of Implementation: Effective for in-coming freshmen Fall 2007 and for in-coming transfer students Fall 2009.

RATIONALE & CURRICULAR EFFECTS:

Recently the Biological Sciences Department revised its major. Effective Fall 2006, instead of the traditional Biology I and Biology II (old system: 0401100 & 0401101; new system: BIOL 01100 & BIOL 01101) as the first-year introductory courses, Biology majors at Rowan will take a sequence of four (4) “core” courses that combine the traditional Biology I and II course content with learning skills and hands-on science/laboratory skills. The Department has eliminated the subdivision of our biology courses into five (5) curricular “banks”. Biology majors must get a grade of at least a C in each Biology course; a grade below C will result in that course not being credited towards the Major. This new Major has been approved by the University Curriculum Committee.

The proposed changes in the requirements for the Minor reflect the revision of the Major. This proposal does not seek to change the number of credits or the number of courses required for the Minor in Biology. Thus, this proposal is not expected to alter the Department’s resource requirements with respect to staffing and library needs.

Students enrolled in the Minor prior to the implementation date will have the option either to be “grandfathered” (permitting them to complete the Minor under the current requirements) or to complete the Minor under the new system proposed here.

Students who transfer to Rowan having already completed the traditional Biology I and II (old system: 0401100 & 040110; new system BIOL 01100 & BIOL 01101) at another college/university will be enrolled in a special version of Biology 3 for transfer students (BIOL 01202), designed to focus on the learning skills and hands-on science skills to which the Rowan
students had been exposed in our new Biology 1 and Biology 2. After successful completion of this special course for such transfer students, those students will proceed to Biology 4 (BIOL 01204). Transfer courses other than [traditional] Biology I and II will be evaluated on a case-by-case basis.

**Current Requirements for the Minor in Biology:**

23-24 credits.

- Biology I and II (old system: 0401.100 & 0401.101; new system: BIOL 01100 & BIOL 01101) and 4 additional Biology courses, at least 3 of which must be 300-level or above; these 4 courses must represent at least 3 of the 5 curricular “banks”.
  (Some Biology courses are placed in more than 1 bank; students may count a course towards fulfillment of only 1 bank.)

A minimum of 8 credits must be completed at Rowan.  
A minimum grade of C- must be earned in each Biology course.

**Proposed Requirements for the Minor in Biology:**

23-24 credits.

- Biology 1: Diversity, Evolution, and Adaptation (BIOL 01104);  
- Biology 2: Genetics (BIOL 01106);  
- Biology 3: Cell Biology (BIOL 01203); and  
- Biology 4: Global Ecology (BIOL 01204).  

Two (2) additional Biology courses, both of which must be 300-level or above.

A minimum of 15 credits must be completed at Rowan.  
A minimum grade of C must be earned in each Biology course.

**RESULTS OF CONSULTATIONS:**

The Departments of Chemistry and Biochemistry, Physics and Astronomy, Psychology, Geography and Anthropology, and Computer Science were consulted. Copies of their letters of support are attached to this proposal or are being sent under separate cover.
CATALOG DESCRIPTION

The Minor in Biology consists of 23-24 semester hours, with a minimum of 15 of these to be taken at Rowan University. The 300- or 400-level courses may be taken in any order. In keeping with the policy of the Biology major, any Biology grade below a C will not count towards the Minor.

Biology 1: Diversity and Evolution (BIOL 01104);
Biology 2: Genetics (BIOL 01106);
Biology 3: Cell Biology (BIOL 01203);
Biology 4: Global Ecology (BIOL 01204).
Two (2) additional Biology courses, both of which must be 300-level or above.
Date: February 9, 2006
To: Joanne Scott, Department of Biological Sciences
From: Jeff Hettinger, Chair, Department of Physics and Astronomy
Re: Biology minor

The Department of Physics and Astronomy supports the modifications to the Minor in Biology. We recognize that this is an essential change with the changing introductory courses in the Biology program. The changes to the minor are favorable for students in our majors since the course titles will clarify course content on transcripts. However, the modification will likely only impact a small number of students from our program, i.e. those that are interested in pursuing Biophysics in graduate school.
Scott, Joanne

From: Newland, Robert
Sent: Wednesday, February 08, 2006 2:41 PM
To: Scott, Joanne
Subject: Re: Revision of the Minor in Biology

In light of our recent support for the changes in the BS Biology program we naturally support this related change in the minor program as well.

Robert Newland, Ph.D.
Chair, Chemistry & Biochemistry
Rowan University
201 Mullica Hill Rd.
Glassboro, NJ 08028
(856) 256-4502
FAX (856) 256-4478
newland@rowan.edu

2/8/2006
The Computer Science Department supports the proposed revision to the Minor in Biology. The revised course sequence in the Biology major and minor will give students a stronger grounding in the fundamental concepts and laboratory techniques of biology.

Nancy Tinkham
Computer Science, Rowan University
nlt@elvis.rowan.edu
To: Joanne Scott, Department of Biological Sciences
From: Keiko Stoeckig, Chairperson, Psychology Department
Date: February 3, 2006
Re: proposal for changes to the Minor in Biology

The Psychology Department has been informed of the proposed changes to the minor in Biology. The Psychology Department is in full support of this proposed change.

It is reasonable to expect that a modification to the Minor program curriculum would be required to accommodate the changes recently made to the Major program curriculum in Biological Sciences. This proposal appears to address this accommodation quite well.

We do not envision that the changes proposed to the Biology minor would have a negative impact on Psychology majors wishing to pursue a minor in Biology, and the additional structure of the minor program might actually be beneficial to those students pursuing the minor.

Thank you for the opportunity to review your proposal for changes to the Minor in Biology. If you require additional information, please feel free to contact me at x4821 or stoeckig@rowan.edu.
Rowan University
Curriculum Proposal- LIBRARY RESOURCE FORM

THIS FORM MUST BE COMPLETED FOR ALL CURRICULUM PROPOSALS
The purpose of this form is to provide a channel of communication between the Campbell Library staff and faculty when changing and designing new courses/programs. The information will be used to assess the resources available in the library, and to identify resources the library should acquire to support the course/program. The information will also provide the rationale for institutional support for library acquisitions. This form should be completed in a coordinated effort between the course sponsor(s) and the academic department liaison librarian.

Note: Sponsor(s) complete parts A & B
If assistance is required to complete, please notify the librarian liaison.
Forward this form to the librarian who will complete parts C, D & E

When form is completed, attach to the original curriculum proposal before submitting to the Senate office.

A. College: LAS  Department: Biological Sciences

Proposed by: Joanne Scott, Ph.D.  Date: 2-14-06

COURSE TITLE: N/A  (program revision)

Anticipated Date for Course/Program Offering: Fall '07

B. List specific resources that should be acquired to support this course.

Not a course. Change in requirements for the Minor. Number of courses required for the new Minor is not being changed, so no additional library resources will be needed.

C. Describe the resources available in the library to support this course/program, including reference, monographic, electronic databases, audio-visual materials, etc. A summary statement is sufficient.

Existing reference, monographic, and electronic resources are sufficient to support this change.

D. List key periodicals available in the library to support this course/program.

Existing permanent subscriptions are sufficient to support the change.

E. Librarian comments & recommendations:

This change can be supported by the library.

LIBRARIAN LIAISON: Denise Brush  Signature: Denise L. Brush
**PART I: INFORMATION**

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<td>Sponsor(s) in Attendance</td>
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**PART II: COMMON PROBLEMS REVIEWED**

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<tr>
<td>Prerequisites consistent (initial page and catalog description)</td>
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<td>Course title consistent throughout proposal</td>
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<tr>
<td>Catalog description – on separate page – complete with HEGIS, credits, and prereqs (with HEGIS)</td>
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<td>All courses throughout proposal identified with correct title and HEGIS numbers</td>
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**PART III: COMMITTEE DECISION**

_____ Pass with NO CHANGES

__X__ Passed – Return to Sponsor for MINOR CHANGES

_____ Tabled w/SUGGESTED MINOR CHANGES

_____ NOT APPROVED

HEARING SUMMARY:
HEGIS numbers for new biology courses need to be included.
Mosto, Patricia

From: Scott, Richard
Sent: Thursday, June 22, 2006 10:04 AM
To: Hecht, Gregory B.; Mosto, Patricia; Scott, Joanne
Subject: support for Revisions in Minor in Biology

Dear Greg and Joanne,

At our June 20th department meeting, the department discussed the proposal for a revised minor program in biology. We are happy to say that we support the revisions and the minor fully.

Take care,

Dick Scott, Professor of Geography and Department Chair