

UNDERGRADUATE PROGRAM CHANGE

Proposal for a Program Change

Department Biological and Environmental Sciences **Submission Date** 09/08/2015

Major **Minor** **Concentration**

Semester of Implementation Fall 2016

Retroactive? (If yes, please specify catalog year) No

I. Summary of Proposed Program Change:

	CURRENT	Check Box if no Change	PROPOSED CHANGE
Program Name	<u>Biology Major, BS Degree, Clinical Lab Sciences Concentration</u>	<input checked="" type="checkbox"/>	<u>_____</u>
Credit Hours	<u>120</u>	<input checked="" type="checkbox"/>	<u>_____</u>
Course(s) to be Added	<u>_____</u>	<input type="checkbox"/>	<u>BIOL 120, 250, 301, 302, 305, 309, 315, 395, 455, 460, and 465; MATH 171, 261, and 301</u>
Course(s) to be Removed	<u>_____</u>	<input type="checkbox"/>	<u>BIOL 121, 122, 292, 308, 405, 410, 435, 441, and 443</u>
Indicate courses to be substituted for removed courses	<u>_____</u>		<u>_____</u>
Course(s) to be Changed	<u>_____</u>	<input type="checkbox"/>	<u>BIOL 206, 207, 303, 304, 306, 324, 341, 342, 360, 361, 399, 404, 425, 426, 427, 430, 434, 445, 450, 470, 471, 474, 475</u>
Other Changes	<u>_____</u>	<input checked="" type="checkbox"/>	<u>_____</u>

II. Proposed revision in catalog description of program.

Provide proposed revisions in catalog copy – use **bold** for new information, ~~strike through~~ for deletions, and *italicize* changes.

See catalog changes below

III. Rationale for proposed changes. *Attach extra sheet if necessary.*

The proposed changes to the Clinical Lab Sciences Concentration are needed to adjust the requirements and catalog copy to reflect the changes made in biology courses and the program change in the “regular” biology major. Beginning with the 2016-2017 catalog, students in this concentration will be able to choose between the different versions of the Human A&P and the Microbiology courses.

We also would like to move the description of this concentration in the catalog. It currently occurs after all the biology course descriptions. We would like to place it immediately after the Teacher Preparation concentration, so that all concentrations will occur together.

IV. Resource Assessment

A. Estimate any change in staff requirements that would result from this program change.

No additional staff will be required as a result of this program change.

B. Estimate the amount and cost of any extra equipment, library resources, computer hardware or software, or other resources that would be required to carry out this program change.

None

V. Affected Departments or Programs:

If the proposed program changes could have an impact on other departments or programs, the appropriate affected chairs or program directors should be notified of the proposed changes.

A. List other departments/programs that might be affected:

Math

B. Individuals contacted and date contacted:

David Shoenthal (Math) - 9/11/2015

**SIGNATURE PAGE
UNDERGRADUATE PROGRAM CHANGE**

Department Biological and Environmental Sciences Program Name Biology Major, BS Degree, Clinical Lab Sciences Concentration

- | VI. Approvals | Date Received | Date Approved | Signature |
|--|---------------|---------------|------------------|
| 1. Department Curriculum Committee Chair | _____ | _____ | _____ |
| 2. Department Chair | _____ | _____ | _____ |
| The Department Chairs, whose programs may be affected, have been notified: | | | |
| Department | <u>Math</u> | Date Notified | <u>9/11/2015</u> |
| Department | _____ | Date Notified | _____ |
| Department | _____ | Date Notified | _____ |
| 3. College Dean | _____ | _____ | _____ |
| 4. College Curriculum Committee | _____ | _____ | _____ |
| 5. Educational Policy Committee | _____ | _____ | _____ |
| 6. *Faculty Senate | _____ | _____ | _____ |
| 7. *VPAA | _____ | _____ | _____ |
| 8. *OAIR (notification only) | _____ | _____ | _____ |
| 9. *BOV/SCHEV - VPAA will submit materials for approval | | | |
| 10. Date received by Registrar | _____ | | |

*Substantive change (see definition and consult EPC chair prior to submitting materials)

All curriculum proposals/changes are processed in the date order received. In order to be included in the next academic year's catalog, all paperwork must be submitted no later than:

February 1st to the College Curriculum Committee
March 1st to the Educational Policy Committee (EPC)

Submission within the deadlines does not guarantee processing in time for the next academic year's catalog.

Proposed Catalog Revisions

CLINICAL LAB SCIENCE PROGRAMS

Faculty

David W. Buckalew, PhD, Associate Professor of Biology and Director of Health Pre-Professional Programs

Through its clinical lab science concentration, the Department of Biological and Environmental Sciences is successful in guiding students for careers in medical technology and clinical lab sciences. By working closely with the Director of Health Pre-Professional Programs, students can prepare for transfer into programs at a professional institution. Students in these programs typically have the option of taking courses at Longwood for one to three years prior to matriculation to a clinical program. Admission to these programs is highly competitive and is based on the student's academic performance during the pre-professional period as well as personal recommendations and related experiences. A minimum GPA of 3.0 is usually required for transfer. Completion of Longwood's clinical lab science concentration does not guarantee admission to a professional clinical lab sciences program. Links to professional schools and specific requirements may be found on the Department's website.

Affiliated Institutions:

Jefferson College of Health Sciences (JCHS)/Carilion Medical Clinic (CMC) School of Clinical Laboratory Science, Roanoke
Inova Fairfax Hospital Medical Technology Program, Falls Church

Biology Major, BS Degree, Clinical Lab Sciences Concentration

Representatives of our Affiliated Institutions

C. Barrie Cook, MD, *Medical Director, School of Medical Technology, Inova Fairfax Hospital, Falls Church*

Amy Shoemaker, MBA. MT (ASCP) DLM Program Director, *Medical Technology Program, Inova Fairfax Hospital*

Samuel F. Vance, MD, *Medical Director, Jefferson College of Health Sciences (JCHS)/Carilion Medical Clinic (CMC) School of Clinical Laboratory Science, Roanoke*

Randall (Randy) G. Vandevander, *Interim Program Director Jefferson College of Health Sciences (JCHS)/Carilion Medical Clinic (CMC) School of Clinical Laboratory Science, Roanoke*

A. General Education Core Requirement/33 credits

MATH 171 is required for General Education Goal 5.

PHIL 315 or 316 is required for General Education Goal 12.

B. BS Degree Additional Degree Requirements/7 credits

MATH 261 or MATH 301/3 credits ~~Mathematics/Computer Science/3 credits~~

CHEM 111 /4 credits

C. Major Requirements/46 credits

~~BIOL 121 The Unity of Life/4 credits~~

BIOL 120 Integrative Biology/4 credits

~~BIOL 122 The Diversity of Life/4 credits~~

BIOL 250 Introduction to Genetics and Cell Biology/4 credits

BIOL 206 Human Anatomy and Physiology I /4 credits

or BIOL 301 Comprehensive Human Anatomy and Physiology I/4 credits

BIOL 207 Human Anatomy and Physiology II /4 credits

or BIOL 302 Comprehensive Human Anatomy and Physiology II/4 credits

~~BIOL 304 Microbiology/5 credits~~

BIOL 304 Microbiology/4 credits

or BIOL 305 General Microbiology/4 credits

BIOL 490 Directed or Independent Study, BIOL 492 Internship in Biology, BIOL 496 Research in Biology,
or BIOL 498 Honors research in Biology /1 credit (satisfies General Education Goal 14)

Biology elective (300-400 level)/4 credits

CHEM 112 Fundamentals of Chemistry II/4 credits

CHEM 211 Organic Chemistry I Lecture/3 credits

CHEM 212 Organic Chemistry II Lecture/3 credits

CHEM 213 Organic Chemistry Laboratory I/1 credit
CHEM 214 Organic Chemistry Laboratory II/1 credit
PHYS 101 General Physics I/4 credits
 or PHYS 201 University Physics I/4 credits
PHYS 102 General Physics II/4 credits (waives General Education Goal 6)
 or PHYS 202 University Physics II/4 credits (waives General Education Goal 6)
*PHYS 101 is a prerequisite for PHYS 102. PHYS 201 is a prerequisite for PHYS 202
Electives/3 credits

D. Major Requirements (affiliated schools)

Inova Fairfax Hospital/36 credits
CMC School of Clinical Lab Science/42.5 credits

E. Total Credits Required for BS in Biology with Medical Technology Concentration affiliated with Inova Fairfax Hospital Medical Technology Program, Falls Church/~~129~~128

F. Total Credits Required for BS in Biology with Medical Technology Concentration affiliated with Jefferson College of Health Sciences (JCHS)/Carilion Medical Clinic (CMC) School of Clinical Laboratory Science, Roanoke/~~135.5~~ 134.5

Students should take the biology assessment test in their junior year unless they plan to take their senior year at Longwood. Information concerning curriculum at the hospitals, expenses, financial aid, etc. is available.