BEREA COLLEGE
2010 - 2011 CURRICULUM GUIDE (as of 8/20/10)

B.A. in APPLIED SCIENCE AND MATHEMATICS

NOTE: This guide is subject to change and represents actions approved by Faculty to date. Please refer often to the *2010-2011 Online Catalog & Student Handbook (www.berea.edu/cataloghandbook),* which will be updated with the most current information.

GENERAL EDUCATION PROGRAM

NOTE: No single college course transferred into Berea can meet more than one General Education requirement.

Core Courses	Term	Credit
MAT 010: Prealgebra[a]	_____	NC
MAT 011: Elementary Algebra I[a]	_____	NC
MAT 012: Elementary Algebra II[a]	_____	NC
GSTR 110: Writing Sem. I: Critical Thinking in the Liberal Arts[b]	_____	___
GSTR 210: Writing Sem. II: Identity and Diversity in the United States	_____	1
GSTR 310: Understandings of Christianity	_____	1
GSTR 410: Sr. Sem. in Cont. Global Issues	_____	1

Scientific Knowledge and Inquiry

GSTR 332: Scientific Knowledge & Inquiry _____ ___

OR

Two approved science courses, one of which must be an approved lab course. At this time, only the following courses have been approved to meet this alternative (all of which meet the lab course stipulation): ANR 110, 130, BIO 100, BIO 101, 110, CHM 113, 131, 134, PHY 111, 217, or 315

_____ ____: _____ _____ ___
_____ ____: _____ _____ ___

Lifetime Health & Fitness: PEH 100 & Phys. Activity

PEH 100: Introduction to Lifetime Wellness _____ .50
(if swimming proficiency test not passed, take PED 200)
PED 2___: _____ _____ .25
PED 2___: _____ _____ .25

Practical Reasoning Across the Curriculum (PR & PRQ)

Two courses—at least one firmly grounded in math or statistics (PRQ); the other can be an approved practical reasoning (PR) course or another PRQ course.

_____ ____: _____ _____ 1
_____ ____: _____ _____ 1

Perspectives—Six Areas Required

Students will satisfy each of the six areas by taking or waiving a course, or through an approved experience. Individual courses may be approved to satisfy more than one Perspective, but no single course may satisfy more than two Perspective areas.

1. Arts _____ _____ _____
2. Social Science _____ _____ _____
3. Western History _____ _____ _____
4. Religion _____ _____ _____
5. Afr. Amer., Appal., Women's _____ _____ _____
6. International (two courses either in area 6A or area 6B):
   - A) Same Non-English Language _____ _____ _____
     Same Non-English Language _____ _____ _____
     (one course may be waived by placement exam)

   OR

   - B) World Culture (Non-western) _____ _____ _____
     World Culture (Western/non-western)____ _____ _____

Active Learning Experience (ALE)

An approved experience, taken for credit or as noncredit.

_____ ____: _____ _____ _____

[a] May be waived on basis of test scores.

[b] Transfer students might waive GSTR 110 if they took College Composition as a degree-seeking student at another college AND earned a grade of B or higher

MAJOR COURSES

Core Courses	Term	Credit
CHM 131: Accel. General Chemistry	_____	1
CHM 311: Quantitative Analysis	_____	1
MAT 135: Calculus I	_____	1
MAT 225: Calculus II	_____	1
MAT 330: Calculus III	_____	1
MAT 437: Differential Equations	_____	1
PHY 315: Intro. Physics I w/Calculus	_____	1
PHY 316: Intro. Physics II w/Calculus	_____	1

Capstone Course

(approved by Dual Degree Engineering Advisor)[c]

_____ _____ _____ ___

Distribution Courses (Required; count inside the major)

Three course credits—chosen from ANR, BIO, CHM, CSC, MAT, PHY, SENS, or TEC courses—must be approved by the Dual Degree Engineering Advisor[c] **AND** be applicable to a single engineering specialty (for current list of specialties at each school, see *Catalog & Student Handbook* at http://www.berea.edu/cataloghandbook/dpc/asmat-prg.asp.)

_____: _____ _____ _____
_____: _____ _____ _____
_____: _____ _____ _____

ELECTIVES (count in 20 credits outside the major, unless in the major rubric)

Dept. & No.	Title	Term	Credit
_____:	_____	_____	_____
_____:	_____	_____	_____
_____:	_____	_____	_____
_____:	_____	_____	_____
_____:	_____	_____	_____
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_____:	_____	_____	_____
_____:	_____	_____	_____
_____:	_____	_____	_____
_____:	_____	_____	_____

[c] Under most circumstances, this will be an upper-level engineering course taken at an accredited engineering institution, but it might also be an approved internship, or other approved capstone-level course.

NOTE: The Dual Degree Engineering Advisor (Dr. Tracy Hodge in the Physics Department) will serve as the student's primary advisor once accepted into this major.