Course Approval Form

For approval of new courses and deletions or modifications to an existing course.

registrar.gmu.edu/facultystaff/curriculum

Action Requested:

[X] Create new course [ ] Inactivate existing course

[ ] Modify existing course (check all that apply)

[ ] Title [ ] Credits [ ] Repeat Status [ ] Grade Type

[ ] Prereq/coreq [ ] Schedule Type [ ] Restrictions

[ ] Other: _____

Course Level:

[X] Undergraduate

[ ] Graduate

College/School: College of Science **Department:** Biology

Submitted by: Larry Rockwood **Ext:** 3-1031 **Email:** lrockwoo@gmu.edu

Subject Code: BIOL **Number:** 338

(Do not list multiple codes or numbers. Each course proposal must have a separate form.)

Effective Term: [ ] Fall [x] Spring [ ] Summer *Year* 2013

Title:

Current

Banner (30 characters max including spaces)

New: Recitation and Lab for Fundamentals of Ecology and Evolution

Credits: (check one) [2] Fixed [ ] Variable or to

Repeat Status: (check one) [x] Not Repeatable (NR) [ ] Repeatable within degree (RD) [ ] Repeatable within term (RT) Maximum credits allowed:

Grade Mode: (check one) [x] Regular (A, B, C, etc.) [ ] Satisfactory/No Credit [ ] Special (A, B C, etc. +IP)

Schedule Type: (check one) LEC can include LAB or RCT

[ ] Lecture (LEC) [x] Lab (LAB) [x] Recitation (RCT) [ ] Internship (INT)

[ ] Independent Study (IND) [ ] Seminar (SEM) [ ] Studio (STU)

Prerequisite(s):

Permission of Biology Program Director and faculty coordinator of BIOL 308.

Corequisite(s):

Instructional Mode:

[x] 100% face-to-face

[ ] Hybrid: ≤ 50% electronically delivered

[ ] 100% electronically delivered

Restrictions Enforced by System: Major, College, Degree, Program, etc. Include Code.

Are there equivalent course(s)? [ ] Yes [x] No

If yes, please list _____

Catalog Copy for NEW Courses Only (Consult University Catalog for models)

Description (No more than 60 words, use verb phrases and present tense)	**Notes** (List additional information for the course)
This is a writing intensive experience and laboratory for transfer students who have previously taken an equivalent course to BIOL 308 that did not have a lab and did not meet the writing intensive requirements in the biology major. This course is paired with BIOL 308.	

Indicate number of contact hours: Hours of Lecture or Seminar per week: _____ Hours of Lab or Studio: 4

When Offered: (check all that apply) [x] Fall [x] Summer [x] Spring

Approval Signatures

Department Approval Date

College/School Approval Date

If this course includes subject matter currently dealt with by any other units, the originating department must circulate this proposal for review by those units and obtain the necessary signatures prior to submission. Failure to do so will delay action on this proposal.

Unit Name	Unit Approval Name	Unit Approver's Signature	Date

For Graduate Courses Only

Graduate Council Member

Provost Office

Graduate Council Approval Date

For Registrar Office's Use Only: Banner_____Catalog_____

revised 11/8/11

Course Proposal Submitted to the Curriculum Committee of the College of Science

1. COURSE NUMBER AND TITLE:
BIOL 338
Recitation for Fundamentals of Ecology and Evolution

Course Prerequisites:
Permission of Biology Program Director and faculty coordinator of BIOL 308.

Catalog Description:
This is a laboratory and writing intensive recitation for transfer students who have previously taken an equivalent course to BIOL 308 that did not have a laboratory and did not meet the writing intensive requirements in the biology major. This course is paired with BIOL 308.

2. COURSE JUSTIFICATION:

BIOL 308: Fundamentals of Ecology and Evolution is course required of all biology majors and is the writing intensive course for the majors. Many transfer students have had an equivalent course but the course does not have a laboratory and lacks a recitation section with a writing intensive focus. Such students will be enrolled in BIOL 338 which will be paired with a recitation section of 308. The writing intensive requirement for the major will be met if a student earns a C or better in this course.

Course Objectives:
1) To teach students how to read and write a scientific paper.
2) To teach students how to search data bases for appropriate literature relevant to a topic.
3) To teach students how data are gathered, interpreted and presented in a scientific paper
4) To teach students how to prepare a poster and how to present that poster to the public..
5) To teach students how to gather and analyze ecological data.
6) To provide hands on experience in evolution and ecology.
7) To provide students with experience in the natural world through field trips to local ecosystems.

Course Necessity:
To facilitate meeting the laboratory and writing intensive requirement required of all students in BIOL 308.

Course Relationship to Existing Programs:

This will be paired with the existing BIOL 308
Course Relationship to Existing Courses:
As above.

3. APPROVAL HISTORY: None

4. SCHEDULING AND PROPOSED INSTRUCTORS:

Semester of Initial Offering:
Spring 2013
Proposed Instructors:
Dr. Larry Rockwood or Dr. Lorelei Crerar
5. TENTATIVE SYLLABUS: See attached.

Lab Schedule

Week of	Lab, Topic
August 27	Community Ecology: Hemlock Overlook field trip
September 3	Carbon Sequestration Statistics 1
10	Statistics 2 Set up Intraspecific competition experiment
17	Hardy-Weinberg Exercise
24	Using spreadsheets and using R for data analysis
October 1	Bees
8	Columbus Day No Class Homework: View Wastewater Video and answer questions
15	Soil Texture lab plus Intraspecific Data gathering
22	Human Survivorship
29	Aquatic Ecology
November 5	Wetlands
12	Sampling Methods; Camera Traps, Distance Sampling; Mist Nets etc.
19	Thanksgiving No Class
26	Species-Area Curves in Lichen Communities
December 3	Review Session for Final Exam

Recitation Schedule

Week of	Recitation, Topic
August 27	Reading a Scientific Paper and Writing a Summary
September 3	Discuss and Critique a Scientific Paper; Writing a Literature Cited Section
10	Writing a Scientific Paper; Writing the Methods Section
17	Writing an Introduction Section
24	The Results Section: Analyzing and Presenting Data
October 1	Writing the Discussion and Abstract
8	Columbus Day **No Class**
15	Population Ecology Exercise
22	Introduction to Poster Presentation Assignment
29	Format for Poster Presentations
November 5	Poster topic approved by instructor Instructions on printing of posters; Sign up for use of poster printer
12	**Research Paper Returned** Go over paper
19	Thanksgiving No Class
26	**All posters due** Group 1 Presentations: Posters will be displayed on 3rd floor of David King. Group 2 evaluates posters on display.
December 3	Group 2 Presentations: Posters will be displayed on 3rd floor of David King. Group 1 evaluates posters on display.