

Course Approval Form

For Registrar Office's Use Only: Banner_____

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

registrar.gmu.edu/facultystaff/curriculum

| Action Requested: X Create new course | Course Level: Undergraduate x Graduate Grade Type | | | | | | |
|--|---|--|--|--|--|--|--|
| | Department: Environmental Science & Policy Ext: 5179 Email: tlovejoy@gmu.edu | | | | | | |
| Subject Code: EVPP Number: 619 Fall (Do not list multiple codes or numbers. Each course proposal must have a separate form.) Effective Term: Fall X Spring Year 2014 Summer | | | | | | | |
| Title: Current Banner (30 characters max including spaces) New The Challenge of Biodiversity | | | | | | | |
| Credits: 3 Fixed or Repeat Status: (check one) Variable to | NR Not Repeatable (NR) Repeatable within degree (RD) Repeatable within term (RT) Maximum credits allowed: | | | | | | |
| Grade Mode: (check one) X Regular (A, B, C, etc.) Schedule Ty | Pe: X Lecture (LEC) Independent Study (IND) Lab (LAB) Seminar (SEM) Recitation (RCT) Studio (STU) Internship (INT) | | | | | | |
| Prerequisite(s): Instructional Mode: Prerequisites: Graduate Standing & 6 credit hours of graduate course work or permission of instructor. 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) The Challenge of Biodiversity examines the science and policy of biodiversity conservation, through case studies, current events, guest speakers, class discussion, reading and assignments. Emphasis is placed on problem solving, communication skills and critical thinking. Indicate number of contact hours: Hours of Lecture or Seminar per week: 3 Hours of Lab or Studio: When Offered: (check all that apply) Fall Summer X Spring | | | | | | | |
| Approval Signatures | СТОРИНЗ | | | | | | |
| Department Approval Date | College/School Approval Pate er units, the originating department must circulate this proposal for review by tre to do so will delay action on this proposal | | | | | | |
| | Unit Approver's Signature Date | | | | | | |
| For Graduate Courses Only | | | | | | | |
| Graduate Council Member Provost Office | Graduate Council Approval Date | | | | | | |

__Catalog___

Environmental Science & Policy: New Course Proposal

EVPP 619: The Challenge of Biodiversity (3:3:0)

Course Prerequisites:

Prerequisites: Graduate Standing & 6 credit hours of graduate course work or permission of instructor.

Catalog Description:

The Challenge of Biodiversity examines the science and policy of biodiversity conservation, through case studies, current events, guest speakers, class discussion, reading and assignments. Emphasis is placed on problem solving, communication skills and critical thinking.

COURSE JUSTIFICATION:

Course Objectives:

The principal objective of this course is to enrich students understanding of solving problems in conservation and conservation biology. Such problems require sound science but also include considerations that go beyond science, so in lectures, reading, case studies (presentation and paper) students will work with real and current problems. This course is intended to give students the necessary background to pursue advanced studies and careers that involve international issues in conservation biology. This course is equally valuable for students pursuing studies involving international or domestic environments.

Course Necessity:

The Challenge of Biodiversity, EVPP 619, focuses on challenges and solutions by examining the roles of science and policy in biodiversity conservation. While many other courses are topic or problem specific; this course provides a broad, holistic context designed to encourage problem solving and critical thinking about biodiversity conservation.

Course Relationship to Existing Programs:

EVPP 619, The Challenge of Biodiversity will serve the Masters and PhD programs in the Department of Environmental Science & Policy. This course may also be of interest to graduate students in Conflict Analysis and Resolution, Geographic & Cartographic Sciences, Global Affairs, Interdisciplinary Studies, International Commerce & Policy, Peace Operations & Public Policy.

Biodiversity Conservation (EVPP 518) only looks at science and specifically states that no policy is included. EVPP 619, The Challenge of Biodiversity, examines the interplay of science and policy in the context of biodiversity conservation. Existing courses address specific science and policy topics (ornithology, freshwater ecology, marine conservation) but few look at science and policy and the relationships between them.

The Challenge of Biodiversity EVPP 619 Spring, 2014 Course Syllabus

Instructor: Prof. Thomas E. Lovejoy

Class Meets: Mondays, from 4:30 to 7:10 pm, room RSCH 101

To Contact Instructor: <u>tlovejoy@gmu.edu</u> 703 993 5179

Office: Room 215, Research 1

Office Hours: by appointment, normally on Mondays before class, but if this is not possible other times and places can be arranged to accommodate students' schedules. In case of really urgent matters only, call 202 247 0162 (cell).

To Contact Carmen R. Thorndike, Director of Operations

cthorndi@gmu.edu Phone: (703) 993~5180 Fax: 703 993 5178

Carmen can help schedule an appointment.

215 Research I, Ffx, MSN: 5C3

Course Website: https://mymasonportal.gmu.edu/webapps/portal/frameset.jsp?tab-tab-group-id=-210_1
Login using your email user ID, and the same password that you use for accessing your email account. Click on the courses tab and select EVPP 619 from the list of classes.

Typically, the blackboard site is used to post files and announcements. Files posted for reading assignments can be downloaded, as well as the schedule for presentations and the class calendar/speaker list. Your PowerPoint presentation can be uploaded to the Blackboard site as a backup, or email it to yourself. (Please do not email your presentation to your professor.)

Environmental Science & Policy Department Office telephone: 703-993-1043 Environmental Science & Policy Department website http://www.gmu.edu/depts/espp/index.html

Objective of the Course:

The principal objective is to enrich students understanding of solving problems in biodiversity conservation. Such problems require sound science but also include considerations that go beyond science, so in lectures, reading, your paper and presentations this class will work with real and sometimes very current problems. This course is intended to give students the necessary background to pursue advanced studies and careers that involve international issues in conservation biology. This course is equally valuable for students pursuing studies involving international or domestic environment.

Course Overview and Content:

This course emphasizes effective communication, research skills, critical thinking and provides opportunities to further your skills. Active discussions, presentations, guest speakers, assignments and a research paper, are the assessments used in this course. The research paper includes a presentation to the class. Students will choice there topic to research, subject to approval of instructor.

Readings will be assigned to augment class discussion; pdf files will be posted on the class website.

Speakers and class exercises have been chosen to represent an extensive variety of challenges and activities in conservation and conservation science, and most are multi-factorial in nature. These are intended to develop the students' abilities to recognize and analyze issues, to devise solutions, and to provide a wide spectrum of perspectives of value to a conservation career.

Case study

Each student will identify a problem in conservation biology and research the factors and drivers creating the problem, strategies and actions taken to address the problem, key players and potential solutions for the problem.

Presentations

All students will give a 15 minute presentation followed by a class discussion/question and answer period. The presentations should be of the type and quality for submission at a professional, scientific, or academic conference or symposium. All presenters should prepare a handout with an abstract, outline and references. (A typical number of references is 10 for MS, 20 for PhD at least ½ from peer-reviewed journals)

Criteria for grading the presentations include content, research, organization, analysis, visual clarity, and presentation style. Each presenter will prepare an abstract, outline and list of references for distribution to the class.

A handout (3 slides per page) will be submitted to the instructor at the beginning of the class when you are presenting. If you do not use PowerPoint, the then abstract, outline and list of references is all that is required.

Written Paper:

All students will prepare a research paper on their topic. Each paper should begin with an abstract. The papers should be a minimum of 10 pages, maximum 12, (double spaced, 12 point font), including the abstract. References, images or tables are not included in the page count. Please number the pages and put your name on each page. Submit both a paper copy and the electronic file. The electronic file will be submitted to GMU plagiarism software and should be in a document format. Graded papers will be left in the student pick up box in the ESP Department office. Alternatively, students can provide an (8.5" x 11") self addressed envelope with required postage and papers can be returned by mail.

Criteria for grading the papers include content, research, analysis and organization. Students are expected to produce a paper suitable for publication in a peer-reviewed journal which includes references and proper citations.

References should be in alphabetical order by author, followed by the date of the publication. Please leave the first line hanging and underline names of peer-reviewed journals.

Class participation

Students are expected to engage in class discussions. Emphasis is placed on effective communication; discussions and question/answer sessions after presentations provide avenues to demonstrate and develop your communication skills.

Critique of presentations: Using a basic form (provided by the instructor), students will critique presentations. These critiques will be collected and reviewed by the instructor. Names will be removed and the critiques forwarded to the presenters for constructive feedback.

Assignments

Assignments typically fall into one of four categories: presentations, research, a team project or written reflections. Assessment of assignments are based on content, adherence to parameters of assignment (following instructions, completeness, observance of deadline etc.) grammar and punctuation.

Late submissions may not be accepted; if accepted the grade will be reduced.

Basis of grading (100 points)

| Class participation | 15% |
|---------------------------------|-----|
| Assignments | 35% |
| Midterm | 15% |
| Paper | 20% |
| Presentation (includes handout) | 10% |
| Final exam | 5% |

Total = 100%

Grading Scale

| A+ | = | 98 ~ 100 | C+ | = | 78 ~ 79 |
|----|---|----------|----|---|---------|
| A | = | 93 - 97 | С | = | 73 ~ 77 |
| A~ | = | 90 - 92 | C~ | = | 70 ~ 72 |
| B+ | = | 88 - 89 | D | = | 65 ~ 69 |
| В | = | 83 - 87 | F | = | <65 |
| B~ | = | 80 ~ 82 | | | |

Text Book:

Conservation Biology for All

Navjot S. Sodhi & Paul R. Ehrlich, Editors. 2010. Oxford University Press: 358 pp.

Link for the book Conservation Biology for All

http://www.mongabay.com/conservation-biology-for-all.html

(Download of entire book or individual chapters)

General Policies

Attendance:

You are expected to attend every class session and to be there on time. If you must miss a class please let the instructor know ahead of time. Absences may affect your participation grade.

Email:

GMU requires students to utilize the GMU email system. You can set up this email to forward to a different email address. Your GMU email address will be used for all contact regarding this course. See http://masonlive.gmu.edu for more information.

Academic Integrity:

GMU is an Honor Code university; please see the University Catalog for a full description of the code and the honor committee process. The principle of academic integrity is taken very seriously and violations are treated gravely. What does academic integrity mean in this course? Essentially this: when you are responsible for a task, you will perform that task. When you rely on someone else's work in an aspect of the performance of that task, you will give full credit in the proper, accepted form. Another aspect of academic integrity is the free play of ideas. Vigorous discussion and debate are encouraged in this course, with the firm expectation that all aspects of the class will be conducted with civility and respect for differing ideas, perspectives, and traditions. When in doubt (of any kind) please ask for guidance and clarification.

Office Of Disability Services

If you are a student with a disability and you need academic accommodations, please contact the instructor and contact the Office of Disability Services (ODS) at 993-2474. All academic accommodations must be arranged through the ODS. http://ods.gmu.edu

Other Useful Campus Resources:

Writing Center:

A114 Robinson Hall; (703) 993~1200; http://writingcenter.gmu.edu

University Libraries

"Ask a Librarian"

http://library.gmu.edu/mudge/IM/IMRef.html

Counseling And Psychological Services (Caps):

(703) 993~2380;

http://caps.gmu.edu

University Policies:

The University Catalog, http://catalog.gmu.edu, is the central resource for university policies affecting student, faculty, and staff conduct in university academic affairs. Other policies are available at http://universitypolicy.gmu.edu/. All members of the university community are responsible for knowing and following established policies

Cell phones:

As a courtesy to your classmates, professor and guest speakers, please turn your cell phone off during class. If you are experiencing a medical or family situation where you need to receive an incoming call, please let us know, mute the ring on your phone, and feel free to exit the class to receive your call.

Inclement Weather and Class Cancelation:

GMU posts closings on its website (www.gmu.edu.)

You can receive notification from Mason Alerts you via email or text to a cell phone; please let me know if you need more information.

However, please use your common sense about weather conditions in your area. If you do not feel safe traveling to class please do not attempt the journey.

The professor reserves the right to modify the course content or syllabus

Schedule

Read assignment for Week One class discussion:

Week 1:

Course overview: Introduction to the course and overview of the syllabus. Introductions and class discussion: science, policy and critical thinking; policies and agents, stressors of and strategies for biodiversity conservation; teamwork expectations and responsibilities honor code & plagiarism. Presentation on a current effort for biodiversity conservation.

Assignment:

Read for week 3: Conservation Biology for All, Chapters 1 & 2

Week 2:

Research workshop. Library sponsored research workshop. Meet with Buffet Award team project group.

Assignment:

Read for week 3: Conservation Biology for All, Chapters 3 & 4

Determine Case study topic

Due: Reflection on Research Workshop

Week 3:

Class discussion: Conservation Biology for All: Introduction, conservation biology: past and present, biodiversity, ecosystem functions and services, soils and erosion & habitat destruction

Due: Case study topic

Assignment:

Read for week 4: Conservation Biology for All, Chapters 5, 6 & 10)

Week 4:

Guest speaker: (Stuart Pimm)

Class discussion: Conservation Biology for All: Habitat fragmentation and landscape

change, overharvesting & invasive species

Due: Case study topic description, outline and preliminary list of references due*

Assignment:

Reflection on Pimm Presentation

Read for week 5: Conservation Biology for All, Chapter 8 & Blaustein BioScience article

Week 5: Class discussion: Conservation Biology for All: Climate change & Amazon dieback article

Assignment:

Read for week 6: Conservation Biology for All, Chapters 7, 9 & 11

Week 6: Class discussion: Conservation Biology for All: Fire and biodiversity, extinctions and the practice of preventing them & conservation planning and priorities

Assignment:

Read for week 7: Conservation Biology for All, Chapters 12, 13 & 14

Week 7: Class discussion: Conservation Biology for All: Endangered species management: the US experience, conservation in human-modified landscapes & the roles of people in conservation

Presentation tips

Read for week 8: Conservation Biology for All, Chapters 15 & 16 and Lovejoy editorials

Week 8: Buffet Award presentations & class discussion

Class discussion: Conservation Biology for All: From conservation theory to practice: crossing the divide & the conservation biologist's toolbox – principles for the design and analysis of conservation studies

Course review & take home mid-term exam

Assignment:

Midterm due (TBA)
Buffet Award Reflection (TBA)

Spring break

Week 9

Guest Speaker & class discussion

Assignment: Guest Speaker reflection

Week 10

Guest Speaker & class discussion

Assignment: Guest Speaker reflection

Week 11:

Student case study presentations & discussion Journal article discussions

Week 12:

Student case study presentations & discussion Journal article discussions

Week 13:

Student case study presentations & discussion Journal article discussions

Week 14

Student case study presentations & discussion Journal article discussions

Week 15 Final exam Case study papers due Last Questions assigned