# BROADER IMPACTS OF SCIENCE ON SOCIETY

**FALL 2021 Syllabus** 



BSC 6038 & GLY 6932

Thursdays, period 6 & 7 (12:50 - 2:45 PM)

Location: 222 Carr Hall or

via **Zoom** 

(Meeting ID 944 7434 3105)

Credits: 2

### Required Textbook:

MacFadden, Bruce J. (2019) Broader Impacts of Science on Society.
ISBN 978-1-108-43428-7

### **COURSE INFORMATION**

#### COURSE DESCRIPTION

There is an increasing emphasis on the relevance of what a scientist does and how we impact society in general. This is manifested in many ways, for example, NSF now requires "Broader Impact" plans in grant proposals and explicit plans for how these kinds of activities will be accomplished. This seminar-format course will explore how scientists can increase our impact on society and will provide students the tools to prepare successful "Broader Impact" plans.

### LEARNING GOALS

By the end of the course, the student will be able to:

- Better understand the landscape of NSF's Broader Impacts review criteria;
- evaluate Broader Impacts plans from other researchers;
- design many types of broader impacts activities at UF;
   and
- develop the tools needed to conduct Broader Impacts activities in the future.

### **INSTRUCTORS**



Dr. Bruce J. MacFadden Distinguished Professor & Curator FLMNH

- Office Hours: After class or by appointment.
- Telephone: (352) 273-1937
- Email: bmacfadd@ufl.edu



Dr. Mariela Pajuelo Assistant Scientist FLMNH

- Office Hours: After class or by appointment.
- Telephone: (352) 214-3060
- Email: mpajuelo@ufl.edu

### **CLASS FORMAT**

Class periods will mostly be devoted to presentations and discussions (e.g., of readings). The last class (2nd December 2021) will be devoted to students' final project presentations.

### **COURSE POLICIES**

#### CLASS DEMEANOR

- Students are expected to be to class on time and behave in a manner that is respectful to the instructor and to fellow students.
- Please do not use of cell phones and restrict eating to outside of the classroom.
- Opinions held by other students should be respected in discussion, and conversations that do not contribute to the discussion should be held at minimum, if at all.

## **GRADING**LIST OF GRADED WORK

- CLASS PARTICIPATION (50%): including
  - being present in class for the entire period;
  - having at least one question written down about the week's assignment; and
  - active participation (i.e., discussing assignment or asking question(s) in class.
- CLASS PRESENTATION (20%): based on a topic of your interest. This will be presented during weeks 9-11.
- **FINAL PROJECT (30%)**: some kind of project related to Broader Impacts.

### COMMUNICATION, CONTENT and DELIVERY

Assignments and notifications will be provided using the <u>UF e-Learning course website</u>.

### **COURSE EVALUATIONS**

Students are expected to provide feedback on the quality of instruction in this course by completing online evaluations at <u>GatorEvals</u>. Summary results of these assessments are available to students at <u>GatorEvals Results</u>.

### ATTENDANCE AND MAKE-UP ASSIGNMENTS

- Because this is a student-focused course, attendance is required and is part of the final grade (see below).
- Other requirements for class attendance, assignments, and related matters are consistent with university policies that can be found in the **Graduate Catalog**.

### **GRADING SCALE (%)**

A: 93-100

A-: 90-<93

B+: 88-<90

B: 83-<88

B-: 80-<83 C+: 78-<80

C: 73-<78

C-: 70-<73

D: 60-<70

E: <60

#### **CLASS SCHEDULE**

Week	Date	Topic	Readings
1	Aug 26	Organizational; Introduction	Chapter 2
2	Sep 2	Diversity and broadening representation	Chapter 9
3	Sep 9	Science Communication; Elevator Speeches	Chapters 4 and 8
4	Sep 16	Museums Exhibits	Chapter 13
5	Sep 23	K-12 Outreach	Chapter 11
6	Oct 7	Innovation; Strategic science vs curiosity science	Chapters 3 and 7
7	Oct 14	Social media and community science	Chapters 14 and 15
8	Oct 21	Evaluation	Chapter 18
9	Oct 28	TBD	
10	Nov 4	TBD	
11	Nov 11	TBD	
12	Nov 18	TBD	
13	Nov 25	No Class – Thanksgiving Holiday	
14	Dec 2	Final project presentations	

### **COVID-19 RELATED PRACTICES**

In response to COVID-19, the following practices are in place to maintain your learning environment, to enhance the safety of our in-classroom interactions, and to further the health and safety of ourselves, our neighbors, and our loved ones.



• If you are not vaccinated, get vaccinated. Vaccines are readily available at no cost and have been demonstrated to be safe and effective against the COVID-19 virus. Visit <a href="UF Vaccine Availability">UF Vaccine Availability</a> for details on where to get your shot, including options that do not require an appointment. Students who receive the first dose of the vaccine somewhere off-campus and/or outside of Gainesville can still receive their second dose on campus.



- You are expected to wear approved face coverings at all times during class and within buildings even if you are vaccinated. Please continue to follow healthy habits, including best practices like frequent hand washing. Following these practices is our responsibility as Gators.
  - Sanitizing supplies are available in the classroom if you wish to wipe down your desks prior to sitting down and at the end of the class.



• If you are sick, stay home and self-quarantine. Please visit the <u>UF</u> <u>Health Screen, Test & Protect website</u> about next steps, retake the questionnaire and schedule your test for no sooner than 24 hours after your symptoms began. Please call your primary care provider if you are ill and need immediate care or the UF Student Health Care Center at 352-392-1161 (or email covid@shcc.ufl.edu) to be evaluated for testing and to receive further instructions about returning to campus.

- Course materials will be provided to you with an excused absence, and you will be given a reasonable amount of time to make up work.
- If you are withheld from campus by the Department of Health through Screen, Test & Protect you are not permitted to use any on campus facilities. Students attempting to attend campus activities when withheld from campus will be referred to the Dean of Students Office.
- Continue to regularly visit <u>coronavirus.UFHealth.org</u> and <u>coronavirus.ufl.edu</u> for up-to-date information about COVID-19 and vaccination.

### **HELP& OTHER RESOURCES**

### DISSABILITY ACCOMODATION

Students with disabilities requesting accommodations should first register with the <u>Disability</u> <u>Resource Center</u> (352-392-8565) by providing appropriate documentation. Once registered, students will receive an accommodation letter which must be presented to the instructor when requesting accommodation. Students with disabilities should follow this procedure as early as possible.

### **UF COUNSELING RESOURCES**

Resources are available on-campus for students having personal problems or lacking clear career and academic goals. The resources include:

- UF Counseling & Wellness Center, 3190 Radio Rd, 392-1575, psychological and psychiatric services.
- Career Resource Center, Reitz Union, 392-1601, career and job search services. Many students experience test anxiety and other stress related problems. <u>The Counseling and Wellness Center</u> can help you address those problems (4th floor at Peabody Hall, 392-1575).

### **TOLERANCE POLICY**

<u>The University of Florida policy on Discrimination and Harassment</u> will be adhered to strictly. Any student who believes s/he has been the subject of discrimination or harassment based upon race, color, national origin, sex, age, disability, religion, sexual orientation, or veteran status can make a formal complaint report to the Institutional Equity and Diversity officer and/or to the Dean of Students Office/Student Conduct and Conflict Resolution (DSO/SCCR). Resources and reporting options can be found online at Student Conduct and Conflict Resolution.