# University of Florida Environmental Horticulture Department

# **EVR 3323: Introduction to Ecosystem Restoration**

4 credits

Tuesday and Thursday period 2-3 (schedule will vary to accommodate field trips, guest
speakers, etc.). Regular class meeting time for lecture days is 9am.
131 Blueberry Research Building (except for field trips and labs—provide your own
transportation or let us know if you need a ride)
Dr. Carrie Reinhardt Adams
I check email often, so if you have a quick question, this is a good way to get in touch with me.
Expect a response in 24-48 hours, but over the weekend my contact may be limited. Use my
office hours for more detailed questions, and you are welcome to try my office phone
anytime, but I am often away from my desk. Immediately prior to class, I am usually preparing
for lecture, so this is not a good time to ask questions.
Emails should be sent through "Inbox" on Canvas.
352-273-4502
107 Building 68, campus map link: <a href="http://campusmap.ufl.edu/?loc=0068">http://campusmap.ufl.edu/?loc=0068</a>
10:25am-11:25am (or immediately following the conclusion of class) Tuesday and Thursday in 131 Blueberry, and by appointment in my office. Please do not see office hours exclusively as a time to address problems with the course. You can use them to clarify points you don't understand, to get additional readings, or to go over work in progress. You don't need a crisis to make productive use of these hours.
We will use the eLearning Canvas website to administer this course. Weekly required readings (outside of the textbook) will be available via eLearning.
Galatowitsch, S. M. 2012. Ecological Restoration. Sinauer Associates, Inc. Sunderland, MA. Also available via <a href="https://www.vitalsource.com/">https://www.vitalsource.com/</a>
Your TA can answer questions about class material and course procedure (exam dates and
format, assignment due dates, etc.), and will assist with grading. The best way to get in touch
with your TA is to send a message using "Inbox" on Canvas. Office hours are available upon
request and by appointment.

# **Course Objectives**

This course is an overview of habitat restoration with a focus on Florida and the Southeastern coastal plain. Students will 1) describe and apply restoration ecology theory to planning, disturbed land reclamation, wetland and river restoration, invasive species control, community involvement in the restoration process, and related topics, and 2) analyze peer-reviewed literature on native plant selection, establishment, and maintenance for restoration purposes.

## **Student Learning Objectives**

During this course, students will learn how to:

- 1. Define critical restoration terms (week 1)
- 2. Understand goal setting and the role of the surrounding landscape in restoration (week 2-4)
- 3. Relate primary processes to land stabilization (week 3-4)
- 4. Describe degraded soil characteristics and soil reclamation (week 5-6)
- 5. Describe wetland, coastal, riverine, and forest restoration techniques (weeks 7-10)
- 6. Understand implementation of revegetation techniques and invasive species control (week 11-13)
- 7. Evaluate restoration success (week 14-15)

## Readings

Readings will be from the required text, journal articles, or websites. See ELearning for non-textbook readings each week. You are expected to become thoroughly familiar with the required readings before coming to class. I will assume that you are familiar with these readings when I lecture and when you are tested. Pay attention to "Active Reading Questions" issued prior to your reading to guide you on the most important points from the readings. Come to class with some notes about your answers to Active Reading Questions.

#### Lectures

You are expected to be familiar with lecture slides and resulting supplemental explanation and discussion in class; these are all potential exam material. For students who may want to print slides to facilitate note-taking, lecture slides will be posted by 12 noon on the day before class on the ELearning website.

## **Guest Lectures/Field Trips**

Understanding restoration requires considering many points of view and visualizing situations. Therefore, guest lectures and field trips are extremely valuable to your learning experience in this course. We are fortunate to have a number of guest lecturers who will bring a wealth of experience to the course. Exam questions will be based on material presented during field trips and guest lectures.

Students are required to provide their own transportation to the field trips. However, a small van will be available to students who are unable to drive themselves or carpool. If you do not have transportation to field trip, please email the TA as soon as possible to reserve a seat in the van since seats are limited.

For field trips, weather may be unpredictable and uncomfortable. Please dress for field trips keeping in mind that we will be outside for almost an hour at a time, and how much you learn during the field trip will likely be positively correlated with how comfortable you are. Make sure you will be warm enough/cool enough and dry enough (waterproof jacket), and wear sturdy shoes.

## **Assignments**

Ecosystem Snapshot

The objective of this assignment is to set restoration goals and create a restoration plan for a degraded site using a reference ecosystem. Students will work in groups to survey a site-to-be-restored, and a reference site. Students will individually develop a sketch comparing the 2 sites, and a 1.5-3 page (single spaced) "Ecosystem Snapshot" statement that describes restoration goals and actions for the degraded site based on their field observations.

Major Assignment: FOR! Conference

In the second half of the course, we will hold a mock-scientific meeting of the Florida Organization for Restoration (FOR!) in which students present case studies in restoration, detailing pitfalls, success stories, and everything in between. Students will be assigned to groups to complete 15-minute presentations and to address 5 minutes of questions from the audience. Your grade for this major assignment will be based on your group's evaluation of your contribution, your peers' evaluation of your presentation, and instructor evaluation. Detailed description of the assignment to follow.

Class Participation Exercises

There will be several opportunities for class participation throughout the semester, including informal opportunities, such as contributing to class discussion, and formal in-class group activities, such as active learning exercises, and group-authoring potential exam questions. Calculation of your class participation grade is quantitative, based on materials resulting from the formal in-class activities that are turned in to

the instructor. You will have approximately 15 opportunities to participate, and your grade will be based on the percentage of activities in which you actively participate in supporting group activities.

#### Use of Al

This class is AI-Permitted: Generative AI tools may be used in this course. Not all assignments will lend themselves to AI use, but responsible use of Generative AI (refer to AI Information Literacy lesson by Suzanne Stapleton at Marston Library early on this course) is appropriate. Any work that is done using generative AI must be cited in your submissions and note that AI citations cannot substitute for peer reviewed journal articles citations where required—please see course announcement in Canvas for details.

## **Exams**

There will be three exams covering course material. Acknowledging that students tend to master exam skills as the semester proceeds, Exam 1 will be 15% of your grade, and Exams 2 and 3 will each be 20% of your grade. Exams will consist of multiple choice, essay, and short-answer questions. During lecture, I will solicit potential test questions from the class based on the information presented in class. Exams will consist of several of these questions, as well as questions authored by myself. Exams are not cumulative, though some higher-level thinking questions may require integration of key concepts from previous exam periods. See the "Weekly course schedule" under "Syllabus" on ELearning for Assignment and Exam dates.

# Grading

	Total Points
In-class activities	20
Exam 1	15
Ecosystem snapshot assignment	5
Exam 2	20
FOR! presentation	20
Exam 3	20
Total	100

Letter grades will be assigned as follows:

94% and above	Α
90-93%	A-
87 - 89%	B+
84 - 86%	В
80-83%	B-
77 - 79%	C+
74% - 76	С
70-73%	C-
65% - 69	D+
60% - 64	D
Below 60%	Ε

Grades and Grade Points For information on current UF policies for assigning grade points, see <a href="https://catalog.ufl.edu/UGRD/academic-regulations/grades-grading-policies/">https://catalog.ufl.edu/UGRD/academic-regulations/grades-grading-policies/</a>

## **Attendance Policy**

I do not take attendance in class. However, excessive absence will result in missed class participation opportunities (that cannot be made-up) that will significantly impact your grade. It is almost impossible to get a good grade in this course with excessive absence. When a student misses class, it is his/her responsibility to get notes and handouts from other classmates; it is not the instructor's responsibility to provide students with missed materials. Requirements for this course are consistent with <a href="UF">UF attendance policies</a>.

## **Make-up Exam and Late Assignments Policy**

Requirements for class attendance and make-up exams, assignments and other work are consistent with university policies that can be found at:

https://catalog.ufl.edu/ugrad/current/regulations/info/attendance.aspx. Additionally, make-up exams will only be offered to those who obtain permission from me in advance, and who have a legitimate excuse. If you are unsure whether or not your situation qualifies, come see me immediately. I will generally require independent verification for emergencies that arise after the class meeting prior to the exam (e.g. doctor's note). The same policy holds for in-class activities.

For assignments not turned in on time, 10 percentage points will be subtracted from the original grade for each day that the assignment is late. An assignment is considered late if it is not handed in by the beginning of the class period (8:30am) on the day the assignment is due.

# **General Course Policy**

I hope that this will be an exciting and stretching learning experience for you. To that end, I want to be as clear as possible about my expectations. It is each student's responsibility to become familiar with this syllabus and to be aware of scheduled exams and assignment due dates (exam dates will not change, though readings, topics and field trips may need to be amended for logistic reasons). Be active participants in your own learning. Think about course material as it relates to the larger world in which you live. I expect you to attend class unless serious circumstances prevent that.

# I (Incomplete)

An incomplete will be assigned at the discretion of the instructor when, due to extraordinary circumstances, a student is prevented from completing the work of the course on time. A written agreement between the instructor and student prior to the end of the semester is necessary to arrange for completion of the course.

Every generation receives a natural and cultural legacy in trust from its ancestors and holds it in trust for its descendants. This trust imposes upon each generation the obligation to conserve the environment and natural and cultural resources for future generations. The human species faces a grave obligation: conserve this fragile planet Earth and its human cultural legacy for future generations. We now recognize that humans have the power to alter the planet irreversibly, on a global scale. Human must be concerned with the condition of the planet that is passed to future generations.

E. Brown-Weiss Environment

## Required information, according to University Syllabus Policy

#### **Communication Courtesy and Professionalism**

Just as in any professional environment, meaningful and constructive dialogue is expected in this class and requires a degree of mutual respect, willingness to listen, and tolerance of opposing points of view. **Respect for individual differences and alternative viewpoints will be maintained in this class at all times.** All members of the class are expected to follow rules of common courtesy, decency, and civility in all interactions. Failure to do so will not be tolerated and may result in loss of participation points and/or referral to the Dean of Students' Office.

#### **Semester Evaluation Process**

Student assessment of instruction is an important part of efforts to improve teaching and learning. At the end of the semester, students are expected to provide feedback on the quality of instruction in this course using a standard set of university and college criteria. Students are expected to provide professional and respectful feedback on the quality of instruction in this course by completing course evaluations online via GatorEvals. Guidance on how to give feedback in a professional and respectful manner is available at: <a href="https://gatorevals.aa.ufl.edu/students/">https://gatorevals.aa.ufl.edu/students/</a>. Students will be notified when the evaluation period opens and can complete evaluations through the email they receive from GatorEvals, in their Canvas course menu under GatorEvals, or via <a href="https://ufl.bluera.com/ufl/">https://ufl.bluera.com/ufl/</a>. Summaries of course evaluation results are available to students at: <a href="https://gatorevals.aa.ufl.edu/public-results/">https://gatorevals.aa.ufl.edu/public-results/</a>.

# **Academic Honesty Policy**

UF students are bound by The Honor Pledge which states "We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honor and integrity by abiding by the Honor Code. On all work submitted for credit by students at the University of Florida, the following pledge is either required or implied: "On my honor, I have neither given nor received unauthorized aid in doing this assignment." The Conduct Code specifies a number of behaviors that are in violation of this code and the possible sanctions. See the <a href="UF">UF Conduct Code website</a> for more information. If you have any questions or concerns, please consult with the instructor or TAs in this class.

It is assumed that you will complete all work independently in each course unless the instructor provides explicit permission for you to collaborate on course tasks (e.g. assignments, papers, quizzes, exams). It is your individual responsibility to know and comply with all university policies and procedures regarding academic integrity and the Student Honor Code. Violations of the Honor Code at the University of Florida will not be tolerated. Violations will be reported to the Dean of Students Office for consideration

of disciplinary action. For more information regarding the Student Honor Code, please see: <a href="https://policy.ufl.edu/regulation/4-040/">https://policy.ufl.edu/regulation/4-040/</a>

# **Inclusive Learning Environment**

This course embraces the University of Florida's Non-Discrimination Policy, which reads, *The University shall* actively promote equal opportunity policies and practices conforming to laws against discrimination. The University is committed to non-discrimination with respect to race, creed, color, religion, age, disability, sex, sexual orientation, gender identity and expression, marital status, national origin, political opinions or affiliations, genetic information and veteran status as protected under the Vietnam Era Veterans' Readjustment Assistance Act.

## **Privacy Statement**

Our class sessions may be audio visually recorded for students in the class to refer back and for enrolled students who are unable to attend live. Students who participate with their camera engaged or utilize a profile image are agreeing to have their video or image recorded. If you are unwilling to consent to have your profile or video image recorded, be sure to keep your camera off and do not use a profile image. Likewise, students who un-mute during class and participate orally are agreeing to have their voices recorded. If you are not willing to consent to have your voice recorded during class, you will need to keep your mute button activated and communicate exclusively

using the "chat" feature, which allows students to type questions and comments live. The chat will not be recorded or shared. As in all courses, unauthorized recording and unauthorized sharing of recorded materials is prohibited.

## **In-class recordings**

Students are allowed to record video or audio of class lectures. However, the purposes for which these recordings may be used are strictly controlled. Th only allowable purposes are (1) for personal education use, (2) in connection with a complaint to the university, or (3) as evidence in, or in preparation for, a criminal or civil proceeding. All other purposes are prohibited. Specifically, students may not publish recorded lectures without the written consent of the instructor. A "class lecture" is an educational presentation intended to inform or teach enrolled students about a particular subject, including any instructor-led discussions that form part of the presentation, and deliver by an instructor hired or appointed by the University, or by a guest instructor, as part of a University of Florida course. A class lecture does not include lab sessions, student presentations, clinical presentation such as patient history, academic exercises involving solely student participation, assessments (quizzes, tests, exams), field trips, private Revised: September 2024 2 conversations between students in the class or between a student and the faculty or guest lecturer during a class session. Publication without permission of the instructor is prohibited. To "publish" means to share, transmit, circulate, distribute, or provide access to a recording, regardless, of format or medium, to another person (or persons), including but not limited to another student within the same class section. Additionally, a recording, or transcript of a recording, is considered published if it is posted on or uploaded to, in whole or in part, any media platform, including but not limited to social media, book, magazine, newspaper, leaflet, or third-party note/tutoring services. A student who publishes a recording without written consent may be subject to a civil cause of action instituted by a person injured by the publication and/or discipline under UF Regulation 4.040 Student Honor Code and Student Conduct Code.

#### Services for Students with Disabilities:

Students with disabilities who experience learning barriers and would like to request academic accommodations should connect with the Disability Resource Center. See the "Get Started With the DRC" webpage on the Disability Resource Center site <a href="https://disability.ufl.edu/get-started/">https://disability.ufl.edu/get-started/</a>. It is important for students to share their accommodation letter with their instructor and discuss their access needs, as early as possible in the semester.

### Software Use

All faculty, staff and students of the university are required and expected to obey the laws and legal agreements governing software use. Failure to do so can lead to monetary damages and/or criminal penalties for the individual violator. Because such violations are also against university policies and rules, disciplinary action will be taken as appropriate.

# **Campus Helping Resources**

1. Whole Gator App The Whole Gator and website and app connects UF students with resources dedicated to supporting overall health and well-being. In addition to many of the resources below it also has strategies to practice self-care. <a href="https://one.uf.edu/whole-gator/topics">https://one.uf.edu/whole-gator/topics</a>

#### 2. Health and Wellness

- U Matter, We Care: If you or someone you know is in distress, please contact <u>umatter@ufl.edu</u>, 352-3921575, or visit <u>U Matter, We Care website</u> to refer or report a concern and a team member will reach out
  to the student in distress.
- Counseling and Wellness Center: Visit the <u>Counseling and Wellness Center website</u> or call 352-392-1575 for information on crisis services as well as non- crisis services.
- Student Health Care Center: Call 352-392-1161 for 24/7 information to help you find the care you need, or visit the <a href="Student Health Care Center website">Student Health Care Center website</a>.
- University Police Department: Visit <u>UF Police Department website</u> or call 352-392-1111 (or 9-1-1 for emergencies).

- UF Health Shands Emergency Room / Trauma Center: For immediate medical care call 352-733-0111 or go
  to the emergency room at 1515 SW Archer Road, Gainesville, FL 32608; Visit the <u>UF Health Emergency</u>
  Room and Trauma Center website.
- GatorWell Health Promotion Services: For prevention services focused on optimal wellbeing, including Wellness Coaching for Academic Success, visit the <u>GatorWell website</u> or call 352-273-4450.
- Student Success Initiative, <a href="http://studentsuccess.ufl.edu">http://studentsuccess.ufl.edu</a>

#### 3. Academic Resources

- E-learning technical support: Contact the <u>UF Computing Help Desk</u> at 352-392-4357 or via e-mail at helpdesk@ufl.edu.
- <u>Career Connections Center</u>: Reitz Union Suite 1300, 352-392- 1601. Career assistance and counseling services.
- <u>Library Support</u>: Various ways to receive assistance with respect to using the libraries or finding resources. Call 866-281-6309 or email ask@ufl.libanswers.com for more information.
- <u>Teaching Center</u>: 1317 Turlington Hall, 352-392-2010 or to make an appointment 352- 392-6420. General study skills and tutoring.
- Writing Studio: Daytime (9:30am-3:30pm): 2215 Turlington Hall, 352-846-1138 | Evening (5:00pm-7:00pm): 1545 W University Avenue (Library West, Rm. 339). Help brainstorming, formatting, and writing papers.

#### 4. Student Complaints

- Academic Complaints: Office of the Ombuds; Visit the Complaint Portal webpage for more information.
- Enrollment Management Complaints (Registrar, Financial Aid, Admissions): View the <u>Student Complaint</u> <u>Procedure webpage</u> for more information.
- Residential Course: <a href="https://www.ombuds.ufl.edu/complaint-portal/">https://www.ombuds.ufl.edu/complaint-portal/</a>
- Online Course: https://pfs.tnt.aa.ufl.edu/state-authorization-status/#student-complaint