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	Instructor	Teaching Assistant
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<b>Office Hours:</b>	Mon: 12:00-1:00 PM Thur: 10-11:00 AM	Wed: 11:00 AM – 12:00 PM Thur: 11:00 AM – 12:00 PM

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<b>Term:</b>	Spring 2019
<b>Class Meeting Days/Time:</b>	Lecture - Tues: 10-11:40 AM F310 L001 – Tues: 1:00- 2:40PM F310 L002 – Thur: 1:00 - 2:40 PM
<b>Class Location:</b>	Wagar 133
<b>Lab Location:</b>	NR 254
<b>Course Credits:</b>	3

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### Course Overview

Forest and Rangeland Ecogeography is the study of how ecosystems vary spatially across the landscape. Students will learn the mechanisms that drive the variation in ecosystem structure and function that we see across the landscape. Students will be exposed to some examples of different ecosystem types that are represented in the United States and Canada. We will use the concept of an 'ecoregion' to guide our discussion and examples. Finally, students will also learn to identify some of the most common species in the different ecosystems we discuss.

### Course Goals and Objectives

By the end of the course, successful students will know the key characteristics and distribution of approximately 15 forested and rangeland ecosystems in the United States and Canada. They will also be familiar with the climatic variations associated with these ecosystems. Successful students will also know and understand the important adaptations of plants (trees, shrubs, forbs, and grasses) growing in the ecosystems we discuss in class.

### Course Prerequisites

No prerequisites are required for this course other than an interest in learning about plants and being open to the possibility that you'll fall in love with trees!

## Required Texts and Materials

No required textbook for this course but be aware that F312 and RS312 do have required textbooks. We will have required readings that will be posted on Canvas. There will be a short quiz on the days when readings have been assigned.

## Supplementary [Optional] Texts and Materials

NA

## Library & Research Help

The CSU Libraries Help Desk provides basic research and technical assistance either in person at Morgan Library or by phone at 970-491-1841. Virtual assistance is also available via the Libraries' Ask Us chat and email services (<http://lib.colostate.edu/help/ask-us>). Jocelyn Boice is the librarian supporting the Forest and Rangeland Stewardship Department and this course. Contact her for in-depth assistance at: [jocelyn.boice@colostate.edu](mailto:jocelyn.boice@colostate.edu) / 970-491-3882.

## Important Dates to Remember

Last Day to Add/Drop Classes Without an Instructor Override: Sun, Jan 27th 2019

Registration Closes: Wed, Feb 6th 2019

Withdrawal Deadline: Mon, Mar 25th 2019

Spring Recess: Sat, Mar 16<sup>th</sup> – Sun, Mar 24<sup>th</sup>, 2019

Last Day to Process a University Withdrawal: Friday, May 10<sup>th</sup>, 2019

Final Examination: Thursday, May 16th from 6:20 – 8:20 PM

## Course Schedule and/or Schedule of Assignments

See the course 'Home' page on Canvas for the most up-to-date schedule.

## Project Assignments

- *Assignment 1: Climate Terminology.* You will research and report on the definition of important terminology to describe climate and climate patterns.
- *Assignment 2: Introduction to analyzing long-term climate data.* You will download and analyze a small data set to look for long-term changes in climate patterns. This assignment will be done in Microsoft Excel to give you more experience handling data and creating figures.
- *Assignment 3: Advanced analysis of long-term climate data.* This assignment will build on Assignment #2 and will require you to create climate diagrams used to characterize different regions.
- *Assignment 4: Explaining differences among Climate Diagrams.* You will create 3 climate diagrams for different regions that fit at least 6 of the climate terms we covered in Assignment 1. Then, you will have to provide a mechanistic explanation of each climate diagram using the mechanisms we discussed in lecture.
- *Assignment 5: Leaf Mass Area lab.* You will learn about using Leaf Mass Area (LMA) to quantify differences among tree growth strategies and will then measure this leaf trait yourself on several species. This data will then be combined with data you collect from scientific literature to investigate the pattern of LMA across different plant functional groups.

- Assignment 6: Specific Root Length lab. Specific root length is a means of quantifying the root system of plants, you will obtain roots from plants growing in our greenhouse and quantify Specific Root Length on two species and compare the results and provide a mechanistic explanation.
- Assignment 7: Survey of an ecoregion boundary. You will head out into the field and find an ecoregion boundary and describe in detail in a written report or pamphlet. This assignment will also require you to identify several of the dominant species within each ecoregion. This assignment will be completed in small groups. A separate handout will provide more details about this assignment.
- Assignment 8: Leaf Size/Color/Angle lab. We will investigate the important of differences in leaf size, color, and angle in this lab.
- Assignment 9: Leaf Terminology. You will research the definitions of terminology to describe leaf shapes and we will then utilize these terms in a field exercise.
- Assignment 10: Final Lab Project

## Basis for Final Grade

<u>Assessment</u>	<u>Percent of final grade</u>
<u>In-class Assignments/Quizzes</u>	<u>~20%</u>
<u>Assignments</u>	<u>~35%</u>
<u>Exams</u>	<u>~30%</u>
<u>Final Exam</u>	<u>~15%</u>

General grading guideline: 96.67 – 100% (A+); 93.33 – 96.67 (A); 90 – 93.33% (A-); 86.67 – 90% (B+); 83.33 – 86.67% (B); 80 – 83.33% (B-); 76.67 – 80% (C+); 70 – 76.67% (C); 60 – 70% (D); <60% (F).

## Course Policies

### Late Work Policy

Assignments not handed in on time (either in class or through Canvas) will be deducted 10% for each day that the assignment is late. It is your responsibility to talk with me if you have any questions about the assignments or their due dates. Assignments will not be accepted if overdue by more than five days.

### Extra Credit Policy

One extra credit opportunity is available and is described on Canvas.

### Grades of "Incomplete"

Per university policy, an instructor may assign temporary grade of Incomplete to a student who demonstrates that he or she could not complete the requirements of the course due to circumstances beyond the student's control and not reasonably foreseeable. A student must be passing a course at the time that an Incomplete is requested unless the instructor determines that there are extenuating circumstances to assign an Incomplete to a student who is not passing the course. When an instructor assigns an Incomplete, he or she shall specify in writing using the Department Incomplete Grade Form the requirements the student shall fulfill to complete the course as well as the reasons for granting an Incomplete when the student is not passing the course. The instructor shall retain a copy of this

statement in his or her grade records and provide copies to the student and the department head or his or her designee. [Section I.6 of the *Academic Faculty and Administrative Professional Manual*]

### Disability Access

Colorado State University is committed to providing reasonable accommodations for all persons with disabilities. Students with disabilities who need accommodations must first contact Resources for Disabled Students before requesting accommodations from the professor. Resources for Disabled Students (RDS; <http://rds.colostate.edu/home>) is located in room 100 of the General Services Building. Their phone is (970) 491-6385 (V/TDD). Students who need accommodations in this course must contact the professor at the beginning of the semester to discuss needed accommodations.

### Attendance Policy

You are responsible for attending all classes (including labs). If you miss class, please make arrangements to get class notes and announcements from a classmate.

Make-up quizzes/exams are only given if: a) the student notifies the Teaching Assistant (ahead of time) that she/he will be absent, and b) there is a VALID reason for the absence. Make up quizzes must be taken within one week of the excused absence at the DESIGNATED MAKE UP TIME (to be announced).

### Religious Accommodation

Participation in official University activities, e.g., an out-of-town athletic event, or special religious observances may provide a legitimate reason for an excused absence. The student is responsible for discussing this with the instructor at the beginning of the semester.

### Final Exam Policy

Final examination week is part of the regular semester. Student attendance shall be consistent with University policy.

If a student has three or more final examinations (not classes) scheduled for the same day or if conflicts of examination times occur, the student may negotiate a time change with the instructors involved. If the parties involved cannot find a mutually agreeable time, the Registrar's Office indicates which courses must be changed. **Note:** The Registrar's Office must be notified at least one week prior to Final Examination Week to allow instructors time to make appropriate accommodations. It is the student's responsibility to initiate negotiations.

Any student who has a conflict with the examination schedule must inform the instructor as soon as possible before the examination. If an agreement cannot be reached between the instructor and student as to the appropriateness of a make-up examination the student should appeal to the department head.

<http://www.registrar.colostate.edu/final-exams>

### Professionalism Policy

Per university policy and classroom etiquette; mobile phones, iPods, *etc.* **must be silenced** during all classroom and lab lectures. Those not heeding this rule will be asked to leave the classroom/lab immediately so as to not disrupt the learning environment. Please arrive on time for all class meetings.

Students who habitually disturb the class by talking, arriving late, *etc.*, and have been warned may suffer a reduction in their final class grade.

When emailing the instructor or TA, please include your full name, CSU ID, and the course number in your email.

### Academic Integrity

The Department of Forest and Rangeland Stewardship takes academic integrity seriously. At minimum, academic integrity means that no one will use another's work as their own. The CSU writing center defines plagiarism this way:

Plagiarism is the unauthorized or unacknowledged use of another person's academic or scholarly work. Done on purpose, it is cheating. Done accidentally, it is no less serious. Regardless of how it occurs, plagiarism is a theft of intellectual property and a violation of an ironclad rule demanding "credit be given where credit is due."

Source: [Writing Guides: Understanding Plagiarism.

<http://writing.colostate.edu/guides/guide.cfm?guideid=17>]

If you plagiarize in your work you could lose credit for the plagiarized work, fail the assignment, or fail the course. Each instance of plagiarism, classroom cheating, and other types of academic dishonesty will be addressed according to the principles published in the CSU General Catalog (under "Academic Integrity/Misconduct: <http://catalog.colostate.edu/general-catalog/policies/students-responsibilities/> .)

Of course, academic integrity means more than just avoiding plagiarism. It also involves doing your own reading and studying. It includes regular class attendance, careful consideration of all class materials, and engagement with the class and your fellow students. Academic integrity lies at the core of our common goal: to create an intellectually honest and rigorous community. Because academic integrity, and the personal and social integrity of which academic integrity is an integral part, is so central to our mission as students, teachers, scholars, and citizens, we will ask to you sign the CSU Honor Pledge as part of completing all of our major assignments. While you will not be required to sign the honor pledge, we will ask each of you to write and sign the following statement on your papers and exams:

***"I have not given, received, or used any unauthorized assistance."***

### Title IX Information

CSU's Student Sexual Harassment and Violence policy, following national guidance from the Office of Civil Rights, requires that faculty follow CSU policy as a "mandatory reporter" of any personal disclosure of sexual harassment, abuse, and/or violence related experiences or incidents shared with the faculty member in person, via email, and/or in classroom papers or homework exercises. These disclosures include but are not limited to reports of personal relational abuse, relational/domestic violence, and stalking. While faculty are often able to help students locate appropriate channels of assistance on campus (e.g., see the CSU Health Network link below), disclosure by the student to the faculty member requires that the faculty member inform appropriate CSU channels to help ensure that the student's safety and welfare is being addressed, even if the student requests that the disclosure not be shared.

For counseling support and assistance, please see the CSU Health Network, which includes a variety of counseling services that can be accessed at: <http://www.health.colostate.edu/>. And, the Sexual Assault Victim Assistance Team is a confidential resource for students that does not have a reporting

requirement and that can be of great help to students who have experienced sexual assault. The web address is <http://www.wgac.colostate.edu/need-help-support>. Source: <http://oeo.colostate.edu/title-ix-sexual-assault>

### **Non-Discrimination Statement**

Colorado State University does not discriminate on the basis of race, age, creed, color, religion, national origin or ancestry, sex, gender, disability, veteran status, genetic information, sexual orientation, gender identity or expression, or pregnancy. The University complies with the Civil Rights Act of 1964, as amended, related Executive Orders 11246 and 11375, Title IX of the Education Amendments Act of 1972, Sections 503 and 504 of the Rehabilitation Act of 1973, Section 402 of the Vietnam Era Veterans' Readjustment Assistance Act of 1974, as amended, the Age Discrimination in Employment Act of 1967, as amended, The Pregnancy Discrimination Act of 1978, Americans with Disabilities Act of 1990, the Civil Rights Act of 1991, the ADA Amendments Act of 2008, the Genetic Information Nondiscrimination Act of 2008, and all civil rights laws of the State of Colorado. Accordingly, equal opportunity of employment and admission shall be extended to all persons. The University shall promote equal opportunity and treatment in employment through a positive and continuing affirmative action program for ethnic minorities, women, persons with disabilities, and veterans. The Office of Equal Opportunity is located in 101 Student Services. Source: <http://oeo.colostate.edu/non-discrimination-statement>

### **Citing sources in assignments:**

The writing center mentioned above has a range of resources to help you cite your sources correctly. I'm giving you some links below that I think are useful, but there are many other guides and suggestions on this website that will likely be helpful to you. If you have a question about citing sources, make sure to first visit the writing center website but then come ask me if their guides/examples don't make sense. When you are working on an assignment make sure to use this resource so you can ensure that you cite your sources correctly.

- 1) General writing guide that explains plagiarism and different citations styles

<http://writing.colostate.edu/guides/index.cfm?categoryid=11&title=2>

- 2) Specific guide to citations that we will use for this class. We will use the Council of Science Editors style for citations. You can find a guide and examples for how to cite here:

<http://writing.colostate.edu/guides/guide.cfm?guideid=13>

### **My Goal**

First and foremost, my goal is to provide an environment that encourages everyone to participate and learn together. I recognize that special circumstances and unforeseen events are part of life, and I ask you to bring any concerns you have to me, and I will do my best to accommodate any issues that arise. I'm willing to make many things work, as I know that not everyone is in the same situation. So please let me know!