

**Geography 477/677**  
**Remote Sensing 2**  
**Winterim Semester**

**Instructor: Eric Larsen**

**Office Hours:** Mon-Friday 9:00-1:00, or by appointment

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**Text:** John Jensen, **Introductory Digital Image Processing, 4<sup>th</sup> edition**

**Learning Objectives:**

The objectives of this course are for you to develop the background knowledge and technical skills you will need for employment and/or further study in the field of remote sensing.

- 1.) SWBAT describe the relevant physical principles for remote sensing and explain their importance to the field. Physical principles include properties of the electromagnetic spectrum, the interactions of matter and energy, and relevant physical laws.
- 2.) SWBAT explain of the diversity of platforms, digital formats, and methods available to remote sensing data collection and analysis.
- 3.) SWBAT understand and apply selected mathematical principles involved in the use and analysis of digital remote sensing data.
- 4.) SWBAT use remote sensing software to analyze digital remote sensing data.
- 5.) SWBAT implement their knowledge and technical skills to analyze remote sensing data and use ERDAS Imagine to solve remote sensing problems.

**Grades:**

Exams (2 exams @ 100 points each) 200 points

Lab exercises (10 labs @ 20 points each) 200 points

(Note: Your final lab grade will be your overall lab percentage. Since lab is worth 200 points total, I will double the percentage for your final lab grade. For example, if you collect 90% of the lab points, you will receive 180/200 points for the lab portion of your grade. See also the example below.

A	>= 93%	C	73-76%
A-	90-92%	C-	70-72%
B+	87-89%	D+	67-69%
B	83-86%	D	60-66%
B-	80-82%	F	<60%
C+	77-79%		

**How grades are calculated:** There are 400 points possible. Let's say (for example) you received the following PERCENTAGE scores on your work:

Exam 1 87%  
 Exam 2 75%  
 Lab Exercises 95%

**So your final grade would be  $(87+75+95+95) = 352/400 = 88\% = B+$**

## **Laboratory:**

A lab manual will be provided in digital format (pdf)

**Late labs will be assessed at 10% late penalty.**

## **Community Rights and Responsibilities.**

In accordance with UW system policies, Geography 477/677 is dedicated to a safe, supportive and non-discriminatory environment for all persons regardless of age, race, religion, gender, sexual orientation or disability.

Students with special needs should talk to me during the first two weeks of class and possibly work with the **Office of Disability Services**. Religious beliefs will be accommodated according to UWS 22.03. It is the responsibility of all students to familiarize themselves with UWSP policies regarding special accommodations, academic misconduct, religious beliefs accommodation, discrimination, and absence for university sponsored events. Please refer to the following web document, “Rights and Responsibilities,” which details your rights and responsibilities within the UWSP campus community.

<http://www.uwsp.edu/stuaffairs/Pages/rightsandresponsibilities.aspx>