

## Syllabus

### ASEN 5210 Remote Sensing Seminar

*Material is subject to change and continuously updated*

**Instructor:** Prof. Zoltan Sternovsky (Zoltan.Sternovsky@colorado.edu)

**Seminar Time:** Tuesday 10:40 – 11:30 (meets remotely via zoom)

**Office Hour:** TBD

**Webpage:** <https://canvas.colorado.edu/>

#### Course Overview

The Remote Sensing Seminar Series covers subjects pertinent to remote sensing of the Earth and space, including oceanography, meteorology, vegetation monitoring, geology, geodesy and space science, with an emphasis on techniques for extracting geophysical information from data from airborne and spaceborne platforms.

#### Course Objectives

The goal of this course is (1) to expose students to a range of current remote sensing research topics being conducted in academia and industry and (2) to provide students with opportunities to actively engage in technical discussions with faculty and researchers.

#### Course Structure and Expectations

This semester the structure will be somewhat different from the previous year. Seminars will be presented on a bi-weekly basis, followed up with a topical discussion during the off weeks. The speakers will provide *reading material* (e.g., research or conference papers, technical reports, etc.) before the seminar as an introduction for the topic. ***The students are required to read this material before the seminar and take notes.*** The presentations will be 40-45 minutes long, followed by a brief Q&A session. The week following a presentation the students share their notes and discuss the reading material and the presentation. Active participation in the discussion is mandatory.

One or two students will be assigned to each seminar and his/her/their responsibilities will be:

#### Part 1 - Logistics (20%):

- Collecting the (1) title, (2) abstract, (3) bio from the speaker, and (4) reading material from the speaker (completed at least 1 week before the seminar). A relevant publication is typically a journal article or conference proceedings by the author or a topical review article.
- Posting the material from above on the canvas website.
- Forwarding the title, abstract, date of the seminar to Jeff Zehnder ([Jeff.Zehnder@colorado.edu](mailto:Jeff.Zehnder@colorado.edu)) who is going to make the seminar flyer and take care of its distribution. (at least 7 days before the seminar)
  - o Make sure that the zoom link is included on the flier
- Introducing the speaker at the beginning of the seminar based on the collected bio
- Taking attendance and taking notes during the seminar
- Leading the Q&A session (last 5-10 minutes of the seminar)
- Posting the collection of notes from each student on canvas (within 3 days after the seminar)

#### Part 2 – Seminar Summary (40%):

- Composing and posting a brief (about 2 pages long) summary of the seminar (topic, relevance/motivation, methodology, main results, future research, etc.). This may include

content the collected notes.

- The material needs to be posted within one week after the seminar

### Part 3 – Discussion (40%):

- Preparing a short presentation (5-10 slides) based on the seminar summary and posting within 5 days after the seminar
- Facilitating the follow-up discussion and engaging others to actively participate

### Course Grading

This is a pass/fail course. The grades are based on attendance, participation in the discussion, and efforts in leading assigned seminars. The passing grade is 75%.

<u>100%</u>	<u>Total</u>
70%	Seminar attendance and participation (Evenly distributed over the number of seminars. Half points if only attending the seminar but not the discussion or vice versa.)
30%	Seminar lead duties (10% each for Parts 1 – 3)
+15%	Extra 15% is given to students who are solo seminar leads

### Seminar Schedule

The detailed seminar schedule can be found at:

[https://docs.google.com/spreadsheets/d/1NhZg9\\_KOscu2dYrwf0LkCtp-Dys4t29GY\\_2f48jRcBE/edit?usp=sharing](https://docs.google.com/spreadsheets/d/1NhZg9_KOscu2dYrwf0LkCtp-Dys4t29GY_2f48jRcBE/edit?usp=sharing)

The short version of the RSESS seminar series is below:

Date	Speaker	Affiliation	Title
8/25	W. Emery	CU-AES	The history of satellite remote sensing
9/1	Leo Liu	CU-AES	Machine Learning in GNSS-Based Remote Sensing Applications
9/15	Leng-Ying Khoo	CU-AES	Design and Performance of an Energetic Particle Detector Instrument (REPTile-2) using Geant4 simulations

## University Policies - Spring 2019

### Accommodation for Disabilities

If you qualify for accommodations because of a disability, please submit your accommodation letter from Disability Services to your faculty member in a timely manner so that your needs can be addressed. Disability Services determines accommodations based on documented disabilities in the academic environment. Information on requesting accommodations is located on the [Disability Services website](#). Contact Disability Services at 303-492-8671 or [dsinfo@colorado.edu](mailto:dsinfo@colorado.edu) for further assistance. If you have a temporary medical condition or injury, see [Temporary Medical Conditions](#) under the Students tab on the Disability Services website and discuss your needs with your professor.

### Religious Holidays

Campus policy regarding religious observances requires that faculty make every effort to deal reasonably and fairly with all students who, because of religious obligations, have conflicts with scheduled exams, assignments or required attendance. In this class, you must let the instructors know of any such conflicts within the first two weeks of the semester so that we can work with you to make reasonable arrangements. See the [campus policy regarding religious observances](#) for full details.

### Classroom Behavior

Students and faculty each have responsibility for maintaining an appropriate learning environment. Those who fail to adhere to such behavioral standards may be subject to discipline. Professional courtesy and sensitivity are especially important with respect to individuals and topics dealing with race, color, national origin, sex, pregnancy, age, disability, creed, religion, sexual orientation, gender identity, gender expression, veteran status, political affiliation or political philosophy. Class rosters are provided to the instructor with the student's legal name. I will gladly honor your request to address you by an alternate name or gender pronoun. Please advise me of this preference early in the semester so that I may make appropriate changes to my records. For more information, see the policies on [classroom behavior](#) and the [Student Code of Conduct](#).

### Sexual Misconduct, Discrimination, Harassment and/or Related Retaliation

The University of Colorado Boulder (CU Boulder) is committed to fostering a positive and welcoming learning, working, and living environment. CU Boulder will not tolerate acts of sexual misconduct (including sexual assault, exploitation, harassment, dating or domestic violence, and stalking), discrimination, and harassment by members of our community. Individuals who believe they have been subject to misconduct or retaliatory actions for reporting a concern should contact the Office of Institutional Equity and Compliance (OIEC) at 303-492-2127 or [cureport@colorado.edu](mailto:cureport@colorado.edu). Information about the OIEC, university policies, [anonymous reporting](#), and the campus resources can be found on the [OIEC website](#). Please know that faculty and instructors have a responsibility to inform OIEC when made aware of incidents of sexual misconduct, discrimination, harassment and/or related retaliation, to ensure that individuals impacted receive information about options for reporting and support resources.

### Honor Code

All students enrolled in a University of Colorado Boulder course are responsible for knowing and adhering to the Honor Code. Violations of the policy may include: plagiarism, cheating, fabrication, lying, bribery, threat, unauthorized access to academic materials, clicker fraud, submitting the same or similar work in more than one course without permission from all course instructors involved, and aiding academic dishonesty. All incidents of academic misconduct will be reported to the Honor Code ([honor@colorado.edu](mailto:honor@colorado.edu)); 303-492-5550). Students who are found responsible for violating the academic integrity policy will be subject to nonacademic sanctions from the Honor Code as well as academic sanctions from the faculty member. Additional information regarding the Honor Code academic integrity policy can be found at the [Honor Code Office website](#).

### Requirements for COVID-19

As a matter of public health and safety due to the pandemic, all members of the CU Boulder community and all visitors to campus must follow university, department and building requirements, and public health orders in place to reduce the risk of spreading infectious disease. Required safety measures at CU Boulder relevant to the classroom setting include:

- maintain 6-foot distancing when possible,
- wear a cloth face covering (over nose and mouth), especially when unable to maintain a distance of at least 12 feet,
- clean local work area,
- practice hand hygiene,
- follow public health orders, and
- if sick and
  - you live off campus, do not come onto campus (unless instructed by a CU Healthcare professional), or
  - you live on-campus, please alert CU Boulder Medical Services (<https://www.colorado.edu/healthcenter/coronavirus-updates/symptoms-and-what-do-if-you-feel-sick>)

Students who fail to adhere to these requirements will be asked to leave class, and students who do not leave class when asked or who refuse to comply with these requirements will be referred to Student Conduct and Conflict Resolution (<https://www.colorado.edu/sccr/>). For more information, see the policies on COVID-19 Health and Safety (<https://www.colorado.edu/policies/covid-19-health-and-safety-policy>) and classroom behavior (<https://www.colorado.edu/policies/student-classroom-course-related-behavior>) and the Student Code of Conduct (<https://www.colorado.edu/sccr/>). If you require accommodation because a disability prevents you from fulfilling these safety measures, please see the “Accommodation for Disabilities” statement on this syllabus.

Before returning to campus, all students must complete the COVID-19 Student Health and Expectations Course ( <https://www.colorado.edu/protect-our-herd/how#anchor1> ). Before coming on to campus each day, all students are required to complete a Daily Health Form ( <https://www.colorado.edu/protect-our-herd/daily-health-form> ). Students who have tested positive for COVID-19, have symptoms of COVID-19, or have had close contact with someone who has tested positive for or had symptoms of COVID- 19 must stay home and complete the Health Questionnaire and Illness Reporting Form remotely ( <https://www.colorado.edu/protect-our-herd/daily-health-form> ). ***In this class, if you are sick or quarantined, alert the instructor about the anticipated absence.***