

GEOS 450 Senior Seminar

Fall, 2017

Instructor: Jim Mills

Meeting Times: 7:00-8:30 TTh

Classroom: Julian 223

Seminar Goals

The Geoscience Senior Seminar is a capstone course that is designed to one, prepare you for the next phase of your life, whether it be graduate school or the workforce, and two, utilize the experience you have gained over the past few years in the geosciences to address, synthesize, and explore more deeply topics of interest that you have in the geosciences.

More specifically, this seminar will provide you the opportunity to research graduate schools and employment opportunities, to explore areas of the geosciences that you are particularly interested in, to read the primary literature, to engage in discussions with your peers, and to present your findings to your peers and to the Department. In this seminar, you will:

1. think about and plan for life nine months from now;
2. fine-tune oral communication skills;
3. fine-tune written communication skills;
4. learn to critically assess the scientific literature;
5. sharpen your critical thinking skills.

Seminar Organization

We will meet each week for three hours to work on assignments and to engage in discussions. There will be six assignments:

- Assignment #1. Résumé and LinkedIn profile.
- Assignment #2. Job search and application.
- Assignment #3. Graduate school search and application.
- Assignment #4. Critically analyze a scientific journal paper
- Assignment #5. Thematic discussions/teach a class.
- Assignment #6. Oral presentation to the Department.

Assignments #1-3 are meant to prepare you for your graduate school or job searches and to give you experience in writing for a professional audience. Regardless of your goals upon leaving DePauw, introducing yourself properly electronically and on paper is a valuable skill.

Assignments #4 is designed to give you experience in critically reading and analyzing a paper from a scientific journal. The ability to read a science-based document, understand the content, and analyze this document for its strengths and weaknesses is a talent that will serve you well in the future as you read materials in your chosen profession.

Assignment #5 is meant to give you experience researching and presenting a geoscience topic drawn from the primary literature. Each person will choose a topic in the geosciences and select **two papers** (three if the papers are relatively short) from the primary literature that the entire class will read. During seminar meetings, each student will lead a discussion-based class on the papers they have chosen. The discussion will begin with a timed, 12-minute presentation by the student,

followed by questions and a general discussion led by the student. Topics and papers for this assignment are due September 12th and 19th respectively.

Assignment #6 will be an opportunity for you to share your knowledge of a specific topic with the entire department, and to receive comments and questions from both your peers and faculty members in the Department. Assignments #5 and #6 may be on the same topic, provided that #6 expands significantly on the work you began for #5.

Grading

Your grade will be based on your seminar participation (discussion) and the five assignments. Grades will be weighted as follows:

Assignment #1: Resumé/LinkedIn Profile	5%
Assignment #2: Job Search/Application	10%
Assignment #3: Graduate School Application	15%
Assignment #4: Scientific Paper Analysis	5%
Assignment #5: Mock Class on Research Topic	20%
Assignment #6: Oral Presentation	25%
Discussion participation	20%

A = 90-100% B= 80-89% C = 70-79% D = 60-69% F = < 60%

[To receive S-certification, you must receive a course grade of C- or better AND your oral communication skills must be judged satisfactory for “S” certification by the professor]. For assistance with S-related work, visit the S Center, 115 Asbury Hall, 765-658-4039.

Your participation grade throughout the seminar will be based on the following criteria:

A (90-100) You initiated or contributed to a discussion that led to a deeper or broader understanding of the subject matter; you raised new issues or extended the discussion into related areas; you were able to clearly defend your position on an issue with appropriate evidence and supporting argument; you challenged someone else's position, belief, or assertion, with contrary evidence or argument. It was clear that you carefully and critically read all the material.

B (80-89) You participated by answering or asking questions of a factual nature; your comments showed that you completed the reading/writing assignment, that you followed the general trend of the discussion, and that you understood the topic/issue being discussed.

C (70-79) You were in class and seemed interested in the discussion. You participated in the discussion just enough to show that you read the appropriate material and completed the assignment.

D (60-69) You showed up for class, but you really didn't say much of anything. You were only marginally engaged in the discussion and consequently, it was hard to assess your understanding of the topic. It was not clear that you read the material.

F (<60) You weren't in class, either physically or mentally.

Plagiarism: I have a zero-tolerance policy. In your work for this class, be very careful to acknowledge all the sources that you draw from (and that includes PowerPoint presentations). Even an oversight can negatively impact your grade, and any evidence of intentional plagiarism (or a second offense of unintentional plagiarism) will warrant disciplinary action through the University Review Committee.

American Disabilities Act (ADA) Information: It is the policy and practice of DePauw University to provide reasonable accommodations for students with properly documented disabilities. Written notification from Student Disability Services is required. If you are eligible to receive an accommodation and would like to request it for this course, please contact Student Disability Services. Allow one week advance notice to ensure enough time for reasonable accommodations to be made. Otherwise, it is not guaranteed that the accommodation can be provided on a timely basis. Accommodations are not retroactive. Students who have questions about Student Disability Services or who have, or think they may have, a disability (psychiatric, attentional, learning, vision, hearing, physical, medical, etc.) are invited to contact Student Disability Services for a confidential discussion in Union Building Suite 200 or by phone at 658-6267.