

## CHEM 487 SEMINAR IN CHEMISTRY FIRST SEMESTER

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CHEM 487/488 is a two-semester sequence (0.5 credits each) in which you will learn and practice techniques used in making effective oral presentations of a scientific topic. In this first semester you will observe and critically evaluate seminars presented to the Chemistry department each Monday afternoon from 4:00 to 5:00 in Roddy 149 (and occasionally immediately following seminar. You will choose a topic and faculty mentor for your departmental seminar to be presented next semester. You will prepare a draft of your seminar. We will also explore employment and graduate school opportunities.

### Course Requirements:

1. Attend all Monday afternoon Chemistry Department seminars and class meetings.
2. Complete a "Seminar Evaluation Sheet" for each of the seminars.
3. Ask a minimum of two questions at seminar during the semester.
3. Choose a topic and faculty mentor for your seminar.
4. Prepare and submit an outline of your seminar for next semester.
5. Prepare and submit a draft of your seminar.
6. Prepare and submit a resume and job application cover letter.

### Grading:

Seminar Attendance and Evaluations	400 pts
Seminar Questions (minimum of 2 required for the semester)	50
Attendance at resume-writing/ cover letter presentation	75
Resume & cover letter	75
Seminar Topic with two references; choose a faculty mentor	50
Seminar Outline (seminar title, abstract, 5 references and outline)	50
Seminar Paper/PowerPoint Draft	<u>300</u>
Total	1000

The penalty for late assignments is 50% of the grade.

### Seminar Attendance and Evaluations

It is important that you attend every class and seminar. If you must miss class, please let me know in advance so that an alternative assignment may be arranged. A Request for Excused Absence form (found at the end of the syllabus) must be completed and submitted to the instructor. Students will be required to complete a "Seminar Evaluation Form" for each seminar attended. These forms will be due at the conclusion of the seminar presentation.

### Seminar Questions

Seminars and presentations at scientific meetings are a way of communicating scientific ideas. Often the presentations at scientific meetings involve new research data that has not yet appeared in the scientific literature. An important part of these presentations is the questions which are asked. A real involvement in the seminar topic can be demonstrated by the types of questions which are asked by the audience. Student will be expected to ask thoughtful questions at seminars.

### Resume and Cover Letter: Due October 31

Students will prepare a personal resume and write a cover letter for a job. Identify a specific job from the internet or C & E News and prepare a cover letter for that job.

Seminar Topic with two references: Due October 3

Preparing for your seminar next semester begins with selecting a topic and faculty mentor. Suitable topics include actual research that you have done or are currently doing, as well as library research on an interesting chemical topic. Students who wish to report the results of their undergraduate research for their seminar must complete their research in time for the seminar paper to be written and submitted at the end of the semester.

Seminar Outline (faculty mentor, seminar title, abstract, 5 references): Due October 24

Seminar Outline: Due November 7

It is critical to remember that the seminar should convey significant in-depth chemical information in an interesting manner to your audience. The purpose of a seminar is to teach something new to your audience. After selecting a topic and faculty mentor each student should perform a literature search to determine that enough information is available on the chosen topic. A literature search is the starting point for any paper or research project. A literature search is not the same as a Google search. Google Scholar, SciFinder scholar, etc., can be used to find journal articles, but to complete a literature search, you must get articles and *read them*. Often the best information is found by following up relevant references within your first batch of articles. The outline should include the title of the seminar topic, the name of the faculty mentor, an outline of the topics to be discussed, and a list of at least five references related to the topic. Three of these sources of reference must be primary sources of reference (a journal reference where the author is reporting his/her own work).

Seminar Draft: Due December 5

Prepare and submit a draft of your seminar presentation. This can be a printout of PowerPoint slides with notes, hand-drawn plans for slides with notes, or a detailed outline. It is not a written report, nor a transcription of everything you plan to say when presenting. You must have 5 references, at least 3 of which are ACS or similar refereed print journals. No web references are allowed. No cut-paste diagrams or figures are allowed. These must be adapted and recreated with the source acknowledged. There may be some exceptions in the case of photographs, spectra, and complex structures. However, permission must be obtained from the instructor.

*Millersville University and its faculty are committed to assuring a safe and productive educational environment for all students. In order to comply with the requirements of Title IX of the Education Amendments of 1972 and the University's commitment to offering supportive measures in accordance with the new regulations issued under Title IX, the University requires faculty members to report to the University's Title IX Coordinator incidents of sexual violence shared by students. The only exceptions to the faculty member's reporting obligation are when incidents of sexual violence are communicated by a student during a classroom discussion, in a writing assignment for a class, or as part of a University-approved research project. **Faculty members are obligated to report to the person designated in the University Protection of Minors policy sexual violence or any other abuse of a student who was, or is, a child (a person under 18 years of age) when the abuse allegedly occurred.***

### Tentative Fall 2022 Seminar Schedule

Date	Speaker	Topic or Title
August 29 <sup>th</sup>	<b>Emma Witmer</b> <i>Murley Fellowship</i>	Title
	<b>Aaron Maynard</b> <i>Murley Fellowship</i>	Title
September 3 <sup>rd</sup>	No Seminar – Labor Day	
September 19 <sup>th</sup>	<b>Dr. Joseph Bennett</b> <i>Asst Professor</i> <i>UMBC</i>	DFT as a noninvasive probe for art conservation science
October 3 <sup>rd</sup>	<b>Dr. Nicholas Lesner</b> <i>Post Doctoral Fellow</i> <i>University of Pennsylvania</i>	Biochemistry
October 10 <sup>th</sup>	Fall Break – No Seminar	
October 17 <sup>th</sup>	<b>Dr. Erica Frankel</b> <i>Associate Research Scientist</i> <i>Dow</i>	Industry/Polymer
October 24 <sup>th</sup>		
October 31 <sup>st</sup>		
November 7 <sup>th</sup>		
November 14 <sup>th</sup>	<b>Dr. Lauren Zarzar</b> <i>Penn State University</i>	Nanomaterials
November 21 <sup>st</sup>	<b>Dr. Leah Dodson</b> <i>University of Maryland</i>	Astrochemistry
November 28 <sup>th</sup>	<b>Evan Haas</b>	

## Request for Excused Absence

Student Name:

Dates of Absence:

Reason for Absence (circle one): Illness, Family Emergency, University Activity

Attach documentation to support the request for an excused absence.