Senior Seminar (adapted from Dr. C. Bender)

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Office hours: M 1:00-3:00, TTh 9:20-10:45, & by appointment
Class times: MWF 11:00-11:50 in Smith 203


Course Description: Senior Seminar is considered the “capstone experience” for students at USC-Upstate. Along with a general education test from the University, you will be expected to intelligently discuss chemical literature, give a short presentation about a chemical topic, write a major paper and present a PowerPoint talk ~40-45 minutes in length. Students should have completed speech, quantitative analysis, organic II, and p-chem I in order to be registered for this course, as well as at least one other 500-level chemistry course.

Course Objectives: By the end of the semester, the successful CHM 599 student will be able to
1. intelligently search various scientific databases
2. read, understand, and orally articulate the main focus behind a research article
3. summarize and integrate several scientific articles into a short presentation
4. write a major research paper, incorporating and integrating multiple sources
5. consider ethics, as it applies to the chemical sciences

Student Accountability

Academic Honor Code: Section II.B. Cheating. Though a nearly ubiquitous problem on college campuses around the country, cheating will not be tolerated in any form. Please pay particular attention to all parts in the student handbook. Students found to be cheating will be referred to the Dean of Students for appropriate sanctions. This action could result in the expulsion from class with a failing grade.

Attendance: It is expected that you will attend every class period, though you will be allowed two absences with an appropriate excuse (illness, death in the family). IF you miss a class period in which you are presenting a journal club, you will be penalized 20 % for that grade. If you miss a presentation of another member of class and there is a summary required for that presentation, you will be given a make-up assignment to be determined by the teacher (due in one week). If you miss your long presentation, you will automatically fail the course. If you show up to the long presentation and have equipment problems (short of power to the building going out), you will be penalized 30 % and will have to reschedule the presentation for April 25th.

Assessment Exams: The University designates each Senior Seminar class to take a written exam to assess the general education program at the university. This semester it will be given on February 14th unless otherwise delayed due to unforeseen circumstances.

Class Disruptions: Disruptive talking or disruptive behavior in class is against university policy and could be subject to penalty. Please be courteous to other students’ desire to learn.

Journal Club: For this assignment, students will present a short research article (not a review article) to the rest of the class. The paper on which you will present must be approved ONE WEEK (7 days) prior to your presentation. For each 24 hour period that it has late approval, the grade for the journal club will be lowered by 5 %. Note that approval of the paper is not to act as a barrier, but is really set up to help you avoid pitfalls in especially difficult articles. Students NOT presenting will be expected to have read the article, paid attention during the talk, and write a short summary on the basis of the article, as well as things the speaker did effectively and areas that may need some work. The point of this is to offer constructive criticism, NOT to berate your peers.

Short Presentation: In preparation for the major presentation, students will collect at least three articles on a related topic and present them in a formal (PowerPoint), 15-20 minute talk.

Long Presentation: The final full week of class will result in the culmination of your semester’s work. A formal (PowerPoint), 40-45 minute talk will be given on a topic of your choosing. As part of this talk, at least 10 primary literature sources will be used and integrated into a presentation. The decision on a topic for this talk should begin early and you are allowed to use articles that were discussed in your short presentation as a starting point. Assuming major modification is not needed to the syllabus, you will be given an opportunity to practice this presentation in class. A week before the presentation, a detailed
outline or rough draft of your paper is due. **You must have a topic for the long presentation selected no later than March 21.** Failure to turn in an outline/rough draft will result in a loss of 1 point per 24 hour period on your final average.

**Written Paper:** At the end of the semester you will write a paper, using ACS guidelines, on the topic of your long presentation. In essence, it will BE your long presentation in written format. Failure to turn in your written report by April 25 will result in a 5 point reduction on your paper for each 24 hour period. **You must have a topic for the written paper selected no later than March 21.**

**Grades:** Points will be distributed as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Points</th>
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<tbody>
<tr>
<td>Major oral presentation</td>
<td>25%</td>
</tr>
<tr>
<td>Written Paper</td>
<td>25%</td>
</tr>
<tr>
<td>Major Field Test</td>
<td>20%</td>
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<tr>
<td>Journal Club/Short presentation</td>
<td>20%</td>
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<tr>
<td>Summaries/miscellaneous grades</td>
<td>10%</td>
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</tbody>
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The grading scale is as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Points</th>
</tr>
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<tbody>
<tr>
<td>A</td>
<td>90-100</td>
</tr>
<tr>
<td>B+/B</td>
<td>87-89/80-86</td>
</tr>
<tr>
<td>C+/C</td>
<td>77-79/70-76</td>
</tr>
<tr>
<td>D+/D</td>
<td>67-69/60-66</td>
</tr>
<tr>
<td>F</td>
<td>≤59</td>
</tr>
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**Important Dates:**

- January 10 (Monday)—Classes Start
- January 17 (Monday)—Martin Luther King, Jr. Day (no classes)
- March 7-11 (Monday-Friday)—Spring Break (no classes)
- March 18 (Friday)—Last day to withdraw from class without academic penalty
- April 23 (Monday)—Last day of classes (classes ARE held)
- April 24 (Tuesday)—Rough drafts of papers are due
- April 30 (Monday)—Final drafts of papers are due.
- May 1 (Tuesday)—Major Field tests. Time ???

**Students with disabilities should notify me of special needs during the first day of class.**

**Disclaimer:** The instructor reserves the right to make adjustments in this syllabus as necessary.