I. COURSE: CHEM 3153-270: MTWRF 10:00-11:45 AM, Adams Hall 255
Prerequisite: CHEM 1415 or CHEM 1425, CHEM 3053

II. INSTRUCTOR INFORMATION

| Instructor: | Mr. Tyler Olsen |
| Office:     | SLSRC 2203     |
| E-mail:     | tylerkolsen@ou.edu |
| Desire2Learn| https://learn.ou.edu/index.asp |
| Office Hours: | TBA |
| Action Center: | TBA |

III. TEXTBOOK AND OTHER MATERIALS:


Molecular model kit *(Recommended)*

IV. COURSE DESCRIPTION:

Intended for life science majors. Second course in a Two-semester sequence (3053 and 3153). This course will cover the concepts of nomenclature, aromaticity, carbonyl chemistry and amines, with an emphasis on biological reactivity and applications.

V. OBJECTIVES:

The overall objective is for the student to master each chapter concept, including the evaluation of structural relationships, prediction of reactivity, analysis of reactions and reagents and the justification of chemical phenomena.

Understanding will need to be more than just memorization. The evaluation of how and why reactions happen will be the ultimate mastery of the course.

VI. EVALUATION:

The course grade will be determined by the average of Quizzes, 2 Exam grades and a Final Exam. The Final letter grading for the lecture course will be as follows: A = ≥90%, B = 89-80%, C = 79-70%, D = 69-60%, F = <60%.

<table>
<thead>
<tr>
<th>COURSE GRADE</th>
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<tbody>
<tr>
<td>Exams</td>
<td>2 @ 100</td>
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<tr>
<td>Final Exam</td>
<td>1 @ 125</td>
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<tr>
<td>Quizzes</td>
<td>best 3 out of 4 @ 25</td>
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<td>Total Points Possible</td>
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**Exams:**

The Exams will be 100-point 90-minute long exams and will be given during class time according to the schedule later in the syllabus. The instructor reserves the right to modify this schedule as needed. The exams will most often be a mixture of multiple choice and free response questions (short answer, essay, mechanism, etc.). The instructor does reserve the right to give exams that are composed of all multiple choice or all free response questions. The instructor also reserves the right to make different versions of an exam with different questions that cover the same course material and concepts.

The final exam will count for more than a regular exam (125 points) and will be a comprehensive exam over the whole semester. The final exam will be a 90-minute exam.

It is very important that each student show up on time during Exams. Every effort will be made by the instructor to distribute the exam materials in a timely fashion. Students that arrive to take the exam after the first student has turned in their exam and left the exam room will not be allowed to take the exam. The late arrival to an exam shall be treated as an unexcused absence to an exam and the student shall receive a zero, 0, for the exam grade.

**Quizzes:**

The quizzes will consist of three to five free response questions from the course material covered in the lecture since the last exam or quiz. The quiz will be worth twenty-five points. The questions on the quizzes will come from or be closely related to the practice problems from the text, the action center practice problems, or lecture “try this” problems. The quizzes will be given during the first ten minutes of class.

Once the quiz has been graded, the grade for the quiz will be posted on the D2L site. Students have one week to inform the Instructor that either the quiz was graded incorrectly or that the graded posted is incorrectly. **Students must clearly write their names on their quizzes as listed in D2L for the quiz to be graded.**

**Reading and Problems:**

The reading and suggested problems assignments that are given below or on the D2L website should be completed before the next class meeting. There will be no grade given for these activities. However, failure to stay current on reading and problem assignments will greatly affect your ability to keep up during lecture and, therefore, will have an indirect affect on your grade in this course.

**Grade Adjustments:**

There is no curve in this course. The instructor reserves the right to make linear adjustments to exam grades in cases were an exam question was found to be in error or unreasonably difficult. Linear adjustments will not be made to increase the average on an Exam.

**The grade you earn in the course shall be the grade that you receive in the course.** There will be no letter grade increases for any circumstance. The instructor will round all averages to two significant figures (69.5 will round to 70 and 69.4 will round to 69) to determine the student's letter grade in the course (70 = C, 69 = D).
VII. GENERAL POLICIES:

Attendance Policy:

Attending every lecture is highly recommended and expected. Not attending class will have an indirect negative effect on your grade. If low attendance to lectures becomes problematic, the instructor reserves the right to use attendance as extra-credit. Each lecture will have around 75 minutes of lecture, along with a half hour of practice/problem solving sessions. There will not be assigned seating in the lecture, but students are expected to sit next to their study group partners to facilitate communication during problem solving sessions in class.

Class Conduct:

All students are expected to follow proper classroom behavior and treat other students and the instructor with respect. If the instructor deems a student’s actions or behavior disruptive to the class, the students will be asked to leave the class for that day. Food and Drinks are not allowed in the classroom. Students that find it necessary to eat in class will be asked to leave the class for that day. Cellular phones must be turned off in class. **Ringing/Vibrating phones are disruptive to the class and you will be asked to leave the class if you forget to turn off your pager or phone.** Students that prefer to use their computer/tablet device to take notes should be seated in the first four rows of class.

Accommodations:

Any student in this course who has a disability that may prevent him or her from fully demonstrating his or her abilities should contact me personally as soon as possible so we can discuss accommodations necessary to ensure full participation and facilitate your educational opportunities. Students requiring academic accommodation should contact the Disability Resource Center for assistance at (405) 325-3852 or TDD: (405) 325-4173. For more information please see the Disability Resource Center website [http://www.ou.edu/drc/home.html](http://www.ou.edu/drc/home.html).

Emergency Contact:

In case of family or medical emergencies, students can notify the instructor by e-mail (bamper1@ou.edu). Once the emergency has passed, the student is expected to meet with the instructor to confirm the emergency through documentation and discuss what material/assignments the student has missed and what steps would beneficial to aid the student in continued success in the course.

Make-up Policy:

**Exams: No make-up Exams will be offered.** If a student misses an exam for a University-sponsored or legally required activity, the instructor will use the Final Exam to replace the exam that they missed. Since the Final Exam is comprehensive, it will test the same material that the student had not been evaluated on due to missing the exam.

Examples of the University-sponsored activities are scholarly competitions, fine arts performances, and academic field trips. Examples of legally required activities are emergency military service and jury duty. The instructor also reserves the right to excuse an absence to an exam in cases of immediate medical emergencies and family deaths.

Students who miss an Exam and do not have an excused absence as stated above will receive a zero, 0, for that Exam.
It is the policy of the University to excuse absences of students that result from religious observances and to provide without penalty for the rescheduling of examinations and additional required class work that may fall on religious holidays.

Quizzes: No Make-up Quizzes will be offered. Showing up late for a quiz will decrease the amount of time you have to complete the quiz, but the quiz must be turned in when the original ten minutes has expired. If a student shows up to class once the time has expired to take the quiz, the student will receive a zero, 0, for the quiz grade.

Not taking the quiz on time for any reasons will result in a zero, 0, for that quiz. One quiz grade is dropped to account for any unforeseen circumstances, including emergencies and illness.

Academic Integrity and Honesty:

All students are expected to conform to college-level standards of ethics, academic integrity, and academic honesty. By enrolling in this course, you agree to be bound by the Academic Misconduct Code published in The University of Oklahoma Student Code (www.ou.edu/studentcode/OUStudentCode.pdf). For further clarification please see: www.ou.edu/provost/integrity-rights/.

All members of the community recognize the necessity of being honest with themselves and with others. Cheating in class, plagiarizing, lying and employing other modes of deceit diminish the integrity of the educational experience. None of these should be used as a strategy to obtain a false sense of success. The need for honest relations among all members of the community is essential.

VIII. QUIZ SCHEDULE

| Quiz 1: Friday, July 4, 2014 |
| Quiz 2: Friday, July 11, 2014 |
| Quiz 3: Friday, July 25, 2014 |
| Quiz 4: Friday, August 8, 2014 |

IX. EXAM SCHEDULE

| Exam 1: Friday, July 18, 2014 |
| Exam 2: Friday, August 1, 2014 |
| Final Exam: Assigned finals week time (during class). Friday of that week if possible |

X. LECTURE SCHEDULE (Tentative)

The schedule below is a preliminary outline of the semester. It is your responsibility to keep up with changes to this schedule.

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<thead>
<tr>
<th>Monday</th>
<th>Tuesday</th>
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<th>Thursday</th>
<th>Friday</th>
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<tbody>
<tr>
<td>Jun 30 - Jul 4</td>
<td>Syllabus, schedule, concept review</td>
<td>17</td>
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<td>Jul 7 - Jul 11</td>
<td>18</td>
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<td>Jul 14 - Jul 18</td>
<td>20</td>
<td>20</td>
<td>20</td>
<td>20 Review</td>
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<td>Jul 21 - Jul 25</td>
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XI. COVERED CHAPTERS, SECTIONS AND SUGGESTED PROBLEMS

**Chapter 17**: Sections 17.1-17.7, 17.11-17.13  
Problems: 1,3,5,10,14,17,19,30,32,33,37,40,44,45,50

**Chapter 18**: Sections 18.1-18.6  
Problems: 1,6,8,10,12-15,17,28,33-37,40,45,46,64

**Chapter 19**: Sections 19.1-19.13, 19.15  
Problems: 4-6,9,10,15,16-18,20,23,29,32,33,43-46,56,58,62,68,71,79

**Chapter 20**: Sections 20.1-20.10, 20.12  
Problems: 1,5,6,9,12,13,15,18,26,29,31,37,41,57,60,63,66,68,69,75,85

**Chapter 21**: Sections 21.1-21.14, except organocuprates in 21.8  
Problems: 3-6,8,11,12,15-17,21,26,29,32,34,39,45,46,48,50,52,55,65,82

**Chapter 22**: Sections 22.1, 22.2 (alpha-halogenation), 22.3-22.7 except organocuprates  
Problems: 3,5,6,11,15,16,20,22,23,28,33,36,37,51,53,54,60,61,69,71,77,80,83,108

**Chapter 23**: Sections 23.1-23.12  
Problems: 1,4,6,7,10,12,14,21,22,26,29,30,33,39,41,43,48,54,57,59,62,63,70,86

**Chapter 24**: Sections 24.1-24.10  
Problems: 1,3,9,11,13,16,21,23,24,27,31,36,39,42,45,49,70,74,77,85

**Chapter 25**: Sections 25.1-25.4, 25.6  
Problems: 1,3,4,6,7,15,17,22,23,34,40,47,48,56,57,68,89

**Chapter 26**: Sections 26.1-26.8 except autooxidation in 26.4  
Problems: 3,9,16,18,22,24-26,32,33,35,38,44,49,57

XII. CHANGES TO THE SYLLABUS

The instructor reserves the right to change any part of the syllabus.