



# CHM 2210

## Organic Chemistry I Syllabus

### Fall 2016

**Instructor:** Dr. Mohammed Daoudi

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E-mail: Inbox (Webcourses email)

Office hours: Tu: 4:30 - 5:30 pm

We/Th: 10:00 - 11:30 am

**Course:** CHM 2210

#87865

Sec.0002

3 Units

**Lecture:**

Tu/ /Th

3:00 - 4:15 p.m.

CB2 207

#### **Required Materials**

1. Organic Chemistry, 2<sup>nd</sup> Edition, David Klein
2. Class Response System (i>Clicker)
3. Sapling Learning System
4. Molecular Model Kit

#### **Study Aids**

1. Student Study Guide and Solution Manual
2. Organic Chemistry as a second language I, David Klein, 3<sup>rd</sup> Edition
3. A guidebook to Mechanism in Organic Chemistry, Peter Sykes, 6<sup>th</sup> edition
4. Structure and Reactivity in organic chemistry, Mark G. Moloney

#### **Course Description**

CHM 2210 is a 3 credit hours course designed to fulfill requirements in organic chemistry for the first semester in science education. Emphasize will be on nomenclature, properties, syntheses, and reactions of aliphatic and cyclic alkanes, alkenes, alkynes, alcohols, phenols, ether and alkyl halides; including the mechanisms of the reactions.

#### **Prerequisites**

C grade or better in CHM 2046 or equivalent.

#### **Learning Outcomes**

By the end of this course, you should be able to:

- Recognize and analyze the atomic structures, bonding, resonance, formulas and the acidity and basicity of organic compounds
- Demonstrate an understanding of the structure, properties, nomenclature, synthesis, and reactions of alkanes, cycloalkanes, alkenes, alkynes, alkyl halides, alcohols, and ethers.
- Predict and analyze nucleophilic substitution, elimination, addition, and free radical reactions.
- Comprehend the three dimensional aspect of stereochemistry as it applies to conformational analysis, geometrical and optical isomers.
- Perform mechanism for organic reaction of alkanes, alkenes, alkynes, alkyl halides, alcohols, and ethers.
- Develop plans for retrosynthetic analysis to solve multistep synthesis problems.
- Develop and enhance critical thinking and problems solving skills.

## Evaluation and Grading

Your final grade for this course will be computed using the following data:

4 Exams (100 points each): <b>(The lowest will be replaced by the % final exam, if higher)</b>	400 points	40%
14 Quizzes <b>(the two lowest will be dropped)</b>	150	15%
Final exam <b>(cumulative and mandatory)</b>	200	20%
Online Homework (Sapling Learning)	150	15%
Class Participation	100	10%
<b>Total</b>	<b>1000</b>	<b>100%</b>

**Extra Credit:** I offer 50 points (possible) as extra credit. These points are distributed as following:

- ALEKS Assignments (20 points): Based on 100% mastering of the assigned topics.
- LearnSmart Assignments (30 points): Each assignment is graded separately. To get the allotted points of an assignment, you need to complete it (100%).
- In addition, extra credit questions are offered for each exam.

I will adopt the following grading scale:

**A: 90-100 %**                      **B+: 85-89 %**                      **B: 80-84 %**                      **C+: 75 -79%**  
**C: 70 -74%**                      **D: 60-70%**                      **F: ≤ 59 %**

Grades for this course will be posted on WebCourses2@UCF. You may access your scores at any time through <https://webcourses.ucf.edu>. **Grades will not be given out over the phone or via e-mail.**

## Online Supplements

Mastering organic chemistry concepts and knowledge requires a lot of practice and problem solving. I encourage you to solve as many problems as you can at the end of each chapter.

Graded online homework assignments are assigned using **Sapling Learning**. The system provides an interactive learning environment.

- To get started go to Webcourses and click the link: [Sapling Learning Enrollment](#) in Home Page and follow the instructions.
- Work on the Sapling Learning training materials. The activities, videos, and information pages will familiarize you with the Sapling Learning user environment and serve as tutorials for efficiently drawing molecules, stereochemistry, etc. within the Sapling Learning answer modules. These training materials are already accessible in your Sapling Learning course.
- During sign up - and throughout the term - if you have any technical problems, send an email to [support@saplinglearning.com](mailto:support@saplinglearning.com) explaining the issue. **Your instructor will not be able to solve such problems.**
- Each online assignment has a due time and date. You need to complete your assignment before the deadline. **No extension will be provided.**

## Classroom Response System

I will be using i>clicker student response system in class this term. i>clicker helps me to understand what you know and gives everyone a chance to participate in class. Participation with i>clicker will account for 10% of your final grade.

You may use one of the following models:

The original i>clicker, i>clicker +, or i>clicker 2

How to register:

In order to receive credit, you will need to register your i>clicker remote on Webcourses, you must do so by 8/31/2016. To do so, log into your Webcourses account, choose CHM 2210 course, then click i>clicker link and follow the instructions.

If you have more questions on i>clicker registration, please visit <http://support.iclicker.com> for FAQs and other resources.

## Cheating

I consider bringing a fellow student's i>clicker to class to be cheating and a violation of the University Honor Code. If you are caught with a remote other than your own or have votes in a class that you did not attend, you will forfeit all clicker points and may face additional disciplinary action.

## Webcourses@UCF

CHM 2210 is a face-to-face course. I use Webcourses@UCF, <https://webcourses.ucf.edu>, to enhance the face-to-face environment. Lecture notes, quizzes, announcements, grades, links, etc. are posted on Webcourses@UCF.

## Attendance Policy

- You should make every effort to attend lecture classes and comply with the examination schedule outlined in this syllabus. You are held responsible for all material presented in the classroom even during your absence.
- You are responsible for all announcements made during lectures and/or through electronic communication (i.e. Webcourses@UCF, email)

## Makeup Policy

The following makeup policy will be applied:

- **No makeup for missed exams, quizzes, or homework.**
- If you miss one schedule exam, your final exam grade (%) will be used for that exam.
- More than one missed schedule exams shall count zero (0), except for any University-sponsored events.
- To accommodate some missed assignments, two Quizzes and two online homework assignments will be dropped.
- **Missing the final exam will lead to an F grade in the class.**

## Withdrawal

If you wish to withdraw from the course you must do so by **Monday, October 31, 2016, 11:59 p.m.** to receive a W. In case you do not withdraw from the class and do not show up, you will receive an F grade.

## Supplemental Instruction

The Student Academic Resource Center (SARC) offers weekly study sessions for all students in Organic Chemistry I. The sessions are led by an experienced SI Leader. I strongly encourage you to participate in these sessions. The statistics showed that students attended SI sessions improve their final grades significantly. SI sessions schedule will be announced in class and posted on Webcourses@UCF.

## Tutorial

SARC also provides free tutoring to all UCF students taking Organic Chemistry I. The Student Academic Center is located in Phillips Hall, Room 115. ☎ 407-823-5130. <http://sarc.ucf.edu>  
Tutoring schedules are posted on SARC website and will be announced in class.

## Chemistry Tutoring Center

In addition to the above tutoring offered by SARQ, Chemistry Department offers tutoring for both general and organic chemistry delivered by well trained graduate students. The Chemistry Tutoring Center is located in Chemistry Building, CHEM 331. The tutoring schedule will be posted on Webcourses@UCF.

## Accessibility Accommodations

If you need academic accommodations, such as private testing, interpreters, note takers, etc., please contact the Students Accessibility Services (SAS) in Room 132, ☎ 407-823-2371, <http://sas.sdes.ucf.edu>. This office will then notify me, in writing, of the need for an accommodation. No accommodations will be provided until SDS notifies me.

## Academic Integrity/Plagiarism

"Plagiarism and Cheating of any kind on an examination, quiz, or assignment will result at least in an "F" for that assignment (and may, depending on the severity of the case, lead to an "F" for the entire course) and may be subject to appropriate referral to the Office of Student Conduct for further action. See the UCF Golden Rule for further information. I will assume for this course that you will adhere to the academic creed of this University and will maintain the highest standards of academic integrity. In other words, don't cheat by giving answers to others or taking them from anyone else. *I will also adhere to the highest standards of*

**academic integrity, so please do not ask me to change (or expect me to change) your grade illegitimately or to bend or break rules for one person that will not apply to everyone”.**

Only nonprogrammable calculators are allowed in exams

Cell phones and other personal digital communication devices are not allowed during examinations. Use of electronic communication devices during exams or other graded activities may constitute grounds for disciplinary action.

### **Federal Financial Aid Regulation**

All faculty members are required to document students' academic activity at the beginning of each course. In order to document that you began this course, please complete the following academic activity by the end of the first week of classes, or as soon as possible after adding the course. Failure to do so will result in a delay in the disbursement of your financial aid.

The assignment: **Syllabus Quiz.**

### **What you need to do to succeed in this class:**

- You need to attend all lectures to be successful in this course. Bring your textbook/ebook every meeting. Arrive to the lectures on time.
- Read the material in the textbook/ebook **before** it is presented in class. This will make you familiar with the material and allow you to better understand the lecture. Reading the material before coming to lecture will help you to think of questions during the lecture. Furthermore, if you have read the text and do not understand something then you can ask about it during the lecture. Do not be afraid to ask questions during lecture. I truly encourage and promote questions and discussions.
- Complete the pre-lecture assignment (LearnSmart).
- Solve all assigned online homework questions. Then solve as many problems as you can at the end of each chapter.
- **Practice!, practice!, practice!**

### **Classroom Conduct**

I want to promote an environment that allows everyone to benefit from this course. To attain this goal, each of us should respect the rights of everyone else. The following are some behaviors that are **not allowed** in this class.

- **No phone conversation, texting and/or messaging in classroom.**
- Laptops, tablets, and other mobile devices should be used **only for educational purpose.**
- If you arrive late to class, be quiet as you enter the room.
- **Do not have conversations during lectures or during clicker questions**
- All types of recording /taking photos during the class are not allowed unless a prior permission is obtained from the instructor.

### **Email Communication:**

**All class email should be done through [Webcourses@ucf](mailto:Webcourses@ucf) (Inbox) and use your Knights email.**

I usually check my email at least twice per day. However, allow 2-3 days to get your email answered.

## Tentative Class Schedule

The following schedule is tentative and may not be followed exactly.

<u>Date/Week</u>	<u>Testing</u>	<u>Lecture</u>
08/23-08/25		Chapter 01: Electrons, Bonds and Molecular Properties
08/30-09/01		Chapter 02: Molecular Representations +Chapter 03
09/06		Chapter 03: Acids and Bases
<b>09/08</b>	<b>Exam 1</b>	(Chap. 1, 2 and 3)
09/13-09/15		Chapter 04: Alkanes and Cycloalkanes
09/20-09/22		Chapter 05: Stereochemistry
09/27-09/29		Chapter 06: Chemical Reactivity and Mechanisms +Chapter 05
<b>10/04</b>	<b>Exam 2</b>	(Chap. 4, 5 and 6)
10/06		Chapter 07: Substitution Reactions
10/11-10/13		Chapter 08: Alkenes: Structure and Preparation + Chapter 07
10/18-10/20		Chapter 09: Addition Reactions of Alkenes + Chapter 08
10/25		Chapter 09: Addition Reactions of Alkenes
<b>10/27</b>	<b>Exam 3</b>	(Chap. 7, 8 and 9)
11/01-11/03		Chapter 10: Alkynes +Chapter 11: Radical Reactions
11/08-11/10		Chapter 11: Radical Reactions + Chapter 12: Synthesis
<b>11/15</b>	<b>Exam 4</b>	(Chap. 10, 11 and 12)
11/17		Chapter 13: Alcohols and Phenols
11/22		Chapter 13: Alcohols and Phenols
<b>11/24</b>		<i>Thanksgiving (No Class)</i>
11/29-12/01		Chapter 14: Ethers and Epoxies; Thiols and sulfides
<b>12/05</b>		<i>Study Day (No Class)</i>
<b>12/08/2016</b>	<b>Final Exam</b>	1:00-3:50 pm (Chap. 1-14)

The instructor reserves the right to modify the schedule, the testing procedure, and the grading basis if, in the professional judgment of instructor, such modification is in the best interest of fulfilling the course objectives and assuring the academic integrity of the course and the institution.

You are responsible for announcements made during lectures and discussion sessions and/or through electronic communication (i.e. Webcourses@UCF, email)