

**SYLLABUS – CHEM 224 – Organic Chemistry B – 2<sup>nd</sup> Semester – TuThur am Lecture  
Spring 2020 - LOYOLA UNIVERSITY CHICAGO (LUC)**

<b>Lecture:</b> #1108	<b>Section:</b> 005	<b>TuThur</b>	<b>8:30 – 9:45 a.m.</b>	<b>Flanner Auditorium</b>
<b>Discussion:</b> #1109	<b>Section:</b> 006	Wednesday	11:30 am – 12:20 pm	Mundelein 514
	#1110 <b>Section:</b> 007	Wednesday	12:35 pm – 01:25 pm	Mundelein 514

**Lecturer:** Dr. C. Szpunar

Office: Flanner Hall **200B**

Contact: best in person, 773-508-3128, cszpuna@luc.edu

Emergency Message via Chemistry Dept. Office: 773-508-3100, fax: 773-508-3086

**Office Hours:**

**Tu:** 11 am – 1 pm

**Thur:** 10:15 am – 11:15 am (1<sup>st</sup> Thurs of the month), 10:15 am – 12:00 pm (all other Thursdays)

**Fri:** 11:30 am – 1:00 pm

(before class, ONLY IF lecturer is prepared for class AND student schedule conflicts w/regular office hours)

**N.B.:** Answer keys will be posted in the glass case outside Flanner 200B. No photographing pls!

**Required:** (See bookstore for most up-to-date offerings as publisher deals directly with bookstore.)

1. Organic Chemistry, Klein, 3<sup>rd</sup> ed., Wiley, 2017
2. Student Study Guide and Solutions Manual, Klein, 3<sup>rd</sup> ed. Wiley, 2017

Option 1: ISBN 978-1-119-38071-9

1. Soft, unbound, printed 3-hole punch text
2. Paperback solutions manual/study guide

3. Wiley Plus plus Orion – the online homework/practice tool – **Course ID: 725492**

Option 2: ISBN 978-1-119-43349-1

1. Soft, unbound, printed 3-hole punch text
2. Etext solutions manual/study guide
3. Wiley Plus plus Orion – the online homework/practice tool

**Suggested / Recommended Materials:**

1. Molecular modeling kit, Darling, Duluth, or equivalent
2. WileyPlus online homework/practice tool

**Optional Materials** (found helpful by some students, **do not purchase immediately**):

1. Organic Chemistry as a Second Language, II, Klein (2006), Wiley (ISBN 978-0-471-73808-4)
2. Barron's Orgo Cards: Organic Chemistry Review, Wang, Razani, Lee, Wu, and Berkowitz (ISBN 0-7641-7503-3) \*or\* Organic Chemistry Study Cards, R Van De Graaff, K Van De Graaff, and Prince, Morton Publishing, 2003 (ISBN 0-89582-577-5) \*or\* equivalent

**Grading** (approx. weighting below) with approximate curved-grade guidelines:

**>90% A, 90-88% a-, 88-86% b+, 86-70% B, 70-68% b-, 68-66% c+, 66-55% C, 55-50% c-, 50-45% D, <45% F**

🎵 **EXAMS – 2** – dates announced (subject to change, although unlikely) – **NO MAKE UPS** **45%**

- UNEXCUSED ABSENCES merit a zero score.
- EXCUSED ABSENCES are handled on a case-by-case basis; grade weighting may be adjusted, depending on the circumstance(s); however, an excused absence **MUST BE CORROBORATED and DOCUMENTED**, e.g., accompanied by a note from the doctor, dentist, hospital rep, or funeral director; by a court summons, plane ticket stub, hospital release form, obituary, or other. **With proper documentation**, religious observance, representing the university, or personal emergency constitutes an Excused Absence.

🎵 **QUIZZES** – TBD – **UNANNOUNCED** (during lecture, discussion period, as take-home) **20%**

🎵 **FINAL** – date announced (scheduled by CAS), **no alternative date/time, NO MAKE UPS** **35%**

🎵🎵 **Homework** – per chapter/topic; feel free to work any/all problems to apply and master concepts.

🎵🎵 **Optional Short Report** (as detailed below, one option ONLY) \*\*\* **BONUS** (maximum of 3 – 5%)

Typically, Organic Chemistry is not efficiently self-taught. Overnight cramming will probably not produce success! The student should quickly read the chapter/segment to be covered BEFORE lecture to improve lecture comprehension. After lecture, careful detailed reading of the chapter/segment and focused working of the relevant problems are appropriate, necessary, essential, and expected. In addition to student's participation in lecture, discussion, reading, and homework, joining and contributing to a study group is strongly encouraged.

*If anticipating a passing grade of C, the minimal time per week devoted to Organic Chemistry is estimated at 4 hr for lecture and discussion, 4-10 hr for reading, and 4-10 hr for homework.*

**Chemistry and Biochemistry Department Caution** (effective Aug. 4, 2016, adj Aug. 27, 2019):

A student who opts to withdraw from CHEM 224 lecture after midterm may be permitted to remain in CHEM 226 – the co-required laboratory.

If a student plans to continue with the laboratory portion of the sequence, that student must continue to attend all of the lectures until the week of the official drop date, to gain as much background knowledge as possible in preparation for each laboratory assignment and in order to work safely in the laboratory amongst the other students. If a student is considering withdrawing from lecture, but wishes to remain in the lab, the student may seek assistance from the Department of Chemistry and Biochemistry Office in the week prior to the deadline for withdrawing, beginning Monday at 9:00 am through Friday at 4:00 pm.

**Chemistry and Biochemistry Department Course Repeat Rule** (effective Aug. 24, 2017):

Effective with the Fall 2017 semester, students are allowed only THREE attempts to pass Chemistry courses with a C- or better grade. The three attempts include withdrawals (W).

After the second attempt, the student must secure approval for a third attempt. Students must come to the Chemistry Department, fill out a permission to register form or print it from the Department of Chemistry & Biochemistry website: <http://www.luc.edu/chemistry/forms/> and obtain a signature from the Chemistry Department. A copy of this form must be approved by the student's Academic Advisor to secure final permission for the attempt.

**Accommodations (SSWD/SAC):**

Any student requesting accommodation(s) for extra exam time, different test venue, and/or other course considerations should present their required SSWD/SSA letter to the Chair of the Chemistry and Biochemistry Department in the first or second week of the term, but NOT later than 10 days before a scheduled exam.

Please note that when requesting extra exam time, the student MUST NOT have scheduled another class directly BEFORE and directly AFTER this course, which would preclude him/her from taking the scheduled exam AT THE TIME OF THE GIVEN EXAM, i.e., the SSWD/SSA exam time **must overlap** the official exam time to be fair to ALL students. The student should note the posted SSWD/SSA office schedule and must schedule each accommodated exam at least one week prior to any exam where such accommodation is requested.

Lecture Outline for *Klein Ed. 3* (tentative, subject to change) – Spring 2020

<u>Week</u>	<u>Date</u>	<u>Ch-Lecture</u>	<u>Topic</u>	<u>***EVENT***</u>
1	Jan 14 Jan 16	14-1 14-2	Review – IR Spectroscopy and MS	
2	Jan 20 Jan 21 Jan 23	*** 15-1 15-2	NMR Spectroscopy	*****Holiday – Martin Luther King Jr. Day*****
3	Jan 28 Jan 30	16-1 16-2	Conjugated Systems	
4	Feb 4 Feb 6	17-1 17-2	Aromatic Compounds	
5	Feb 11 Feb 13	18-1 18-2	Aromatic Reactions	
6	Feb 18 <u>Feb 20</u>	19-1 ***	Aldehydes and Ketones	***** <b>Thursday</b> ***** <b>EXAM I (Chapters 14-18)</b>
7	Feb 25 Feb 26 Feb 27	19-2 *** 19-3		***** Ash Wednesday *****
8	Mar 2-7	***		***** Monday-Saturday ***** MIDTERM Spring BREAK *****
9	Mar 10 Mar 12	20-1 20-2	Carboxylic Acid and Derivatives	
10	Mar 17 Mar 19	20-3 21-1	Alpha Carbon Enols and Enolates	
11	Mar 23 Mar 24 Mar 26	21-2 21-3 22-1	Amines	***** Monday ***** (last day to withdraw with a W) *****
12	Mar 31 <u>Apr 2</u>	22-2 ***		***** <b>Thursday</b> ***** <b>EXAM II (Chapters 18-21)</b>
13	Apr 7 Apr 9 Apr 10 – Apr 13	23 24-1	Organometallics Carbohydrates	***** Good Friday – Easter Monday ***** EASTER BREAK
14	Apr 14 Apr 15 Apr 16	24-2 *** 24-3		*** optional BONUS report due by noon ***
15	Apr 21 Apr 23	24-4 25 / 26	Amino Acids, Peptides, and Proteins / Lipids	
16	<b>May 2 Sat</b>		<b>Cumulative FINAL EXAM, 9:00 – 11:00 am, Flanner Auditorium</b>	