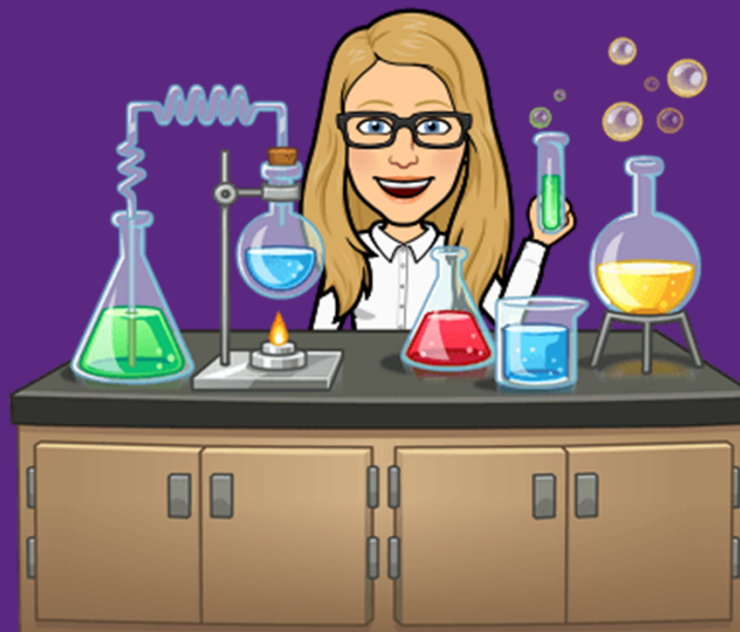


For clicker question voting, go to:
<https://pollev.com/lauriestarke263>



Dr. Laurie S. Starkey
Cal Poly Pomona

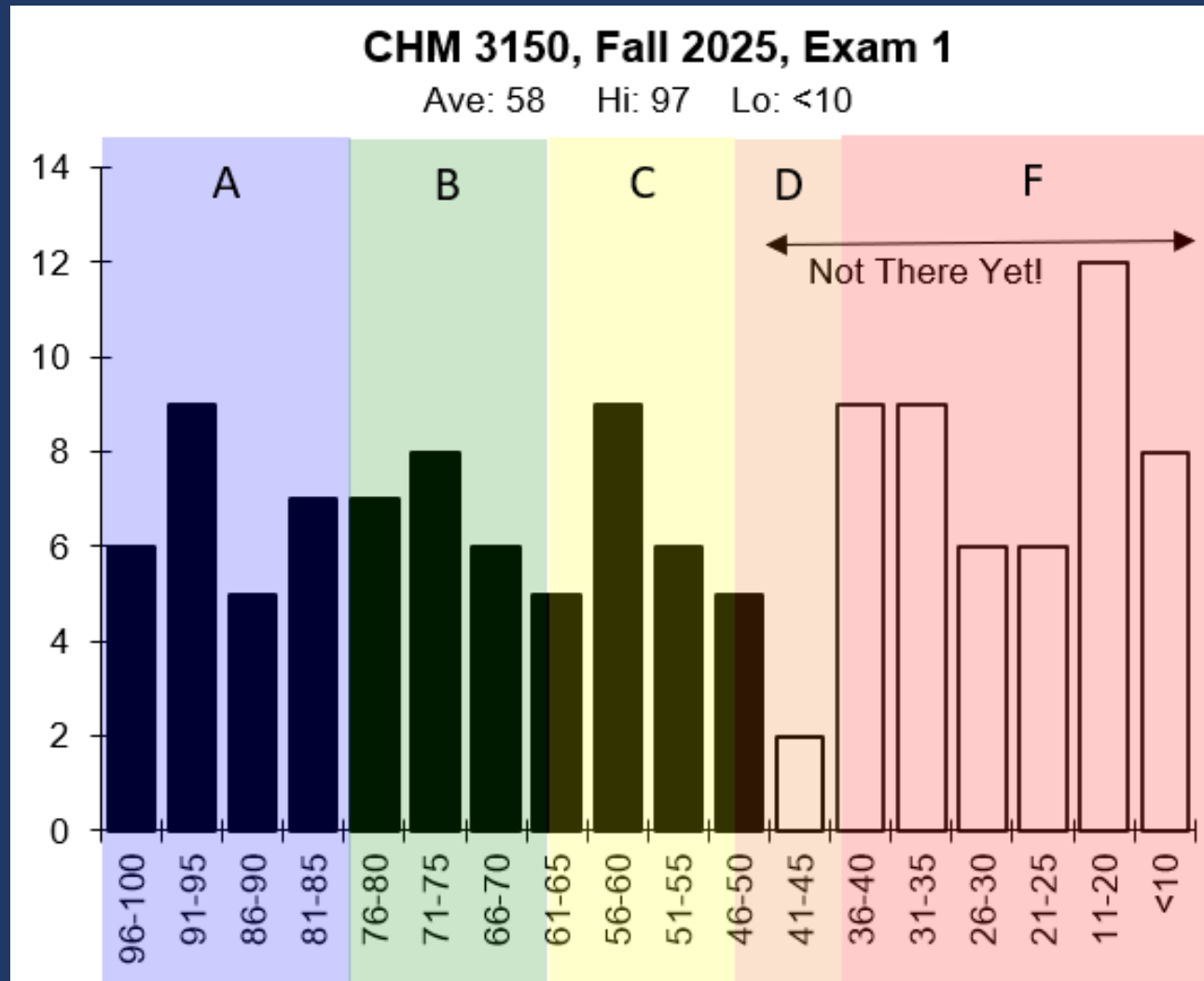
CHM 3150 Organic Chemistry II
9/23/25

Exam I Results

A/B/C... ranges are to give you a rough idea of projected CHM 3150 grade based only on this exam score & full homework credit.

To Pass: Exam Ave >50

Note: lowest midterm score will be dropped!



Exam Wrapper (Survey) & Exam Corrections due Sunday 10/5

CHM 3150 Exam Wrapper - Post-Test Survey Name: _____

Metacognition By taking a step back and **thinking** about the way you **learn**, you can **improve** your learning! The following survey will guide you through an exercise in **self-reflection**, with the goal of improving your performance on the next exam. *You will earn 4 points credit if you complete this survey, and 4 points for corrections (*include written reflection, if score <50).* It analyzes the following three areas:

1. How did you prepare for this exam?
2. What kinds of mistakes did you make?
3. How will you prepare differently next time?

What was your score on the exam? (out of 100 points)

What was your grade in CHM 1220? CHM 3140? Are you repeating CHM 3150? Y / N

1. Leading up to the exam, approximately how many hours per week outside of class (on average) did you spend studying Organic Chemistry?

2. Given the number of textbook problems in each chapter (#), about how many did you work on?

Mark here if no VitalSource book: ☐

Ch.11 (Synthesis)	~100	Ch. 12 (Alcohols)	~200	Ch. 13 (Ethers)	~200		
In-chapter	<input type="text"/>	In-chapter	<input type="text"/>	In-chapter	<input type="text"/>	# of Flashcards?	<input type="text"/>
End-of-ch.	<input type="text"/>	End-of-ch.	<input type="text"/>	End-of-chapter	<input type="text"/>	# hours per week?	<input type="text"/>

3. Approximately how much of your studying was spent doing each of the following activities?

5 4 3 2 1
major contributor moderate amount some time spent minimal amount not done at all

Friday Fives (4 pts each)
(13+ earns max. credit)

52

OLC reports (1 pt each)
(7+ reports earns max. credit)

7

Exam Wrappers 8
(4 pts each, drop one)
Exam Corrections 8
(4 pts each, drop one)

Study/Reflection
Course Points

75 (15%)

Advice for “How to Earn an A (or B...)”

Strategies for Earning an A (or B...) in Organic Chemistry Dr. Laurie Starkey, Cal Poly Pomona

“Miriam, a freshman calculus student at Louisiana State University (LSU), made 37.5% on her first exam but 83% and 93% on the next two exams. Robert, a first-year general chemistry student at LSU, made 42% on his first exam and followed that up with three 100% in a row. Matt, a first-year general chemistry student at the University of Utah, scored 65% and 55% on his first two exams and 95% on his third exam. I could go on. I could tell you scores of stories like this from the last 15 years of my teaching career. Something happened to all of the students between their last failing grade and their first good grade. They learned something new. **No Miracles, Just Strategies**”
Saundra McGuire, author of *Teach Students How to Learn*

And one more story to share: Laurie, a first-year graduate student at UCLA, scored 12% on her first Organic Synthesis midterm...but then she succeeded in the course, earned her Ph.D. in Organic Chemistry, developed a rewarding teaching career, and even wrote a textbook on Organic Synthesis! So if you are not yet having success in Organic Chemistry, the good news – the GREAT news – is that you can still improve by learning how to learn. Let’s explore various strategies that can help you learn Organic Chemistry and reach your desired goal. **Formative Assessment** is the feedback you get while learning and studying. It comes from *writing down* an answer and checking to see if it is right. **Summative Assessment** is what you do at the end of a unit – taking a quiz or exam for a grade. Formative assessment provides *evidence of your learning*...it helps you steer in the right direction and positions you to do well on summative assessments.

1. **Attend Lecture** - Come to class, take questions, try problems presented in
2. **Read the Book** - As soon as possible closely look through any examples the problems you will encounter on exam compare two compounds (e.g., Higher mechanism, explain something (e.g.,
3. **Work on In-Chapter Problems** - After examples (sometimes there are also S learned skills to the problem(s) in the problem down onto the page and *wri* is the only way to practice and *provid* book and/or lecture notes for help as Manual (or at the back of the book), a
 - a. If your answer was perfect, th a break before moving on to t
 - b. If you made mistakes, do you problem. If there are no mor answer perfect, *without referring to your notes or the book.*
 - c. If you don’t understand the Solutions Manual answer, or you don’t even know how to get started on the problem, then go back to your class lecture notes. Read through your notes and try to work on the example(s) we did in class (i.e., copy it down on a blank page and attempt the problem on your own). Next, re-read or skim through the textbook again and work on the



Today's Topic: Ch. 19 Aldehydes & Ketones (Part 1)

Chapter 19

✓ Watch

✓ Read

✓ Practice

Daily To-Do

Flipped Lectures

Step 1 **Read**

- Read Klein
 - Sections 19.1, 19.2 **Nomenclature of Aldehydes & Ketones**
 - Section 19.3 **Preparation of Aldehydes & Ketones**
 - Sections Klein 19.4-19.6 **Reaction with Hydride & Grignard Nucleophiles**

- Watch flipped lectures

- Work through **SkillBuilder** 19.1 and **Conceptual Checkpoints** 19.5a-e, 19.6a-d, 19.7ab, 19.8ab
- Practice Aldehyde/Ketone Nomenclature: [practice worksheet](#) and [answer key](#)

- [Part 1a - IUPAC of Aldehydes and Ketones](#)

14 minutes

skeleton notes page 19-1

- [Part 1b - Preparation, Reaction with Hydride/Grignard](#)

38 minutes

skeleton notes pages 19-1 to 19-3

Practice

Watch

Flipped Lectures

Ketones ▼

Intro	0:00
Aldehydes & Ketones	0:11
The Carbonyl: Resonance & Inductive	0:12
Reactivity	0:50
The Carbonyl	2:35
The Carbonyl	2:36
Carbonyl FG's	4:10
Preparation/Synthesis of Aldehydes & Ketones	6:18
Oxidation of Alcohols	6:19
Ozonolysis of Alkenes	7:16
Hydration of Alkynes	8:01
Reaction with Hydride Nu:	9:00
Reaction with Hydride Nu:	9:01
Reaction with Carbon Nu:	11:29
Carbanions: Acetylide	11:30
Carbanions: Cyanide	14:23
Reaction with Carbon Nu:	15:32
Organometallic Reagents (RMgX, RLi)	15:33
Retrosynthesis of Alcohols	17:04
Retrosynthesis of Alcohols	17:05
Example	19:30
Example: Transform	19:31
Example	22:57
Example: Transform	22:58
Example	28:19
Example: Transform	28:20
Example	33:36
Example: Transform	33:37

**Synthesis of
Ald/Ketones &
Reactions with
Hydride & C Nu:**

Exam II Covers Chapters 19 & 20

CHM 3150 Organic Chemistry II, Dr. Laurie S. Starkey, Fall 2025

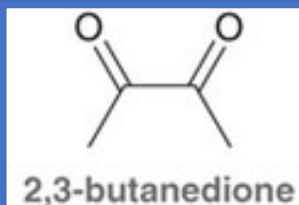
Tentative Schedule (Chapter and Worksheet #)

Week	Mon	Tues	Wed	Thurs	Fri
0	8/18	8/19	8/20	8/21 Review 7-11 #1	8/22
1	8/25	8/26 Review 7-11 #2	8/27	8/28 Ch. 12 #1	8/29
2	9/1 Holiday	9/2 Ch. 12 #2	You are here	9/4 Ch. 12 #3	9/5
3	9/8	9/9 Ch. 13 #1		9/11 Ch. 13 #2	9/12
4	9/15	9/16 Ch 13 #3, Review		9/18 Exam I	9/19
5	9/22	9/23 Ch. 19 #1	9/24	9/25 Ch. 19 #2	9/26
6	9/29	9/30 Ch. 19 #3	10/1	10/2 Ch. 19/20 #1	10/3
7	10/6	10/7 Ch. 20 #2	10/8	10/9 Ch. 20 #3	10/10
8	10/13	10/14 Ch.20 #4, Review	10/5	10/16 Exam II	10/17

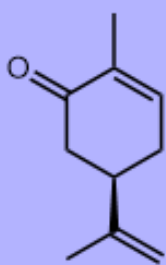
Fragrant Aldehydes & Ketones



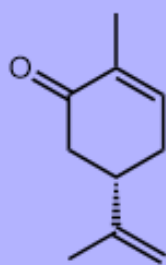
Diacetyl, a yellow liquid with a buttery flavor, is often added to movie-theater popcorn.



Terpenoids



(R)-Carvone
(spearmint)

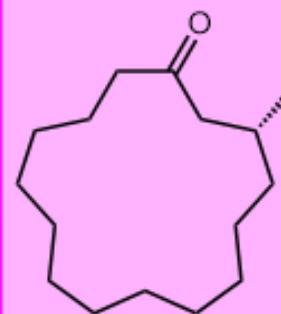


(S)-Carvone
(caraway)

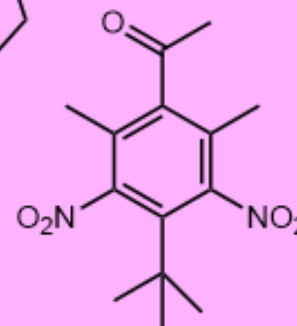


Camphor
(Vicks Vap-o-rub)

Animal Products

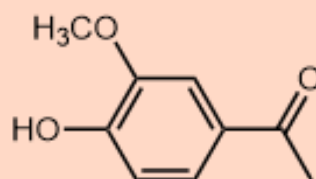


Muscone
(musk deer glands)

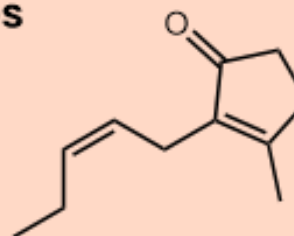


Musk ketone
(synthetic musk)

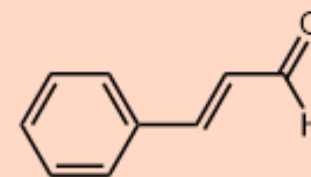
Ketones & Aldehydes



Vanillin



(Z)-Jasmone



Cinnamaldehyde