

Chemistry 0345: Organic Chemistry Laboratory

Course Schedule

Spring 2023 (Term 2234)

Faculty Coordinators: Ericka Huston and Jackie Powell, 107 Chevron, orgcoord@pitt.edu

Required Resources for All Students in Chem 0345

- **Labflow Online Laboratory Platform:** Access can be purchased at either the bookstore (ISBN: 978-0-9600627-0-6) or at labflow.com
- **Computer, Laptop, or Device (cell phone, tablet, etc)** Must be capable of sustaining a stable Wi-Fi connection during class/laboratory meetings to take assessments, enter data, and take photos for upload to Labflow
- **LockDown Browser** (for taking Canvas quizzes) must be installed on the device that you will utilize to take lab lecture Canvas quizzes. You will be prompted to download LockDown Browser when you initiate Canvas Quiz 1.
- **Ability to Make Legible PDF Documents of Handwritten Work:** May be done using a smartphone or tablet camera and an approved app (Genius Scan or Scannable) or scanner (to upload hand-written lab notebook pages at end of each lab activity to labflow
- **Student Notebook:** Paper Notebook (bound/spiral) or notebook based upon your lab instructor's directions. If the notebook is not pre-numbered, do so by hand.
- **Splash Goggles and Flame-Resistant Lab Coat:** Must have been purchased at bookstore to ensure safety policy compliance.
- **Face Mask:** When required by University of Pittsburgh policy, face coverings (nose and mouth) must always be worn during lab and while in Chevron Science Center. For current policy before entering Chevron see: <https://www.coronavirus.pitt.edu/>
- **Appropriate Lab Attire:** Will be addressed during first lab meeting (Activity 1)
- **Canvas:** Used to access various course materials

Grading Breakdown

Lab Lecture Work (45%)

Quizzes (lowest score dropped)	20 course points
Midterm Exam	15 course points
Final Exam	10 course points

Laboratory Work (55%)

Pre-Lab Assessments	10 course points
In-Lab Assessments	15 course points
Post-Lab Assessments	20 course points
Safety, Citizenship, and Technique	10 course points

Course Policies

Make-Up Lab Policy: You are allowed one (and only one) make-up lab a semester for mitigating circumstances. Email the lab coordinators (Dr. Ericka Huston and Dr. Jackie Powell, orgcoord@pitt.edu) AND your lab instructor as soon as you are able. Notifications sent 24 hours after a missed lab will lead to a zero for that lab. Any additional missed laboratories (without approval of the lab coordinators within 24 hours of the missed lab) will result in no credit for the course.

University Mandated Quarantine or Isolation: If Covid-19 policies require you to miss lab, you must notify course coordinators (Ericka and Jackie) within 24 hrs so accommodations can be planned.

Assignment Policy: All work is due at the designated deadline on Canvas or Labflow. Late work will only be accepted in the case of mitigating circumstances. Discuss your circumstances with your lab instructor.

Statement on Academic Integrity: Students will be expected to comply with the University of Pittsburgh's Policy on Academic Integrity. **Aside from designated group work, any work you submit is expected to be your own individual work.** Any student suspected of violating the university's policy will be required to participate in the procedural process, initiated at the instructor level. For more information, please visit: <http://www.provost.pitt.edu/info/ai1.html>.

Classroom Recording: To ensure the free and open discussion of ideas, students may not record classroom lecture, discussion, and/or activities without the advance written permission of the instructor. Any such recording can only be used for the student's own private use.

Students with Disabilities: If you have a disability for which you are or may be requesting accommodation, you are encouraged to contact the Office of Disability Resources and Services, 216 William Pitt Union, (412) 648-7890 as early as possible. You should also contact your instructor prior to the accommodations (preferably more than 24 hours). For more information, please visit: www.drs.pitt.edu.

Copyright Notice: Course materials may be protected by copyright. Unites States copyright law, 17 USC section 101, et seq., in addition to University policy and procedures, prohibit unauthorized duplication or reproduction of course materials. See Library of Congress Copyright Office and the University Copyright Policy.

<i>Chem 0345 Lab Lecture and Lab Activity Schedule</i>	
Laboratory Activity #	Laboratory Activity
1	Introduction to Organic Chemistry Laboratory, Laboratory Safety, and IR
2	¹ H NMR Workshop 1: Introductory Problem Solving
3	Extraction and Recrystallization of Benzoic Acid
4	Analysis of Medicinally Active Organic Compounds in Over-the-Counter Pain Relievers: Introduction to Thin-Layer Chromatography (TLC)
5	¹ H NMR Workshop 2: Structure and Reaction Analysis
6	Dehydration of Cyclohexanol
x	No Labs
x	Midterm Exam
7	Grignard Reactions: Synthesis of Triphenylmethanol
8	Alkene Addition Reactions: Selective Markovnikov Hydrohalogenation of Carvone
9	Electrophilic Aromatic Substitution Reactions: Bromination of Aniline and <i>N</i> -Acetylaniline
10	Aldol Addition and Aldol Condensation Reactions: Crossed Aldol Reaction of 2-Acetylpyridine and 4-Nitrobenzaldehyde
11	Forensic Chemistry: Synthesis and Photophysical Properties of Luminol
x	Final Exam

See next page for dates

Chem 0345 Meeting Times

Lab Lecture			Laboratory Activity	
Section	Time	Room	Time	Lab Classroom*
A - 1030	Monday 10 – 10:50 a.m.	206 Eberly	Monday 1 – 4:50 p.m.	227 Benedum
B - 1220	Monday 3 – 3:50 p.m.	150 Chevron	Monday 6 – 9:50 p.m.	206 Eberly
C - 1040	Monday 11 – 11:50 a.m.	206 Eberly	Tuesday 8 – 11:50 a.m.	1501 Posvar
D - 1090	Monday 2– 2:50 p.m.	206 Eberly	Tuesday 1 – 4:50 p.m.	206 Eberly
E - 1210	Monday 6 – 6:50 p.m.	135 Chevron	Tuesday 6 – 9:50 p.m.	135 Chevron
F - 1010	Monday 9 – 9:50 a.m.	206 Eberly	Wednesday 8 – 11:50 a.m.	135 Chevron
G - 1080	Tuesday 11 – 11:50 a.m.	206 Eberly	Wednesday 1 – 4:50 p.m.	206 Eberly
H - 1100	Wednesday 9 – 9:50 a.m.	206 Eberly	Thursday 8 – 11:50 p.m.	115 Victoria
I - 1200	Tuesday 6 – 6:50 p.m.	150 Chevron	Thursday 6 – 9:50 p.m.	150 Chevron
J - 1020	Wednesday 10 – 10:50 a.m.	206 Eberly	Friday 8 – 11:50 a.m.	206 Eberly
K - 1070	Thursday 11 – 11:50 a.m.	206 Eberly	Friday 1 – 4:50 p.m.	206 Eberly

*Some Laboratory Activities will be held in the listed classroom. All in-person experiments will be held in labs on the 4th floor of Chevron Science Center.

Lab Lecture Schedule Monday - Thursday

Dates	Lecture Topic	Quiz Topic
Jan 9 – Jan 12	3a*	1**
Jan 16 – Jan 19	2*	x
Jan 23 – Jan 26	2*	x
Jan 30 – Feb 2	3b	2
Feb 6 – Feb 9	4	3a + 3b
Feb 13 – Feb 16	5	4
Feb 20 – Feb 23	6	5
Feb 27 – Mar 2	Midterm Review (1-6)	x
Mar 6 – Mar 9	Spring Break	x
Mar 13 – Mar 16	7	x
Mar 20 – Mar 23	8	7
Mar 27 – Mar 30	9	8
Apr 3 – Apr 6	10	9
Apr 10 – Apr 13	11	10
Apr 17 – Apr 20	Final Exam Review (1-11)	x

Lab Activity Schedule Monday - Friday

Dates	Lab Activity
Jan 9 – Jan 13	1
Jan 16 – Jan 20	x**
Jan 23 – Jan 27	2
Jan 30 – Feb 3	3
Feb 6 – Feb 10	4
Feb 13 – Feb 17	5
Feb 20 – Feb 24	6
Feb 27 – Mar 3	Midterm Exam
Mar 6 – Mar 10	Spring Break
Mar 13 – Mar 17	7
Mar 20 – Mar 24	8
Mar 27 – Mar 31	9
Apr 3 – Apr 7	10
Apr 10 – Apr 14	11
Apr 17 – Apr 21	Final Exam

* Lab Lecture 3a (extraction) will be held during the first lab lecture.

**Quiz 1 will cover Chem 0345 policies and must be taken any time before Sunday, January 22nd at 11:59 p.m. on Canvas (no extensions). Details will be provided by lab lecturer.

***For the week of MLK Day (January 16-20), in lieu of attending lab lectures or labs, you will watch NMR Video Series 1, Videos 1- 4 that can be found on Canvas. During lab lecture the following week (January 23-26), your lab lecturer will expand upon the material from NMR Video Series 1.