

CHM 124, Section 0002: Introduction to Organic Chemistry

Fall 2025 Course Syllabus

Course Meeting Time: MWF 10:00-10:50am, Beaupre 100

Instructor: Justin S. Pantano, Ph.D. (he/him/his)

Course TA: Maggie Grady

Instructor Contact Information

Email: jpantano@uri.edu Phone: 401-874-2028

Office: Beaupre 117E (accessible through Beaupre 115)

Student Hours: general open-door policy, with appointments available through Starfish

Syllabus Description and Purpose

This syllabus covers course policies and describes what you should expect out of being a participant in this course. By staying in this course, it is assumed you understand and will abide by course policies as stated herein. During the first week of class, there will be an introductory assignment administered via Brightspace, covering course policies found in this syllabus. You must attend the first two course meetings as well as complete this introductory assignment satisfactorily or you risk being dropped from the course.

Course Description

CHM 124 is a second semester course following an introductory general chemistry class (CHM 101 or CHM 103 at URI). It covers the fundamentals of organic chemistry, basic characteristics of organic compounds and functional groups, including organic acids and bases. The course begins with the basics of what makes an organic molecule, and throughout the semester we cover several basic organic reactions and how they relate to the biological world. You are expected to come to CHM 124 with a strong background and understanding of the material covered in pre-requisite general chemistry courses.

Course Goals and Student Learning Outcomes

Upon successful completion of this course, you should be able to:

- Apply your understanding of the chemical principles associated with the basics of organic molecules by demonstrating how bonds are formed and broken in these compounds.
- Differentiate organic acids and bases and all measurements related to the strength of their acidity and basicity according to their pH and pK_a values.
- Differentiate between factors that affect chemical processes and their outcomes.
- Predict starting compounds or final products of reactions.
- Predict chemical reactions in biological processes.

Learning Materials (including textbook and technology requirements)

- Recommended textbook: Chemistry for Today, Seager and Slabaugh (any recent edition is suitable)
 - Please note that there is no requirement for purchasing an OWL subscription for this section!
 - As dense as they are, textbooks are exceptional resources with many additional problems and discussions
 of the topics we discuss in class. You should strongly consider having access to the text and review it as
 we progress through the course as an additional resource.
- The course Brightspace site
 - Announcements, grades, and class materials are posted to Brightspace. You are responsible for material
 posted to Brightspace, and you should be checking it regularly.
 - Class materials may include problem sets, *partial* lecture slides, assignments, and other study aids. Note that the partial lecture slides posted are an outline that you can use during class time to reinforce the concepts we discuss. However, they are not a substitute for regularly attending class and will not supply all information you'll need to successfully pass this course. For example, example problems we solve together are in these slides, but the solutions will not be included.

- You will need the following technology:
 - o Reliable internet access from a machine capable of supporting Brightspace. If you do not have a device of your own, there are computers available for use at the library.
 - You should also have access to Microsoft Office and Adobe products through your URI SSO portal.
 - Access to a printer, for printing out documents from Brightspace or for submission. There are various locations on campus where you can print using your RAM Account, found here.

Grading Policies

The course grade will be based upon the following deliverables:

Three (3) Semester Exams	50%
Homework Assignments	15%
Chapter Preview Assignments via Brightspace	10%
Three (3) Group Problem Sets and In-Class Group Activity	10%
Cumulative Final Exam	15%
Total	100%

The numerical average shown guarantees at least the corresponding letter grade:

Letter Grade	Numerical Average	Letter Grade	Numerical Average
Α	93	С	73
A-	90	C-	70
B+	87	D+	65
В	83	D	60
B-	80	F	0
C+	77		

Please note that you need a minimum of a C- to move forward to other courses within the Chemistry department that require this course as a pre-requisite.

If you wish to calculate your course average, use the following equation:

Course Average = (exam average * 0.65) + (HW average * 0.15) + (Brightspace assignment average * 0.10) + (Group Work average * 0.10)

Course Deliverables

Exam Format and Rules

Exams in this course will *typically* be a mixture of short answer and multiple choice, though they can also be either completely short answer or multiple choice. They are closed book and closed note. You should consider all exams cumulative, as each exam will require knowledge of content discussed in previous chapters. More specific exam material will be posted on Brightspace as exam dates approach.

You will be assigned a seat in Beaupre 100 for all exams, and an exam with your name and student ID number will be waiting at that assigned seat for you. This means that if you do not sit in your assigned seat, you will receive a zero for the exam. On exam days, please wait outside the classroom until allowed in. You should bring a black or blue ink pen and your URI ID to each exam. Your URI ID will be checked as you submit your exam to ensure the correct student is taking the exam. You may not have any electronic device with you while taking exams – including wireless headphones, smart watches, or any other devices that have internet capability. If you are found with any of these devices during an exam, you will get a non-negotiable grade of zero for the exam.

All exam dates may be found on the tentative schedule towards the end of this course syllabus. If the University is closed on a scheduled exam day, the exam will be given during the next class session.

Any errors in grading must be brought to my attention in writing within 48 hours of the graded material being made available to the class. Due to time constraints, exams will not be returned in class, so you will have to pick up your graded materials from my office once I make them available. After 48 hours, **no changes in exam grades will be made.** Any requests for regrading will subject the entire exam to be regraded. Exams must be written **only** in non-erasable ink to qualify for regrading. That means that if there is any pencil, the exam will not be reconsidered.

Alternative testing arrangements for anyone with DAI accommodations, those serving in the military, anyone participating in university-sanctioned events, or those observing religious holidays require written notification, via your URI email, and must be made at least one full week **prior** to the scheduled exams. These exams will be taken at the University's Academic Testing Center (ATC) and will require you to register for a testing time. You will receive instructions regarding alternative testing arrangements after you inform me of your need for them. Do note that arrangements take time to coordinate, so it may be more difficult to do so without the requested advance notice.

• Homework Assignments (HW)

There will be problem sets assigned as homework assignments posted as PDFs to Brightspace, with one assignment corresponding to each chapter/topic we cover. These may be graded either for answer accuracy or simply completion. These should be completed individually (though I always encourage you to work with your peers with proper attribution for work that is not your own!) and must be submitted **electronically as a PDF file**, before class time on the designated due dates, which you can find in the schedule at the end of this syllabus. Beginning with the Chapter 11 HW assignment, late submissions up to the next class meeting are allowed for a 50% reduction in credit. **This is the only opportunity for submitting assignments late in this course.** Answer keys are posted following the late submission deadline for your use in studying the material, so I generally cannot allow late submissions beyond an extra class period. The lowest homework assignment grade will be dropped. It is your responsibility to review the answer keys to determine where you may have made errors, if any.

• Chapter Preview Assignments via Brightspace

Before we begin each chapter, there will be short preview assignments within Brightspace to encourage you to look at the course material before we discuss it in more detail. All information needed for these assignments will be available in the notes posted, and you should have them with you while working on these problems. For these assignments, you are only allowed one attempt, and it will be due before we begin that chapter. The due dates for these will be on Brightspace and depend on the pace of the class. The course policy assignment will be included in these grades. The lowest preview assignment grade will be dropped.

• Group Information, Group Problem Sets, & In-Class Group Activity

Part of your learning experience in this class will involve working in small groups of ~5 students solving problems given in worksheets. You will be assigned to a group at the beginning of class (roughly two weeks into the semester) and will work together with your group throughout the course.

Please note that your group assignment will be shown as a number in the Brightspace gradebook. Time will be reserved during **two** different class periods before the first lecture exam for you to meet your group and exchange contact information. The dates will be announced on Brightspace after group assignments have been posted. If you are absent during those dates, you must make an appointment to meet with me to discuss alternative arrangements for meeting your groupmates. If desired, you can use WebEx, Zoom, or Google Hangouts to meet virtually with your group. Go to: https://its.uri.edu/student-key-services/ for login information. You will need to login using the university SSO.

Each group will be given a physical copy of the problem sets roughly two to three weeks before the due date. Your work **must** be done on this copy provided to you and all group members must contribute equally according to the included instructions for all group members to receive equal credit. There will also be one in-class activity that will be done in your groups. The date for this activity is given in the schedule at the end of this syllabus.

Incomplete Policy

Incomplete grades cannot be assigned except in the case of a real emergency. Any grade of Incomplete must be approved by the department chair and the dean. In order to receive an Incomplete, **your coursework must have been passing**, and you **must have completed at least half of the coursework for the semester**. For our course, half of the coursework means: completion of two (2) semester exams, completion of five (5) homework assignments, and completion of five (5) Brightspace chapter preview assignments. Anyone receiving a grade of Incomplete must make the necessary arrangements with me to complete the remaining work prior to the following mid-semester, in accordance with the University manual. Should there be no arrangements made by that point, or if the Incomplete is not resolved during the stipulated arrangement, the grade of Incomplete may be replaced with a standard letter grade calculated for you based on the work completed and including zeroes for any work not completed.

Due Date, Attendance, Extra Credit, and Missed Exam Policy

Due dates and deadlines are <u>strict</u> in CHM 124. Please adhere to the posted deadlines for assignments and exams. Please do not wait until the last minute possible – challenges may arise and cause issues which may lead to missed assignments. As noted previously, homework assignments can receive an extension to the next class period (the maximum allowable to ensure everyone can utilize answer keys as study materials). Group work assignments are **not** eligible for extensions – it is your responsibility to complete the work as a team ahead of time.

Though class attendance after the first week will generally not be taken, you should plan to attend each and every class meeting. The partial lecture presentations that are posted to Brightspace often do not dive into the process for solving problems, which we will do together in class. You may also miss other important information that is discussed in class. Note that **no remote option is offered for this course**. If you are absent, you should meet with your group members **first** in order to discuss what was missed during class, as well as refer to the course schedule to estimate what topics were discussed. Then, please come meet with me to clarify questions that may arise.

If you need to miss an exam (for any reason), there are two options that you can choose. You are only allowed to choose one of these options. **Option 1)** A make-up exam *may* be given. You must request a make-up exam via email *and* take it within five (5) business days of the missed exam. Do note that I may request documentation that specifically states you were unable to be in class on the date in question. This option expires when the exam in question has been graded and returned to the class. **Option 2)** The grade for the final exam may replace the grade of any 1 of the 3 lecture exams that is missed. This policy has been designed to assist anyone who misses an exam due to injury, illness, family needs, or other circumstances. You can take some time to focus on other needs without the additional stress of arranging and preparing for a proctored make-up exam at a time when the course will have moved on to other topics. This option (option 2) is the default, meaning that the final exam grade can replace this one without any email request.

Do note that making up an exam often results in you falling further behind the pace of the class and is often impractical and may cause excess stress upon returning from an absence. As such, it is highly recommended (and preferred) to utilize the policy where the score of the final exam replaces the score of a missed exam. If you take all 3 lecture exams, your lowest exam score can be replaced by the score of the final exam if the final exam grade is higher.

Note that there will be no individual extra credit in this course. If any extra credit is offered, it will be offered to the entire class, and there is no guarantee that any extra credit will be available. My expectations on extra credit assignments are much higher than standard assignments in this course, so any extra credit offered will involve significant effort.

Academic Integrity

You are expected to be honest in all academic work. Your name on any written work, exam, or quiz is regarded as assurance that the work is the result of your own effort, thought, and study. The university policy on academic integrity is strictly enforced. Any evidence of academic dishonesty, as defined by the policies outlined in the URI Student Handbook, will result in any of the following: a score of zero for the assessment in question, a failing grade in the course, and/or formal notification to the Dean of Students.

The following are some examples of academic dishonesty:

- Using material, directly or paraphrasing, from published or web sources without appropriate citation. This includes using artificial intelligence (AI) generators, such as ChatGPT or similar (see below).
- The posting of class materials on internet sources (such as Chegg.com) to be answered by other individuals for your grade.
- Claiming disproportionate credit for collaborative work.
- Unauthorized possession of or access to exams.
- Unauthorized communication during exams.
- Unauthorized use of another's work or preparing work for other students.
- Taking an exam for another student.
- Altering or attempting to alter grades.
- The use of notes or electronic devices to gain an unauthorized advantage during exams.
- Facilitation or aiding of another's academic dishonesty.

Use of Artificial Intelligence (AI) in CHM 124

In this class, it is essential that all submitted work reflects your own understanding and skills. The use of external AI tools such as ChatGPT, Claude, or similar technologies is **not permitted**. This ensures that your submitted work genuinely represents your personal knowledge and capabilities. Any use of AI tools on submitted work in this course will be considered a violation of the university's Academic Requirements in the University Manual (see 8.27.10 - 8.27.22).

How to Succeed in CHM 124

Chemistry is an inherently challenging science, and learning (whether chemistry or other topics) is not an easy process. CHM 124 moves at an intense pace, and it may be easy to fall behind. However, you have multiple opportunities in this course to challenge yourself, test how well you understand the course material, and get support as you learn. Ultimately, to be successful in this course, you must take responsibility for your own learning. Here are some resources that may aid you throughout this course:

Assistance from Prof. Pantano, during student hours or via email

View Starfish for my most up-to-date schedule. You are always welcome to schedule an appointment with me via Starfish or drop by my office to ask questions. Please make an appointment with me if you wish to discuss your graded work. All email communication (including Brightspace announcements) will be through your URI email, so be sure to regularly check it. Please be aware that I am responsible for three different courses this term, and I receive a substantial number of emails daily. To ensure any of your emails will be seen and answered, please adhere to the following:

- Put the course number (CHM 124) in the subject line.
- Be concise and descriptive in the subject line.
- Make sure that your message is clear. If I can't understand what you may be asking for, I won't answer.

Any emails received after 5pm may not be reviewed until the next business day, and generally addressed within 48 hours. A response may be in the form of a direct email or an announcement on Brightspace.

Chemistry Teaching Assistant Help Office, Beaupre 115

The Chemistry Help Office is a place where students can gather to study and work problems, either alone or in small groups, and get help on an as-needed basis by Teaching Professors and Graduate TAs that staff the office regularly throughout the week. A complete schedule of TA office hours is available via a link on Brightspace. TAs listed as teaching CHM 126, CHM 226, or CHM 292 will be most familiar with content in CHM 124.

• Recitation Sessions with Maggie

Our lecture TA, Maggie, will hold frequent recitation sessions to offer extra assistance. This information, as well as their contact information, will be posted on Brightspace.

Syllabus Disclaimer

Note that changes to the lecture schedule and this course syllabus may need to be made due to weather, the pace of the class, or other unforeseen circumstances. Should there be a campus closure requiring an altered schedule for any reason, an updated schedule will be posted to the course Brightspace site with a corresponding announcement. Additionally, note that if campus is closed on a scheduled exam date, the exam will be held on the next day that the class meets. If in-person assignments are due on a day that campus is closed, more information will be posted to Brightspace. More detailed information on exam content will be discussed closer to each exam date. The final exam date is set by the University and is subject to change at their discretion.

Required University Syllabus Statements

The University syllabus statements can be found in full on the University's webpage here, or via the QR code on the right. Some specific details related to our course have been described previously in this syllabus. The rest of the statements include student support services, University acknowledgements and resources, and other related topics.



Condensed Schedule with Exam Dates and Assignment Due Dates

Chapter/Topic	Chapter/Topic Title	Dates	
11	Organic Compounds, Part 1: The Alkanes	9/3 – 9/26	
12	Organic Compounds, Part 2: Unsaturated Hydrocarbons		
EXAM 1	Chapters 11-12	Monday, September 29, 2025	
Chirality	Chirality (an in-depth discussion)		
13	Alcohols, Phenols, Ethers, and Thiols	10/1 – 10/22	
14	Aldehydes and Ketones		
EXAM 2	Chirality and Chapters 13-14	Friday, October 24, 2025	
15	Carboxylic Acids and Esters	10/27 – 11/19	
16	Amines and Amides		
17	Carbohydrates		
EXAM 3	Chapters 15-17 Friday, November 21, 202		
19	Amino Acids and Proteins	11/24 – 12/8	
18	Lipids	- 11/24 - 12/6	
	Cumulative Final Exam: Monday, December 15, 2025, 8:00-	10:00am, Beaupre 100	

Assignment Due Dates

Course	Ch. 11 HW	Ch. 12 HW	Chirality	Ch. 13 HW	Ch. 14 HW	Ch. 15 HW	Ch. 16 HW
Policy HW	due F 9/19	due M 9/29	HW due W	due F 10/17	due M 10/27	due F 11/7	due M 11/17
due Su 9/7			10/8				
at 8:00pm							
Ch. 17 HW du	ie Ch. 19 F	IW Ch. 18	HW GW 1	due F GW	2 due M GV	V 3 due M (Group
M 11/24	due F 12/5	due Tu 12	2/9 at 10/10	11/10	12/	/8	Activity: F
		10:00 am				-	10/3

Important Fall 2025 Semester Deadlines (See the Academic Calendar for more details)

Last day of e-Campus open add period: Tuesday, September 9

Last day of e-Campus add with permission number: Tuesday, September 16

Last day for students to drop courses via e-Campus with no transcript designation (W): Wednesday, September 24

Last day for students to drop courses via e-Campus with drop designation (W): Wednesday, October 15

Mid-term progress reports posted in e-Campus for first-year students: Thursday, October 23

Tentative Extended Course Calendar

This calendar shows the expected pace of the class, and all efforts will be made to stick to it. However, note that exam dates will not be changed (barring unforeseen circumstances such as a campus closure), so only content covered in class beforehand will be tested on each exam. Intended exam material not covered before an exam will be pushed to the subsequent exam.

Week	Monday	Wednesday	Friday
1	9/1	9/3	9/5
	Labor Day	Course Intro, Ch. 11	Ch. 11
2	9/8	9/10	9/12
	Ch. 11	Ch. 11	Ch. 11
3	9/15	9/17	9/19
	Ch. 11	Ch. 12	Ch. 12
4	9/22	9/24	9/26
	Ch. 12	Ch. 12	Ch. 12
5	9/29	10/1	10/3
	EXAM 1	Chirality	Chirality ACTIVITY
6	10/6	10/8	10/10
	Chirality, Ch. 13	Ch. 13	Ch. 13
7	10/13	10/15	10/17
	Holiday - No Class	Ch. 13, Ch. 14	Ch. 14
8	10/20	10/22	10/24
	Ch. 14	Ch. 14	EXAM 2
9	10/27	10/29	10/31
	Ch. 15	Ch. 15	Ch. 15
10	11/3	11/5	11/7
	Ch. 15	Ch. 16	Ch. 16
11	11/10	11/12	11/14
	Ch. 16	Ch. 16	Ch. 17
12	11/17	11/19	11/21
	Ch. 17	Ch. 17	EXAM 3
13	11/24	11/26	11/28
	Ch. 19	Thanksgiving Break	Thanksgiving Break
14	12/1	12/3	12/5
	Ch. 19	Ch. 19, Ch. 18	Ch. 18
15	12/8	12/10	Monday 12/15
	TBD	Reading Day	Final Exam