



FLORIDA GATEWAY COLLEGE

CHM2045L 011 – General Chemistry Lab I

Fall 2025 – A16

Wednesday, 2:30p – 5:15p

Building 009, Room 109

Instructor Information

Name: Dr. John Craig, Associate Professor of Biology and Chemistry

Email: john.craig@fgc.edu or through Canvas message. I should respond to your correspondence within one business day.

Office: Building 9; Office 121

Office Hours: TBD

Office Phone: 386-754-4306

Other Available Hours: By Appointment

Virtual Hours: TBD

Meeting link: [Virtual Office Hours](#) | [Microsoft Teams](#) | [Meetup-Join](#)

Course Information

Credits: 1 (3 lab hours weekly)

Requirements Met: AATR, GE

General Education Area: Group 2 Science

Prerequisites: MAT1033 with a C or better, or score out on appropriate placement test.

Corequisite: CHM2045

Course Description

Introduction to the fundamental laboratory techniques used in studying properties of inorganic compounds.

Required Texts/Learning Resources

The General Chemistry I laboratory manual by John Hawes, is available on your Canvas course.

General Learning Outcome

- **Scientific Reasoning:** Students will apply empirical evidence to evaluate natural phenomena.

Course Learning Outcomes

At the end of the course, you will be able to:

- Construct and interpret formulas, tables, and graphs.
- Demonstrate an understanding of major General Chemistry principles and their application.
- Demonstrate proper laboratory techniques, including the use of laboratory equipment and chemicals to facilitate an understanding of principles in General Chemistry.
- Apply the scientific method to understand chemical phenomena.
- Relate knowledge from math, physics, and biology courses to the studies of chemistry.

Pre-lab Work/Responsibilities

This is to be written on prior to coming to lab. It consists of the following:

- A. Experiment title
- B. Objective statement: The objective statement should be a brief (about 2-3 sentences) description of what the lab is all about. For example: What are we doing in lab today? Why are we doing this lab? What should be accomplished or learned at the conclusion of this lab?
- C. Physical constants and safety data: The physical constants and safety data section will include any physical constants necessary to complete the lab, as well as safety considerations for any dangerous chemicals used in that lab experiment. I will let you know one week in advance what dangerous chemicals we will be using. It will be up to you to look up the chemicals and determine what dangers are associated with them.
- D. Procedure: The procedure section will be the procedure listed in the lab manual or handout, put into your own words. This is important because you won't be allowed to consult your lab manual or handout during class.

Post-lab Work/Responsibilities

This work needs to be completed after the lab and will be checked after the experiment and clean-up, before you leave the classroom. You'll be assigned a score between 0-5 points. If you leave before I check your post-lab, you will receive a 0.

The post-lab work consists of the following:

- A. Qualitative observations made during the lab experiment.
- B. Numerical data collected during the experiment. Numerical data must include units and the appropriate number of significant figures.
- C. Brief discussion of your lab results.
 - For example: Was the objective of this lab met?
Was the experiment a success? If not, why not?
What was learned performing this experiment?
What sources of error were noted?
What would you say is the quality of your data?
If you were to repeat this experiment, would you do anything differently?
- D. The lab questions at the end of each lab handout should also be answered as part of the post-lab.

Also, after you're done with an experiment, clean all used glassware, return reagents to the correct storage area, dispose of waste in the appropriate containers.

Safety

You must work in a safe manner in the laboratory. If I see you working in an unsafe manner, you may lose some of your post-lab points. Severe violations may result in expulsion from the lab. Also, if your lab area is not properly cleaned before you leave lab, you will lose some or all your post-lab points.

Make sure you follow these safety precautions. **Bold print are requirements:**

- **Eating, drinking, smoking and storing food and drink in the laboratory is not permitted.**

- You should ensure that you wear clothes that cover your entire body. This includes **closed shoes; no sandals or flip-flops are permitted**. Long pants, although not required, are preferred over shorts.
- Avoid loose sleeves and **tie back long hair**, it might obstruct you and can be dangerous when working around a flame.
- Keep isles and workbenches free and clear of all personal items. Leave all backpacks, purses or jackets in area designated area.
- Make sure you always wear appropriate personal protective equipment for the task at hand. Safety glasses can protect your eyes from flying debris. However, they will not protect your eyes from splash hazards. That's why **you need to wear chemical resistant safety goggles**.
- If your eyes get exposed to a chemical, you need to immediately wash your eyes in the eyewash station for at least fifteen minutes. Contact lenses should be avoided in the lab because the chemicals might accumulate in the space between the lens and the eye and you might not be able to take them out fast enough to avoid serious eye injuries.
- Look around and identify the safety equipment so you can react quickly in case of an emergency.
- Keep track of all the steps that you are performing and write down the chemicals you were using.
- The lab room should be kept clean and tidy and all emergency exits should be clear. Never place reagents on the floor. Chemicals need to be stored in appropriate cabinets to avoid accidents.
- Keep your workbench tidy and remove all the items that are not needed.

Critical Dates – Fall 2025

Date	Event
Monday, August 18	Fall A16 and A8 classes start
Monday – Wednesday, August 18-20	Add/Drop period for Fall A8
Monday – Friday, August 18-22	Add/Drop period for Fall A16
Monday, September 1	Labor Day – No Classes
Monday, September 15	Fall B12 classes start
Monday – Wednesday, September 15-17	Add/Drop period for Fall B12
Friday, September 26	Deadline for student-initiated withdrawals – A8
Monday, September 29	Fall B10 classes start
Mon. – Wed., Sep. 29 – Oct. 1	Add/Drop period for Fall B10
Friday, October 10	Fall A8 classes end
Monday, October 13	Fall B8 classes start
Monday – Wednesday, October 13-15	Add/Drop period for Fall B8
Tuesday, November 7	Deadline for student-initiated withdrawals – A16
Tuesday, November 11	Veteran's Day – No Classes

Date	Event
Monday, November 14	Deadline for student-initiated withdrawals – B12
Thursday, November 18	Deadline for student-initiated withdrawals – B10
Monday, November 21	Deadline for student-initiated withdrawals – B8
Wednesday – Friday, November 26-28	Thanksgiving Break – No Classes
Friday, December 5	Fall A16, B12, B10, and B8 classes end

Schedule of Class Events

Class Date	Before Class	During Class	After Class
8/20	- Read course syllabus - Look through the course on Canvas - Read lab: <u>Laboratory Safety</u>	- Go over the syllabus in detail - Go through Canvas Course - Tour lab and safety features and equipment	- Acquire personal safety equipment - Take Safety Quiz Online

Class Date	Before Class	During Class	After Class
8/27	- Read lab: <u>Investigating Density</u> - Write Pre-Lab	- Check last week's post-lab - Introduce lab and procedure - Check Pre-lab before beginning - Perform lab	Write Post-lab

Class Date	Before Class	During Class	After Class
9/3	- Read lab: <u>Properties of Group I, II, III and IV Elements</u> - Write Pre-Lab	- Check last week's post-lab - Introduce lab and procedure - Check Pre-lab before beginning - Perform lab	Write Post-lab

Class Date	Before Class	During Class	After Class
9/10	- Read lab: <u>Water of Crystallization</u> - Write Pre-Lab	Check last week's post-lab	Write Post-lab

Class Date	Before Class	During Class	After Class
		• Introduce lab and procedure • Check Pre-lab before beginning • Perform lab	

Class Date	Before Class	During Class	After Class
9/17	• No Lab	• No Lab	• No Lab

Class Date	Before Class	During Class	After Class
9/24	• Read lab: <u>Determining an Empirical Formula - Formation of a Binary Compound</u> • Write Pre-Lab	• Check last week's post-lab • Introduce lab and procedure • Check Pre-lab before beginning • Perform lab	• Write Post-lab

Class Date	Before Class	During Class	After Class
10/1	• Read lab: <u>The Ammonium Dichromate Volcano</u> • Write Pre-Lab	• Check last week's post-lab • Introduce lab and procedure • Check Pre-lab before beginning • Perform lab	• Write Post-lab

Class Date	Before Class	During Class	After Class
10/8	• Read lab: <u>The Scientific Method</u> • Write Pre-Lab	• Check last week's post-lab • Introduce lab and procedure • Check Pre-lab before beginning • Perform lab	• Write Post-lab

Class Date	Before Class	During Class	After Class
10/15	- Read lab: <u>Solubility Rules</u> - Write Pre-Lab	- Check last week's post-lab - Introduce lab and procedure - Check Pre-lab before beginning - Perform lab	Write Post-lab

Class Date	Before Class	During Class	After Class
10/22	No Lab	No Lab	No Lab

Class Date	Before Class	During Class	After Class
10/29	- Read lab: <u>Calorimetry</u> - Write Pre-Lab	- Check last week's post-lab - Introduce lab and procedure - Check Pre-lab before beginning - Perform lab	Write Post-lab

Class Date	Before Class	During Class	After Class
11/5	No Lab	No Lab	No Lab

Class Date	Before Class	During Class	After Class
11/12	- Read lab <u>Flame Tests and Emission Spectroscopy</u> - Write Pre-Lab	- Check last week's post-lab - Introduce lab and procedure - Check Pre-lab before beginning - Perform lab	Write Post-lab

Class Date	Before Class	During Class	After Class
11/19	No Lab	No Lab	

Class Date	Before Class	During Class	After Class
11/26	NO SCHOOL	NO SCHOOL	NO SCHOOL

Student Expectations

Attendance

Attendance: Attendance is required at every assigned lab. There are no makeup labs. One excused lab absence may be made up at the end of the semester during “Lab Clean-up day” on TBA or an extra assignment.

Courtesy and Student Conduct Code

Class Diversity Statement: I value the perspectives of individuals from all backgrounds, reflecting the diversity of our students. I broadly define diversity to include race, gender identity, national origin, ethnicity, religion, socio-class, age, sexual orientation, political background, and physical and learning ability. I strive to make this classroom an inclusive space for all students. I will affirm our commitment to the following and encourage you as well.

1. Respect the dignity and essential worth of all individuals
2. Promote a culture of respect for the FGC college community
3. Respect the privacy, property, and freedom of others
4. Reject bigotry, discrimination, violence, or intimidation of any kind
5. Practice personal and academic integrity and expect it of others
6. Promote the diversity of opinions, ideas, and backgrounds, which is the lifeblood of the college.
7. This is an agreement that we make so your class experience in this course is a successful one.

Late Work

There are no makeup labs.

Grading Policies (Student Performance Measures)

Learning Activities

Pre-Lab Quiz: 10 points

Pre-lab (5 points): A properly written pre-lab following guidelines.

Post-lab (5 point): A properly written pre-lab following guidelines followed by lab clean-up.

Laboratories 2-10 will have a Pre-Lab is worth 5 points, and the Post Lab is worth 5 points. Each laboratory assignment will also feature a quiz worth 10 points. This brings the total point total for each lab to 20 points per laboratory. Laboratory 1 will be a safety lab and worth 10 points. It will not require a Pre-Lab or Post Lab. Total points possible for all 10 labs is 190 points.

Grading Scale

Letter Grade	Percentage%	Point Value
A	90 – 100%	171 - 190
B +	85 – 89%	161 – 170
B	80 – 84%	152 - 160
C +	75 – 79%	142 - 151
C	70 – 74%	133 - 141
D +	65 – 69%	123 - 132
D	60 – 64%	114 - 122
F	0 – 59%	0 - 113

Returning Grades

I will grade most assignments within one week of the due date. For more expansive assignments, I will return them within two weeks. This gives me ample time to provide constructive, useful feedback to help you progress and grow as a student in this course.

Student Support and Tech Needs

This course requires students to have access to a computer and the internet. For those students who do not own a computer, computer labs are available on the FGC campus and in public libraries. Students without internet can come to the FGC campus, go to local public libraries, coffee shops, etc.

Minimal technical skills require for this course include the ability to use Microsoft Office products and navigate the Internet.

If you have any additional questions, please contact IT at 386-754-4408. You can also email the Florida Gateway College helpdesk at helpdesk@fgc.edu.

Florida Gateway College Policies and Statements

The Library

The Wilson S. Rivers Library is located in Building 200 and also includes millions of e-books and articles (<https://www.fgc.edu/academics/library/>). The library has more than 70 computers with 50 pages daily of free B&W printing for students. There are also small and large study rooms available for two hours at a time. Click the link above for more information. Librarians are available to assist with research help, and there are helpful videos on library searching and citation help here: (<https://www.fgc.edu/academics/library/research-help-and-guides/>).

Phone- 386-754-4401

Email- library@fgc.edu

[Ask-A-Librarian](#) text and chat

Fall & Spring Semester Library Hours

Monday – Thursday: 7:30 am – 7:30 pm

Friday: 9:00 am – 4:00 pm

Saturday: 1:30 pm – 5:30 pm

Sunday: CLOSED

Summer Semester Library Hours

Monday – Thursday: 7:30 am – 6:30 pm

Friday: CLOSED

Saturday & Sunday: CLOSED

Student Success Center (SSC)

The Student Success Center (SSC) is located in Building 008. The SSC offers a variety of resources for students and faculty. Access to computers and limited printing is available. Copies of reference books, textbooks, access to course specific software, and access to tutors for all levels of math and writing are available in the SSC. Tutoring in other subjects is also offered. The SSC provides space for students to study in subject specific learning groups. Stop by or call the Student Success Center to request the most current tutor schedule (386-754-4382).

Fall Semester SSC Hours

Monday--Thursday: 8:00am – 6:00 pm

Friday: 9:00am – 4:30pm

Spring Semester SSC Hours

Monday--Thursday: 8:00am – 6:00 pm

Friday: 9:00am – 4:30pm

Summer Semester SSC Hours

Monday – Thursday: 7:30 am – 5:00 pm

If you have any questions, you may contact the center by phone at 386-754-4479, 386-754-4382, or by emailing Christina Slater at christina.slater@fgc.edu.

EAB Navigate

The SSC initiates student progress reports to the entire campus through EAB Navigate. EAB Navigate is an early-alert tool designed to identify students who may be susceptible to falling behind in their course before they actually do.

Twice during the semester, we provide instructors with the opportunity to ALERT students of their course progress. This is done through the FGC Wolves email account. Students may receive an email stating their success may be at risk in a specific course. If you receive this email, DO NOT PANIC. Please contact your instructor directly, your academic advisor, and the SSC. Your instructor's information is provided in the email.

Navigate Student is a mobile app designed to support students during their academic careers at FGC. Navigate Student is the ultimate student resource that acts as a personal advisor and provides students with the information they need, when they need it. Additionally, students may make an appointment with an advisor, view campus events, be alerted on important to-do's, view class schedules, explore their major, and much more.

Please do not allow yourself to struggle. We are here to help you achieve success. The mission of the SSC is to help encourage and promote your educational journey here at FGC and beyond.

Class Recording

A student shall not make a recording in class unless the recording is limited to the class lecture, and

1. the recording is made for the student's personal educational use,
2. in connection with a complaint to the college, **or**
3. as evidence in or in preparation for a criminal or civil proceeding.

Students are not permitted to record in class, through any means over any medium, any academic or other activity that is not a class lecture. A recording of any meeting or conversation between students, or between students and faculty, is strictly prohibited unless all parties have consented to such recording. A recording of a class lecture may not be published without the prior express written consent of the recorded faculty member.

Resource Information

Florida Gateway College has partnered with **BetterMynd**, (<https://www.bettermynd.com/students>) an online therapy platform for college students, to offer our students access to free video-therapy sessions with their diverse network of licensed mental health counselors.

Florida Gateway College students can now access free online therapy sessions on the BetterMynd platform with the counselor of their choice. These 50-minute, live video-sessions are private, confidential, and can take place from the convenience of your laptop, smartphone, or tablet. Sessions are available during the day, at night, and on the weekends.

To register and get started with a counselor that's a good fit for you, sign-up here. (<https://app.bettermynd.com/register>)

If you have any questions about these services, you can email BetterMynd at students@bettermynd.com.

If you are in the need of additional resources please contact the Director of Student Life, Amy Dekle, at amy.dekle@fgc.edu, or by visiting Building 007.

Academic Appeal; Grievances; General Complaint

If a student wishes to file an academic appeal, grievance, or general complaint, please visit the college's website. Under Students and the Complaints & Appeals section (<https://www.fgc.edu/students/complaints-and-appeals/>), information regarding policy, procedure, and forms related to these topics is provided.

College Course Withdrawal and Drop Process

A course may be dropped only during the published add/drop period. After add/drop, students must withdrawal from their course. Please visit the [College Catalog](#) for more detailed information about the drop and withdrawal process.

Students are responsible for withdrawing by the published deadline. Students must allow sufficient time for the process to be completed. **The fully approved withdrawal form is due to Enrollment Services by 4:30 p.m. on the deadline posted on the [Academic Calendar](#) or it is considered late.**

To withdraw from a course, the following steps must take place:

1. The student obtains the instructor's authorization and last date of attendance in person or via email.
2. The student meets with an academic advisor, who will sign the form (Building 14). Or, if an online student, emails the advisor a statement requesting a withdrawal from the course. The email must include the instructor's email with the last date of attendance.
3. The advisor will complete a withdrawal form, attach the emails from the student and instructor in lieu of signatures and forward the form to Financial Aid.
4. A Financial Aid representative will complete and sign the form and forward the form to Enrollment Services to be processed.

Students are strongly encouraged to begin the withdrawal process the day **before** the withdrawal deadline to allow sufficient time for the process to be completed by all offices involved (Instructor, Advising Services, Financial Aid, Enrollment Services).

It is the student's responsibility to understand all financial and academic implications of the withdrawal. Students are permitted a maximum of two (2) withdrawals per course. Upon the third attempt, a student must receive a grade for the course. Absence from class or merely notifying the professor does not constitute withdrawal. A student who stops attending class without withdrawing will receive a grade from the instructor.

Incompletes

Incomplete grades are reserved for students who are unable to complete a course and the withdrawal date has passed. A student should only be issued an incomplete if at least 75% of the course assignments have been submitted and the student can reasonably complete the remaining assignments **within the first three weeks** of the next term to earn a passing overall grade. Otherwise, students should be issued the earned letter grade in the course at the end of the current term.

The **Incomplete Grade Request Form** must be completed and submitted for approval by the **FIRST day of Final Exams and BEFORE** issuing the "I" grade. The instructor will describe the circumstances leading up to the requested "I" for the course, and list the missing assignments, quizzes, exams, and any other course requirements needed to satisfactorily complete the course **within the first three weeks** of the next term. The form must be signed by the instructor, student, and the Dean/Executive Director over the program. Once all participants have signed, an approval email will be sent to the instructor for authorization to assign the "I" grade.

Student Communication Standards

You are expected to communicate in a professional and respectful tone with the instructor and fellow classmates. All written communication (in email correspondence, discussion forums, assignments, quizzes and exams, etc.) must use proper written English. Please refrain from using online and texting abbreviations and language. Oral communications, if applicable, must be made with a respectful tone and body language. Use proper [netiquette](#) throughout!

Academic Honesty

At Florida Gateway College, we value the development of critical thinking, effective communication, and academic growth. To ensure fairness and uphold the principles of academic integrity, any instances of academic dishonesty (i.e., cheating, plagiarism, bribery, misrepresentation, fabrication, unauthorized use of AI technologies, etc.) are not permitted and will be dealt with severely. Students should make themselves aware of the student code of conduct found in the Student Handbook. We believe in your ability to think critically and develop your own unique perspectives. By adhering to these guidelines and committing to the principles of academic integrity, you will not only enhance your learning experience, but also foster an environment of trust and respect within our academic community.

Use of AI Technologies

The use of AI technologies to generate or assist in the creation and completion of assignments is strictly prohibited, unless explicitly allowed by the instructor as described in the course syllabus. It is your responsibility to read this thoroughly and carefully at the beginning of the semester.

Your assignments should reflect your own thoughts, analysis, and original work. Florida Gateway College employs the use of AI detection tools to assess the authenticity of your assignments. These tools are designed to identify instances of cheating and plagiarism, including the use of AI technologies. Any submissions that violate this policy will be subject to disciplinary action. If you have any questions or concerns regarding the use of AI technologies in your courses, please review your course syllabus or reach out to your instructor for clarification.

Civil Rights and Compliance Statement

Florida Gateway College does not discriminate in education or employment related decisions on the basis of race, color, ethnicity, national origin, gender, religion, disability, age, marital status, genetic information, sexual orientation, pregnancy, or any other legally protected status in accordance with the law. The Civil Rights & Compliance Officer is Cassie Buckles, Executive Director of Human Resources, Building 001, Room 116, 149 SE College Place, Lake City, FL 32025, and may be reached at cassandra.buckles@fgc.edu or by phone at 386-754-4313.

Disability Statement

The Office of Accessibility Services (OAS) is a resource for both students with disabilities as well as faculty. Students with disabilities in need of academic accommodations must first be registered with the OAS to verify the disability, establish eligibility, and determine reasonable academic accommodations.

After registering with the OAS, students must request their academic accommodation letters be sent to them each semester to share with their instructors. Upon receipt of the letter, the instructor will be available during office hours or via email to discuss the accommodations a student will need during the course.

Students with disabilities who are not registered with the OAS or faculty who may have questions or concerns regarding an accommodation, please contact the office at the following:

In person: Building 007, Room 107
Phone: (386) 754-4393
Email: Accessibility.Services@fgc.edu

FERPA Statement

The Family Educational Rights and Privacy Act (FERPA) provides certain privacy rights to students related to educational records. This information can be found in the College Catalog, at the Office of Enrollment Services in Building 015 or on the Florida Gateway College website (www.fgc.edu/students/registration-and-records/ferpa/).

SACSCOC Statement

Florida Gateway College is accredited by the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC) to award baccalaureate and associate degrees. Florida Gateway College also may offer credentials such as certificates and diplomas at approved degree levels. Questions about the accreditation of Florida Gateway College may be directed in writing to the Southern Association of Colleges and Schools Commission on Colleges at 1866 Southern Lane, Decatur, GA 30033-4097, by calling (404) 679-4500, or by using information available on SACSCOC's website (www.sacscoc.org).

Honorlock Statement

Florida Gateway College has partnered with Honorlock, an online testing proctoring service. If off-campus remote proctoring is required during any course, Honorlock will be the online proctoring service that allows you to take your exam. You **DO NOT** need to create an account, download software or schedule an appointment in advance. Honorlock is available 24/7 and all that is needed is a computer, a working webcam, and a stable Internet connection.

To get started, you will need to download the Honorlock Chrome Extension using Google Chrome. You can download the extension on the Honorlock website (www.honorlock.com/install/extension/). When you are ready to test, log into the LMS, go to your course, and click on your exam. Clicking

Launch Proctoring will begin the Honorlock authentication process, where you will take a picture of yourself, show your ID, and complete a scan of your room. Honorlock will be recording your exam session by webcam as well as recording your screen. Honorlock also has an integrity algorithm that can detect search-engine use, so please do not attempt to search for answers, even if it's on a secondary device.

Honorlock support is available 24/7/365. If you encounter any issues, you may contact Honorlock by live chat, by phone at 844-243-2500, and/or by email at support@honorlock.com.

If you encounter a Canvas issue, please contact Canvas via the Canvas Help menu or by clicking the **Canvas Support** link within your course(s).

Turnitin Statement

Instructors may require writing assignments to be submitted to Turnitin when uploaded to Canvas. Turnitin is an internet-based service that looks for similarities and potential plagiarism by comparing your assignment submissions with its massive database of student work (including previous student submissions at Florida Gateway College), the Internet, and its entire archive, books, and journal and reference publications. Turnitin generates a [similarity report](#), which can help you and your instructor determine whether you used sources fairly and ethically, cited correctly, and paraphrased effectively.

You are encouraged to submit your written work to Turnitin prior to assignment deadlines, whether through Canvas or [Draft Coach](#). If needed, that would allow you time to review the [library's research and help guides](#) or seek writing assistance from your instructor or a tutor in the Student Success Center.

Mission Statement

The mission of Florida Gateway College is to provide superior instruction, nurture individual development, foster career readiness, and enrich the diverse communities it serves through affordable, higher quality education programs and lifelong learning opportunities.