



Division of Natural Sciences and Horticulture

Department of Chemistry

<http://learning.hccs.edu/programs/chemistry>

CHEM 1311: General Chemistry I | Lecture | #23286

Spring 2021 | 16 Weeks (01.19.2021 - 05.16.2021)

On-line learning | 96 hours per semester

Instructor Contact Information

Instructor:	Adetoun Oyinlola, Ph.D.	Office Phone:	713-718-6757
Office:	Online	Office Hours:	Email for appointment
HCC Email:	adetoun.oyinlola@hccs.edu	Office Location:	Online

Please feel free to contact me concerning any problems that you are experiencing in this course. Your performance in my class is very important to me. I am available to hear your concerns and just to discuss course topics.

Instructor's Preferred Method of Communication

I will respond to emails within 24 hours Monday through Friday; I will reply to weekend messages on Monday mornings. Your HCC email address is required as the preferred method of contact, should you contact me, please your student HCC email address.

What's Exciting About This Course

You will learn so much about how we can use chemical principles to understand the changes that occurs everyday. The molecular perspective of chemistry, the changes that occur when you mix two different mixtures, how atomic structure is discovered, and many more will be explore in this course.

My Personal Welcome

Welcome to Introduction to Chemistry—I am delighted that you have chosen this course. One of my passions is to inspire students' creativity, develop their critical thinking ability and prepare them for the complex world they will face after stepping off campus. I can hardly wait to pass that on. I will present the information in the most exciting way I know, so that you can grasp the concepts and apply them now and hopefully throughout your life. As you read and wrestle with new ideas and facts that may challenge you, I am available to support you. The fastest way to reach me is by my HCC email. The best way to really discuss issues is in person and I'm available during posted office hours to tackle any questions you might have. My

goal is for you to walk out of the course with a better understanding of yourself and of human behavior. So please visit me or contact me whenever you have a question.

Prerequisites and/or Co-Requisites

This course requires college-level reading and writing skills. Research indicates that you are most likely to succeed if you have already taken and passed Reading 0342, Math 0312 and Writing 0310 / 0349 or Math 0312 with INRW 0420. For this course, additional prerequisites are completion of one year of high school chemistry or CHEM 1305 (Introduction to Chemistry) and MATH 1314 (College Algebra). Other minimum requirements for enrollment in CHEM 1311 include placement in college-level reading (or take INRW 0420). It is also highly recommended to take the corresponding lab, CHEM 1111 with CHEM 1311. If you have enrolled in this course having satisfied these prerequisites, you have a higher chance of success than students who have not done so. Please carefully read and consider the repeater policy in the Student Handbook.

Please carefully read and consider the repeater policy in the [HCCS Student Handbook](#).

Eagle Online Canvas Learning Management System

This course will use ([Eagle Online Canvas \(https://eagleonline.hccs.edu\)](https://eagleonline.hccs.edu)) will use [Eagle Online Canvas \(https://eagleonline.hccs.edu\)](https://eagleonline.hccs.edu) to supplement in-class assignments, exams, and activities. HCCS Open Lab locations may be used to access the Internet and Eagle Online Canvas. It is recommended that you **USE FIREFOX OR CHROME AS YOUR BROWSER**.

HCC Online Information and Policies

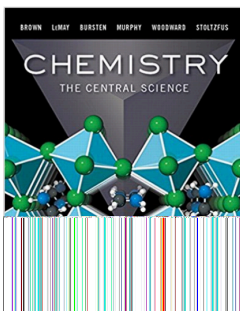
Here is the link to information about HCC Online classes including the required Online Orientation for all fully online classes: <http://www.hccs.edu/online/>

Scoring Rubrics, Sample Assignments, etc.

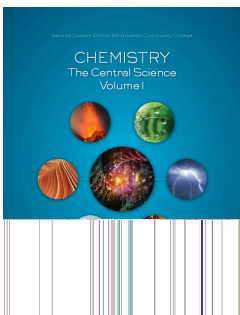
Look in Eagle Online Canvas for the scoring rubrics for assignments, samples of class assignments, and other information to assist you in the course. <https://eagleonline.hccs.edu/login/ldap>

Instructional Materials

Textbook and Course Materials Information



OR



The materials listed below are **required** for this course.

1. Brown, LeMay Jr, Bersten, Murphy, Woodward, Stoltzfus. (2015). *Chemistry : The Central Science*, 14th ed., Pearson, MN.

Either hardcover that contains BOTH volumes I and II (for General Chemistry I and II) ISBN: 978-0-13-441423-2

OR

Softcover Volume I for CHEM 1311 only
ISBN: 978-1-323-85000-8

The texts are included in a package that contains the text as well as an access code and are found at the [HCC Bookstore](#). You may either use a hard copy of the book, or rent the e-book from Pearson.

2. A Nonprogrammable scientific calculator (no graphing calculators permitted in testing)

Other Instructional Resources

Tutoring

HCC provides free, confidential, and convenient academic support to HCC students in an on-line environment and on campus. Tutoring is provided by HCC personnel in order to ensure that it is contextual and appropriate. Visit the [HCC Tutoring Services](#) website for details.

Libraries

The HCC Library System consists of 9 libraries and 6 Electronic Resource Centers (ERCs) that are inviting places to study and collaborate on projects. Librarians are available both at the libraries and online to show you how to locate and use the resources you need. The libraries maintain a large selection of electronic resources as well as collections of books, magazines, newspapers, and audiovisual materials. The portal to all libraries' resources and services is the HCCS library web page at <http://library.hccs.edu>.

Supplementary Instruction

Supplemental Instruction is an academic enrichment and support program that uses peer-assisted study sessions to improve student retention and success in historically difficult courses. Peer Support is provided by students who have already succeeded in completion of the specified course, and who earned a grade of A or B. Find details at <http://www.hccs.edu/resources-for/current-students/supplemental-instruction/>.

Course Overview

This course is intended for students majoring in one of the physical sciences or life sciences, engineering, or for students who are pursuing pre-professional programs in medicine, dentistry, pharmacy, veterinary medicine, or other health programs. The course is also beneficial to students who are preparing themselves for higher level science courses in their respective curricula. Core curriculum course.

Science and engineering majors study atomic structure, chemical reactions, thermodynamics, electronic configuration, chemical bonding, molecular structure, gases, states of matter, and properties of solutions. The laboratory includes appropriate experiments.

Core Curriculum Learning Objectives (CCLOs)

The HCCS Chemistry Discipline Committee has specified that the course address the following core objectives:

- Reading/ Writing
- Speaking/Listening
- Critical Thinking
- Computer/Information Literacy

Program Student Learning Outcomes (PSLOs) for all CHEM Courses

Can be found at <http://learning.hccs.edu/programs/chemistry>

Course Student Learning Outcomes (CSLOs) for CHEM 1311

- SLO 1. Give names and formulas of elements, ions, and ionic and molecular compounds.
SLO 2. Categorize, complete, and balance chemical reactions.
SLO 3. Do chemistry calculations involving reaction stoichiometry and energy changes.

SLO 4. Relate the properties of electromagnetic radiation (frequency, wavelength, and energy) to each other and to the energy changes atoms undergo which accompany electronic transitions.

SLO 5. Identify the parts of the periodic table and the trends in periodic properties of atoms.

SLO 6. Relate the properties of gases with the gas laws and extend the application of these relationships to reaction stoichiometry, gas mixtures, and effusion/diffusion of gases.

SLO 7. Depict chemical bonding with dot structures and valence bond theory and determine the molecular shapes (geometry) of molecules based on VSEPR and valence bond theory.

LO 8: Calculate density and relate the value to mass and volume measurements for all physical states.

SLO 9: Covert measurements in Metric, SI, and American systems

SLO 10: Apply thermochemical principles to evaluate work, heat, and energy relationships based on specific heat, calorimetry, and temperature changes.

Learning Objectives for each CSLO can be found at [Learning Objectives for CHEM 1311](#).

Student Success

Expect to spend at least twice as many hours per week outside of class as you do in class studying the course content. Additional time will be required for written assignments. The assignments provided will help you use your study hours wisely. Successful completion of this course requires a combination of the following:

- Reading the textbook
- Attending class in person and/or online
- Completing assignments
- Participating in class activities

There is no short cut for success in this course; it requires reading (and probably re-reading) and studying the material using the course objectives as your guide.

Instructor and Student Responsibilities

As your Instructor, it is my responsibility to:

- Provide the grading scale and detailed grading formula explaining how student grades are to be derived
- Facilitate an effective learning environment through class activities, discussions, and lectures
- Provide a description of any special projects or assignments
- Inform students of policies such as attendance, withdrawal, tardiness and make up
- Provide the course outline and class calendar which will include a description of any special projects or assignments
- Arrange to meet with individual students before and after class as required

To be successful in this class, it is the student's responsibility to:

- Attend "online" class and participate in class discussions and activities
- Read and comprehend the textbook and instructor notes
- Complete the required assignments and exams
- Practice problems
- Ask for help in a timely manner when there is a question or problem
- Keep copies of all paperwork, including this syllabus, handouts, and all assignments
- Keep up with your grades which will be posted in the Canvas Gradebook
- Attain a raw score of at least 70% on all assignments

- Take the final exam during the designated testing period
- Be aware of and comply with academic honesty policies in the [HCCS Student Handbook](#)

Assignments, Exams, and Activities

Written Assignment

All assignment are due at the time instructed by the professor.

Exams

The overall course average is determined as follows:

Four regular exams* (3 of 4) 60%

Homework/Class quiz 15%

Depart. Final Exam*** 25%

*There are 4 regular exams scheduled. The lowest regular exam will be dropped.

** The exams are mandatory

*** Final Exam is mandatory and **cannot** be dropped.

The four regular exams consist of 2 sections, Part A-multiple choice of 30 questions, each one is 2 points totaling 60 points and Part B- show your work section of 5 questions, each question is 8 points totaling 40 points. HCC does not provide students with Scranton forms. They are sold in campus bookstores.

On-Line Activities

Students should expect pop-up quizzes. Participation in class is highly recommended.

Final Exam

All students will be required to take a comprehensive departmental final exam consisting of 35 multiple- choice and 6 short answer questions. All exams will be done online and you are to have a webcam on your device to be able to take the exam. All the information students need to prepare for the exam is in the [Final Exam Handbook](#).

Students who are absent from the final exam without discussing their absence with the instructor in advance or within 24 hours afterward will receive a course grade of Incomplete. Any student who does not take a makeup exam by the end of the following long semester will receive a final exam grade of zero and a course grade of F.

Grading Formula

The chemistry department strongly recommends that you adopt a points-based grading system with a maximum 1,000 total points possible.

Grade	Total Points
A	900+
B	800-899
C	700-799
D	600-699
F	<600

HCC Grading Scale can be found on this site under Academic Information:
<http://www.hccs.edu/resources-for/current-students/student-handbook/>

Course Calendar

Week	Dates	Topic/What's due
1		COURSE INTRODUCTION
2		Syllabus Chapter 1: Matter & Measurement
3		Chapter 2: Atoms, Molecules & Ions
4		Chapter 3: Chemical reactions & Stoichiometry
5	2/12/21	Exam 1 (Chap 1, 2, & 3)
6		Chapter 4: Reactions in Aqueous Solution
7		Chapter 5: Thermochemistry
8		Chapter 6: Electronic Structure of Atoms
9	3/5/21	Exam 2 (Chap 4, 5, & 6)
10		Chapter 7: Periodic properties of the Elements

11		Chapter 8: Basic Concepts of Chemical Bonding
12		Chapter 9: Molecular Geometry and Bonding Theories
13	4/2/21	Exam 3 (Chap 7, 8, & 9)
14		Chapter 10: Gases
15		Chapter 11: Liquids and Intermolecular Forces
	4/23/21	Exam 4 (Chap 10 & 11)
5	5/10/21	Final Exam (Chapter 1 through 11)

Syllabus Modifications

The instructor reserves the right to modify the syllabus at any time during the semester and will promptly notify students in writing, typically by e-mail, of any such changes.

Instructor's Practices and Procedures

Missed Assignments

Missed assignments can be re-evaluated with genuine and documented reason(s). Missed exam other than the departmental final will be dropped or regarded as your lowest grade and can be re-evaluated on need basis.

Academic Integrity

Academic dishonesty, which includes but is not limited to, plagiarism, copying, sharing exam information or communicating during an exam, or using unauthorized electronic devices during exams, will not be tolerated. Penalties can include a grade of "0" or "F" on the particular assignment or disciplinary action as determined by rules of the college and are subject to the discretion and judgment of the instructor. You are expected to be familiar with the University's Policy on Academic Honesty, found in the catalog. What that means is: If you are charged with an offense, pleading ignorance of the rules will not help you. Students are responsible for conducting themselves with honor and integrity in fulfilling course requirements. Penalties and/or disciplinary proceedings may be initiated by College System officials against a student accused of scholastic dishonesty. "Scholastic dishonesty": includes, but is not limited to, cheating on a test, plagiarism, and collusion. There is a **Zero tolerance** for any type of academic dishonesty. Scholastic Dishonesty will result in a referral to the Dean of Student Services. See the link below for details.

Here's the link to the HCC information about academic integrity (Scholastic Dishonesty and Violation of Academic Scholastic Dishonesty and Grievance):
<http://www.hccs.edu/about-hcc/procedures/student-rights-policies--procedures/student-procedures/>

Attendance Procedures

This is an on-class learning so students are encouraged to participate fully.

Student Conduct

Students are expected to be in their best behavior, any one who does not follow the instructor direction will be subject to face the consequences.

Instructor's Course-Specific Information (As Needed)

Grades and feedback after any coursework is being submitted will be provided to students as soon as it is been completed by the instructor..

Electronic Devices

Electronic devices are not to be used during classes and should be completely put off. Chemistry Program Information

Chemistry Program Information

Please visit the chemistry program page for more about our degree offering, requirements, employment prospects and more. <http://learning.hccs.edu/programs/chemistry>

Add program-specific information such as the following:

- Chemistry Majors
- Careers in chemistry
- HCC chemistry student organizations
- Chemistry Scholarships

Provide details for each or include links to the information

HCC Policies

Here's the link to the HCC Student Handbook <http://www.hccs.edu/resources-for/current-students/student-handbook/> In it you will find information about the following:

Academic Information	Incomplete Grades
Academic Support	International Student Services
Attendance, Repeating Courses, and Withdrawal	Health Awareness
Career Planning and Job Search	Libraries/Bookstore
Childcare	Police Services & Campus Safety

disAbility Support Services	Student Life at HCC
Electronic Devices	Student Rights and Responsibilities
Equal Educational Opportunity	Student Services
Financial Aid TV (FATV)	Testing
General Student Complaints	Transfer Planning
Grade of FX	Veteran Services

EGLS³

The EGLS³ ([Evaluation for Greater Learning Student Survey System](#)) will be available for most courses near the end of the term until finals start. This brief survey will give invaluable information to your faculty about their teaching. Results are anonymous and will be available to faculty and division chairs after the end of the term. EGLS³ surveys are only available for the Fall and Spring semesters. -EGLS3 surveys are not offered during the Summer semester due to logistical constraints.

<http://www.hccs.edu/resources-for/current-students/egls3-evaluate-your-professors/>

Campus Carry Link

Here's the link to the HCC information about Campus Carry: <http://www.hccs.edu/departments/police/campus-carry/>

HCC Email Policy

When communicating via email, HCC requires students to communicate only through the HCC email system to protect your privacy. If you have not activated your HCC student email account, you can go [to HCC Eagle ID](#) and activate it now. You may also use Canvas Inbox to communicate.

Housing and Food Assistance for Students

Any student who faces challenges securing their foods or housing and believes this may affect their performance in the course is urged to contact the Dean of Students at their college for support. Furthermore, please notify the professor if you are comfortable in doing so.

This will enable HCC to provide any resources that HCC may possess.

Office of Institutional Equity

Use the link below to access the HCC Office of Institutional Equity, Inclusion, and Engagement (<http://www.hccs.edu/departments/institutional-equity/>)

disAbility Services

HCC strives to make all learning experiences as accessible as possible. If you anticipate or experience academic barriers based on your disability (including mental health, chronic or temporary medical conditions), please meet with a campus Abilities Counselor as soon as possible in order to establish reasonable accommodations. Reasonable accommodations are established through an interactive process between you, your instructor(s) and Ability Services. It is the policy and practice of HCC to create inclusive and accessible learning environments consistent with federal and state law. For more information, please go to <http://www.hccs.edu/support-services/disability-services/>

Title IX

Houston Community College is committed to cultivating an environment free from inappropriate conduct of a sexual or gender-based nature including sex discrimination, sexual assault, sexual harassment, and sexual violence. Sex discrimination includes all forms of sexual and gender-based misconduct and violates an individual's fundamental rights and personal dignity. Title IX prohibits discrimination on the basis of sex-including pregnancy and parental status in educational programs and activities. If you require an accommodation due to pregnancy please contact an Abilities Services Counselor. The Director of EEO/Compliance is designated as the Title IX Coordinator and Section 504 Coordinator. All inquiries concerning HCC policies, compliance with applicable laws, statutes, and regulations (such as Title VI, Title IX, and Section 504), and complaints may be directed to:

David Cross
Director EEO/Compliance
Office of Institutional Equity & Diversity
3100 Main
(713) 718-8271
Houston, TX 77266-7517 or Institutional.Equity@hccs.edu
<http://www.hccs.edu/departments/institutional-equity/title-ix-know-your-rights/>

Office of the Dean of Students

Contact the office of the Dean of Students to seek assistance in determining the correct complaint procedure to follow or to identify the appropriate academic dean or supervisor for informal resolution of complaints.

<https://www.hccs.edu/about-hcc/procedures/student-rights-policies--procedures/student-complaints/speak-with-the-dean-of-students/>

Department Chair Contact Information

Chemistry Department Chair

If you have questions or concerns about the course, please see your instructor. Should you wish to contact the department chair, below is his information:

Dr. Emmanuel Ewane, emmanuel.ewane@hccs.edu; 713-718-5414

