HCC

Instructional Services · Mathematics · Mathematics

Calculus III-19415

MATH-2415

RT 2022   Section 484   4 Credits   01/18/2022 to 05/15/2022   Modified 01/20/2022

🕐 Course Meetings

Course Modality

In Person / Face to Face

Meeting Days

Meeting Times : Tu & Th 8:00 p.m. -- 9:50 p.m.

Meeting Location

Katy Campus :   Room : 226

👤 Welcome and Instructor Information

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

Professor: Mr. Sukhlal Ramharack

Email: sukhlal.ramharack@hccs.edu
Phone: 713-718-5525

What's Exciting About This Course

This course is exciting because, this course is applies the knowledge you have learned in Calculus I and Calculus II in two dimensions and extend it to multiple dimensions. It is essential to many fields of Science and Engineering. It will provide us a deeper appreciation for the concept of derivative and integrals. We will wrangle with concepts as Areas, Volumes and Vector Analysis

My Personal Welcome

Let me take a moment to welcome you to Calculus III. I am absolutely thrilled that you have chosen to expand your mathematical horizon. Mathematics is a difficult but exciting field. During the course you will be asked to break the norms and take a brief foray into why things are. Can we at this point in our mathematical pursuit come to terms with certain formulas, in the sense that can we attempt a proof using calculus of what we once took for granted. Formulas involving areas and volumes. Mathematics is a wonderful field and I am very happy to be part of your inquiry into this most exquisite of disciplines. I look forward to meeting all of you and I trust that we will have a great semester together.

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

the questions. My goal is for you to walk out of the course with a better understanding and appreciation of mathematics. So please visit me or contact me by email whenever you have a question.

Preferred Method of Contact

My preferred method of contact is by e-mail. When leaving me a message please include in your e-mail, your class, days, time and section of concern.   I will respond to emails within 24 hours Monday through Friday; I will reply to weekend messages on Monday mornings.

Office Hours

See times listed below
Katy Campus Room 215A

MW : 11:30 am -- 12:30 pm   ;   MW : 3:30 pm -- 4:00 pm

TuTh : 11:00 am -- 11:30 am ; TuTh : 2:30 pm -- 3:00 pm

🖥 Course Overview

Course Description

MATH 2415 - Calculus III Credits: 4 (4 lecture). This course is intended for students who are pursuing degrees in mathematical sciences and engineering and who are required by the nature of their respective curricula to enroll in the 3-semester calculus series. It provides a detailed study of vector-valued functions with space geometry. Functions of several variables and Lagrange multipliers. Multiple integration with applications, as well as integration in polar, spherical, and cylindrical coordinates. Change of variables and Jacobians. It also covers vector analysis that includes Green's theorem, Divergence theorem, and Stokes' theorem. Core Curriculum Course.

Prerequisites

Math 2414: Pass with a "C" or better.

Department Website

https://www.hccs.edu/programs/areas-of-study/science-technology-engineering--math/mathematics/

◎ Core Curriculum Objectives (CCOs)

Given the rapid evolution of necessary knowledge and skills and the need to take into account global, national, state, and local cultures, the core curriculum must ensure that students will develop the essential knowledge and skills they need to be successful in college, in a career, in their communities, and in life. Through the Texas Core Curriculum, students will gain a foundation of knowledge of human cultures and the physical and natural world, develop principles of personal and social responsibility for living in a diverse world, and advance intellectual and practical skills that are essential for all learning.

- *Critical Thinking*: to include creative thinking, innovation, inquiry, and analysis, evaluation and synthesis of information.
- *Communication Skills*: to include effective development, interpretation and expression of ideas through written, oral and visual communication.
- *Quantitative and Empirical Literacy*: to include the manipulation and analysis of numerical data or observable facts resulting in informed conclusions.

📊 Student Learning Outcomes and Objectives

Program Student Learning Outcomes (PSLOs)

Students in the Mathematics Program will:

1. Engage in problem solving strategies, such as organizing information, drawing diagrams and modeling.

2. Use symbolic representations to solve problems. This includes manipulating formulas, solving equations, and graphing lines.
3. Build the foundational mathematical skills that will enable a student to successfully complete a college level mathematics course.

Course Student Learning Outcomes (CSLOs)

Upon completion of MATH 2415, the student will be able to:

1. Perform calculus operations on vector-valued functions, including derivatives, integrals, curvature, displacement, velocity, acceleration, and torsion.
2. Perform calculus operations on functions of several variables, including partial derivatives, directional derivatives, and multiple integrals.
3. Find extrema and tangent planes.
4. Solve problems using the Fundamental Theorem of Line Integrals, Green's Theorem, the Divergence Theorem, and Stokes' Theorem.
5. Apply the computational and conceptual principles of calculus to the solutions of real-world problems.

Learning Objectives

Upon completion of MATH 2415, the student will be able to:

1. Understand and perform vector operations, and analyze vectors in space.
2. Understand the geometry of space, including lines, planes, surfaces, and cylindrical and Spherical Coordinates
3. Perform differentiation and integration of Vector-Valued Functions.
4. Describe velocity and acceleration associated with a Vector-Valued Function.
5. Use a Vector-Valued Function to analyze projectile motion.
6. Understand tangent vectors and normal and find the tangential and normal components of acceleration.
7. Find the arc length of a space curve, and the curvature of a curve at a point.
8. Understand functions of several variables, including sketching graphs, level curves and surfaces.
9. Find and use partial derivatives, directional derivatives and gradient, absolute and relative extrema of a function of two or more variables, including implicitly and use the chain rule.
10. Solve optimization problems and use the method of least squares, and Lagrange Multipliers
11. Evaluate and use an iterated integral to find the area of a plane
12. Evaluate and use double integrals as an iterated integral, and in polar coordinates, to find mass and center of mass of a planar lamina, moments of inertia, and area of a surface.
13. Evaluate and use triple integrals to find volume, center of mass, and moments of inertia of a solid region, and in cylindrical and spherical coordinates.
14. Understand and use a Jacobian to change variables in a double integral
15. Understand the curl and divergence of Vector Fields, and
16. Evaluate line integrals and understand Conservative Vector fields and
17. Understand and use Green's, Divergence, and Stokes's Theorems
18. Find parametric equations for surfaces.
19. Evaluate and use surface integrals

 This course provides a detailed study of vector-valued functions with space geometry. Functions of several variables and Lagrange multipliers. Multiple integration with applications, as well as integration in polar, spherical, and cylindrical coordinates. Change of variables and Jacobians. And finally, vector analysis that includes Green's theorem, Divergence theorem, and Stokes' theorem.

☰ Departmental Practices and Procedures

The Mathematics Department has specific expectations for calculators, proctored exams and grading policies. Refer to the Course Requirements and Devices sections below.

📙 Instructional Materials and Resources

Instructional Materials

The [HCC Online Bookstore (https://hccs.bncollege.com/shop/hccs-central/page/find-textbooks)](https://hccs.bncollege.com/shop/hccs-central/page/find-textbooks) provides searchable information on

textbooks for all courses. Check with your instructor before purchasing textbooks because the book might be included in your course fees.

Add Instructional Materials Here

Calculus

Author: Ron Larson & Bruce H. Edwards
Publisher: Cengage
Edition: 11th
ISBN: 978-1285858265
Availability: Campus Bookstore and Online vial : http://webassign.net

✔ Course Requirements

Assignments, Exams, and Activities

Type	Weight	Topic	Notes
Homework	10		**Homework will be accessed through CANVAS**
Exams	60		**There will be 4 exams administered each equally weighted at 15%.** **All exams and the final will be administered in class.** **The exams will be chapter based, that is** **Exam 1 Ch 11,** **Exam 2 Ch 12,** **Exam 3 Ch 13 &** **Exam 4 Exam Ch 14.**
Quizzes	6		**Quizzes will be administered during class time.**
Final Exam	24		**The final exam is COMPREHENSIVE**

Grading Formula

Grade	Range	Notes
A	90 to 100	
B	80 to 89	
C	70 to 79	
D	60 to 69	
F	0 to 59	

✱ Instructor's Practices and Procedures

Incomplete Policy

In order to receive a grade of Incomplete ("I"), a student must have completed at least 85% of the work in the course. In all cases, the instructor reserves the right to decline a student's request to receive a grade of Incomplete.

Missed Assignments/Make-Up Policy

Absence on a test is Severely Discouraged. If you miss an exam or quiz a grade of Zero (0) will be assigned for that assessment. If you miss an exam or quiz due to an emergency, then you will need to provide the required documentation to support your claim. The instructor, however, reserves the right to decline a student's request.

4 major exams and a Comprehensive final will be given. No exam will be Dropped

Academic Integrity

Here's the link to the HCC information about academic integrity (Scholastic Dishonesty and Violation of Academic Scholastic Dishonesty and Grievance):

[https://www.hccs.edu/studentprocedures (https://www.hccs.edu/studentprocedures)](https://www.hccs.edu/studentprocedures)

Attendance Procedures

Class Attendance - It is important that you come to class! Attending class regularly is the best way to succeed in this class. Research has shown that the single most important factor in student success is attendance. Simply put, going to class greatly increases your ability to succeed. You are expected to be on time at the beginning of each class period. For complete information regarding Houston Community College's policies on attendance, please refer to the Student Handbook. You are responsible for materials covered during your absences. Class attendance is checked daily. Although it is your responsibility to drop a course for nonattendance, the instructor has the authority to drop you for excessive absences.

If you are not attending class, you are not learning the information. As the information that is discussed in class is important for your career, students may be dropped from a course after accumulating absences in excess of six (6) hours of instruction. The six hours of class time would include any total classes missed or for excessive tardiness or leaving class early.

You may decide NOT to come to class for whatever reason. As an adult making the decision not to attend, you do not have to notify the instructor prior to missing a class. However, if this happens too many times, you may suddenly find that you have "lost" the class.

Poor attendance records tend to correlate with poor grades. If you miss any class, including the first week, <u>you are responsible for all material missed.</u> It is a good idea to find a friend or a buddy in class who would be willing to share class notes or discussion or be able to hand in your work if you unavoidably miss a class

<u>**The last day to withdraw : APRIL 4TH 2022**</u>

Student Conduct

Students are expected to comport themselves in a manner so as to not be detrimental to the academic atmosphere. While this class is of an online nature some students may set up platforms where they may meet as a group, such as, "groupme". It is expected that you treat each other with civility and respect. Any student found in breach will be reported to the relevant authorities within the department.

Instructor's Course-Specific Information

Students are expected to comport themselves in a manner so as to not be detrimental to the academic atmosphere. While this class is of an online nature some students may set up platforms where they may meet as a group, such as, "groupme". It is expected that you treat each other with civility and respect. Any student found in breach will be reported to the relevant authorities within the department.

Devices

It is expected that while attending the class in an online format that all electronic devices be turned off or silenced so as to not disturb the learning environment.

Faculty Statement about Student Success

In order for one to succeed in this and any class two things will be expected of you (i) that you are prepared and (ii) that you are consistent in doing your homework. (i) Preparation requires that you have the relevant pre-requisite for the course. It also means that you attend class regularly you read and re-read as necessary the previous class material so that you are ready for the new material. I am always available to my students so if you have any questions please feel free to speak with me or e-mail me as necessary. (ii) Homework. In order to be successful in this course requires a level of commitment from you to do your home consistently. As the old adage goes "Math is not a spectator sport." In order to be successful in math requires that you DO math. This may mean that you may need to work on your homework daily, if there is a concept that you do not understand, you go to (i) tutoring , (ii) you seek assistance from your fellow classmates, (iii) you go online to valid websites to get help with understanding or reinforcing certain concepts and (iv) seek your professor's assistance.

Faculty-Specific Information Regarding Canvas

This course section will use Canvas ([https://eagleonline.hccs.edu (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 Canvas. For best performance, Canvas should be used on the current or first previous major release of Chrome, Firefox, Edge, or Safari. Because it's built using web standards, Canvas runs on Windows, Mac, Linux, iOS, Android, or any other device with a modern web browser.

Canvas only requires an operating system that can run the latest compatible web browsers. Your computer operating system should be kept up to date with the latest recommended security updates and upgrades.

Social Justice Statement

Houston Community College is committed to furthering the cause of social justice in our community and beyond. HCC does not discriminate on the basis of race, color, religion, sex, gender identity and expression, national origin, age, disability, sexual orientation, or veteran status. I fully support that commitment and, as such, will work to maintain a positive learning environment based upon open communication, mutual respect, and non-discrimination. In this course, we share in the creation and maintenance of a positive and safe learning environment. Part of this process includes acknowledging and embracing the differences among us in order to establish and reinforce that each one of us matters. I appreciate your suggestions about how to best maintain this environment of respect. If you experience any type of discrimination, please contact me and/or the Office of Institutional Equity at 713-718-8271.

🏛 HCC Policies and Information

HCC Grading System

HCC uses the following standard grading system:

Grade	Grade Interpretation	Grade Points
A	Excellent (90-100)	4
B	Good (80-89)	3
C	Fair (70-79)	2
D	Passing (60-69), except in developmental courses.	1
F	Failing (59 and below)	0
FX	Failing due to non-attendance	0

Grade	Grade Interpretation	Grade Points
W	Withdrawn	0
I	Incomplete	0
AUD	Audit	0
IP	In Progress. Given only in certain developmental courses. A student must re-enroll to receive credit.	0
COM	Completed. Given in non-credit and continuing education courses.	0

Link to Policies in Catalog and Student Handbook

Here's the link to the HCC Catalog and Student Handbook: https://catalog.hccs.edu/ (https://catalog.hccs.edu/)

In it you will find information about the following:

- Academic Information
- Academic Support
- Attendance, Repeating Courses, and Withdrawal
- Career Planning and Job Search
- Childcare
- disAbility Support Services
- Electronic Devices
- Equal Educational Opportunity
- Financial Aid TV (FATV)
- General Student Complaints
- Grade of FX
- Incomplete Grades
- International Student Services
- Health Awareness
- Libraries/Bookstore
- Police Services & Campus Safety
- Student Life at HCC
- Student Rights and Responsibilities
- Student Services
- Testing
- Transfer Planning
- Veteran Services

Link to HCC Academic Integrity Statement

https://www.hccs.edu/student-conduct (https://www.hccs.edu/student-conduct) (scroll down to subsections)

Campus Carry Link

Here's the link to the HCC information about Campus Carry:

https://www.hccs.edu/campuscarry (https://www.hccs.edu/campuscarry)

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 (https://www.hccs.edu/email) and activate it now. You may also use Canvas Inbox to communicate.

Office of Institutional Equity

Use the following link to access the HCC Office of Institutional Equity, Inclusion, and Engagement: https://www.hccs.edu/eeo (https://www.hccs.edu/eeo)

Ability Services

HCC strives to make all learning experiences as accessible as possible. If you anticipate or experience academic barriers based on your disability (including long and short term conditions, 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 https://www.hccs.edu/accessibility (https://www.hccs.edu/accessibility)

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 (mailto:Institutional.Equity@hccs.edu)

https://www.hccs.edu/titleix (https://www.hccs.edu/titleix)

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

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 a guide.

Canvas Learning Management System

Canvas is HCC's Learning Management System (LMS), and can be accessed at the following URL:

https://eagleonline.hccs.edu (https://eagleonline.hccs.edu)

HCCS Open Lab locations may be used to access the Internet and Canvas. For best performance, Canvas should be used on the current or first previous major release of Chrome, Firefox, Edge, or Safari. Because it's built using web standards, Canvas runs on Windows, Mac, Linux, iOS, Android, or any other device with a modern web browser.

Canvas only requires an operating system that can run the latest compatible web browsers. Your computer operating system should be kept up to date with the latest recommended security updates and upgrades.

HCC Online Information and Policies

Here is the link to information about HCC Online classes, which includes access to the required Online Information Class Preview for all fully online classes: https://www.hccs.edu/online/ (https://www.hccs.edu/online/)

Scoring Rubrics, Sample Assignments, etc.

Look in Canvas for the scoring rubrics for assignments, samples of class assignments, and other information to assist you in the course. https://eagleonline.hccs.edu/ (https://eagleonline.hccs.edu/)

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 learner-centered instructional techniques
- Provide a description of any special projects or assignments
- Inform students of policies such as attendance, withdrawal, tardiness, and making up assignments
- Provide the course outline and class calendar that will include a description of any special projects or assignments
- Arrange to meet with individual students during office hours, and before and after class as required

As a student, it is your responsibility to:

- Attend class in person and/or online
- Participate actively by reviewing course material, interacting with classmates, and responding promptly in your communication with me
- Read and comprehend the textbook
- Complete the required assignments and exams
- Ask for help when there is a question or problem
- Keep copies of all paperwork, including this syllabus, handouts, and all assignments
- Be aware of and comply with academic honesty policies in the HCCS Student Handbook (https://www.hccs.edu/studenthandbook)

EGLS3

The EGLS[3] (Evaluation for Greater Learning Student Survey System (https://www.hccs.edu/egls3)) 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. EGLS[3] surveys are only available for the Fall and Spring semesters. EGLS3 surveys are not offered during the Summer semester due to logistical constraints.

https://www.hccs.edu/egls3 (https://www.hccs.edu/egls3)

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.

Student Resources

Tutoring

HCC provides free, confidential, and convenient academic support, including writing critiques, to HCC students in an online 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 (https://www.hccs.edu/tutoring) website for services provided.

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 https://library.hccs.edu (https://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 https://www.hccs.edu/supplemental-instruction (https://www.hccs.edu/supplemental-instruction)

Resources for Students:

https://www.hccs.edu/covid19students (https://www.hccs.edu/covid19students)

Basic Needs Resources:

https://www.hccs.edu/support-services/counseling/hcc-cares/basic-needs-resources/ (https://www.hccs.edu/support-services/counseling/hcc-cares/basic-needs-resources/)

Student Basic Needs Application:

https://www.hccs.edu/basicneeds (https://www.hccs.edu/basicneeds)

COVID-19

Here's the link to the HCC information about COVID-19:

https://www.hccs.edu/covid-19 (https://www.hccs.edu/covid-19)

Sensitive or Mature Course Content

In this college-level course, we may occasionally discuss sensitive or mature content. All members of the classroom environment, from your instructor to your fellow students, are expected to handle potentially controversial subjects with respect and consideration for one another's varied experiences and values.

Instructional Modalities

In-Person (P)

Safe, face-to-face course with scheduled dates and times

Online on a Schedule (WS)

Fully online course with virtual meetings at scheduled dates and times

Online Anytime (WW)

Traditional online course without scheduled meetings

Hybrid (H)

Course that meets safely 50% face-to-face and 50% virtually

Hybrid Lab (HL)

Lab class that meets safely 50% face-to-face and 50% virtually

Copyright Statement

In order to uphold the integrity of the academic environment and protect and foster a cohesive learning environment for all, HCC prohibits unauthorized use of course materials. Materials shared in this course are based on my professional knowledge and experience and are presented in an educational context for the students in the course. Authorized use of course materials is limited to personal study or educational uses. Material should not be shared, distributed, or sold outside the course without permission. Students are also explicitly forbidden in all circumstances from plagiarizing or appropriating course materials. This includes but is not limited to publically posting quizzes, essays, or other materials. This prohibition extends not only during this course, but after. Sharing of the materials in any context will be a violation of the HCC Student Code of Conduct and may subject the student to discipline, as well as any applicable civil or criminal liability. Consequences for unauthorized sharing, plagiarizing, or other methods of academic dishonesty may range from a 0 on the specified assignment and/or up to expulsion from Houston Community College. Questions about this policy may be directed to me or to the Manager of Student Conduct and Academic Integrity.

📅 Course Calendar

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.

	Course:	Math 2415 Calculus III		
	Text:	Calculus by Larson, Hostetler and Edwards, 11ed		
	Instructor:	Mr. S. Ramharack		
	Time/Room	TTH 8:00 p.m. --- 9:50 p.m. Room 226		
	E-mail:	sukhlal.ramharack@hccs.edu		
Week	Mon	Tue	Wed	Thu	Fri
	1/17	1/18	1/19	1/20	1/21
1	Martin Luther King Day (Offices closed - No Class)	Intro to Course and 11.1, 11.2		11.2,11.3	
	1/24	1/25	1/26	1/27	1/28
2		11.3, 11.4		11.4, 11.5	
	1/31	2/1	2/2	2/3	2/4
3	Official Day	11.5, 11.6		11.6, 11.7	

	2/7	2/8	2/9	2/10	2/11
4		11.7, 12.1		12.1, 12.2	
	2/14	2/15	2/16	2/17	2/18
5		Exam 1 Ch 11		12.2, 12.3	
	2/21	2/22	2/23	2/24	2/25
6	Office Closed President's Day Holiday	12.3,12.4		12.5, 13.1	
	2/28	3/1	3/2	3/3	3/4
7		13.2, 13.3		13.4, 13.5	
	3/7	3/8	3/9	3/10	3/11
8		Exam 2 Ch 12		13.6, 13.7	
	3/14	3/15	3/16	3/17	3/18
9	7.3		Exam 2 (Ch 4, 5 & 6)		
	3/21	3/22	3/23	3/24	3/25
10		13.8, 13.9		13.10, 14.1	
	3/28	3/29	3/30	3/31	4/1
11		14.1, 14.2		14.2, 14.3	
	4/4	4/5	4/6	4/7	4/8
12		Exam 3 Ch 13		14.4, 14.5	
	W-day				
	4/11	4/12	4/13	4/14	4/15
13		14.6, 14.7		14.8, 15.1	Spring Holiday

	4/18	4/19	4/20	4/21	4/22
14		15.1, 15.2		Exam 4 Ch 14	
	4/25	4/26	4/27	4/28	4/29
15		15.3, 15.4		15.5, 15.6	
	5/2	5/3	5/4	5/5	5/6
16		15.7, 15.8		Review	
	5/9	5/10	5/11	5/12	5/13
16			Homework Due	Final Exam @ 8:00 p.m.	

Additional Information

Departmental/Program Information

Program Information for Majors: https://www.hccs.edu/programs/areas-of-study/science-technology-engineering--math/mathematics/

HCC Math Student Organization: Mu Alpha Theta: Application: https://www.hccs.edu/resources-for/current-students/stem--science-technology-engineering--mathematics/stem-clubs/mu-alpha-theta-application/

Process for Expressing Concerns about the Course

If you have concerns about any aspect of this course, please reach out to your instructor for assistance first. If your instructor is not able to assist you, then you may wish to contact the Department Chair.

Mathematics Courses

Chair of Math	Mahmoud Basharat	SW Campus	713-718-2438	Stafford Scarcella, N108
- Admin. Assistant	Tiffany Pham	SW Campus	713-718-7770	Stafford Scarcella, N108
- Admin. Assistant	Christopher Cochran	SW Campus	713-718-2477	Stafford Scarcella, N108
Math Assoc. Chair	Jaime Hernandez	CE Campus	713-718-7772	San Jacinto Building, Rm 369
Math Assoc. Chair	Susan Fife	NW Campus	713-718-7241	Katy Campus Building, Rm 112
Math Assoc. Chair	Hien Nguyen	NE Campus	713-718-2440	Northline, Rm 324

Developmental Mathematics Courses

Chair of Dev. Math	Dorothy A. Muhammad	SE Campus	713-718-5846	Felix Morales Building, Rm 124
- Admin. Assistant	Carmen Vasquez	SE Campus	713-718-7056	Felix Morales Building, Rm 124

Dev. Math Assoc. Chair	Jack Hatton	SE Campus	713-718-2434	Felix Morales Building, Rm 124
Dev. Math Assoc. Chair	Adnan Ulhaque	SW Campus	713-718-5463	Felix Morales Building, Rm 124/ Stafford Scarcella, N108