

Summer ONLINE 2022

Course Information

Course Title: Calculus

Course Prefix & Number: Mat 220

Section Number: 10815

Credit Hours: 5

Room Number: CM 460

Meeting Days: M/W

Meeting Times: 12-2

Course Format

In person. The typical workload for a 5 credit course is 10-15 hours per week for a 16 week course. This is an 8 week course with all of the content of the 16 week course. You can see that your workload will likely double depending on your prior math experience and how quickly you process information. A note about AI. If you use AI to complete your homework be aware that you will only have access to a standard calculator for your tests. If you have used AI on the homework it is VERY unlikely that you have processed the methods and material to understand the content. You will most likely fail the exams and fail the class. Be aware. AI is a wonderful tool but it will get you into serious trouble in this course.

Instructor Information

Instructor: James Spiker

Email: James.spiker@scottsdalecc.edu

Phone: 480-423-6012

OfficeLocation:CM409

Office Hours: 8-10

on Monday and Wednesday

Course Description

Limits, continuity, differential and integral calculus of functions of one variable.. This course is very fast and requires hard work and dedication OUTSIDE of the class time. You are expected to put in 2-4 hours per class session outside of the class working on homework, watching videos of course material, and studying the course content. If you are not willing to dedicate this amount of time you may not be successful in this course.

Prerequisites

A grade of C or better in [MAT182 and (MAT150, MAT151 or MAT152)] or MAT187 or appropriate Math placement. Course

Objectives

- 1. Analyze the behavior and continuity of functions using limits. (I)
- 2. State the definition and explain the significance of the derivative. (II)
- 3. Compute the derivative using the definition and associated formulas for differentiation. (II)
- 4. Solve application problems using differentiation. (II)
- 5. State and explain the significance of the Fundamental Theorem of Calculus. (III)
- 6. Compute anti-derivatives, indefinite and definite integrals of elementary functions. (III)
- 7. Read and interpret quantitative information when presented numerically, analytically or graphically. (I, II, III)
- 8. Compare alternate solution strategies, including technology. (I, II, III)
- 9. Justify and interpret solutions to application problems. (I, II, III)
- 10. Communicate process and results in written and verbal formats. (I, II, III)

Texts, Course Materials and Technologies

This course uses MOER.maricopa.edu, an Online Course Management System developed by David Lippman and the State of Washington. All of the Online Homework and Media Lessons will be accessed through this system. Grades will also be posted through this system. The software is free to use and can be accessed at https://moer.maricopa.edu/

A graphing calculator is required for this course. The instructor strongly advises the purchase of a ti-83 or 84

We will be using an open text for this course which can be downloaded for free, printed out, or purchased from lulu.com • Links for downloading and/or purchasing can be found in MOER

Course ID: 21092 Enrollment key 10815

Failure to enroll in MOER by June 12 will result in being withdrawn from the course

Course Policies

The following are policies specific to this course. Students are also responsible for the college policies included on the <u>Student Regulations</u> page of the Maricopa Community College District website.

Grading Standards & Practices

Derivative exam 35%
Integration exam 35%
Online Homework 10%
Module Quizzes 10%
Online Lessons 10%

Response Time

Students can expect a response time of less than 24 hours for the instructor to respond to messages sent via the MOER Management System or email. We do not use canvas so do not message me through that site. Students can expect assignments to be graded within 48 hours of the assignment's due date.

Attendance Policy/Late work

in review mode. This is a useful resource when you want to study for exams however once an assignment has been open in review mode you are unable then to use a late pass so be sure the assignment is complete before you open it in review mode.

Online homework vs Online quizzes.

You have unlimited attempts with no penalty for your online homework. After you have tried a problem 3 times it will reset and give you a new version of the same problem to work on. Many of the questions have video help that you can access and I suggest online resources like wolfram alpha and symbolab to help you work out solutions if needed. Online quizzes however have a different setting. You only get 1 attempt for free. After that you lose 20% for additional attempts at a problem so you want to be as accurate as possible. Also, online quizzes have a 2 hour time limit so do not start a quiz and then leave it to work on later. You will be kicked out after 2 hours and you will be unable to reopen the quiz or use late passes on it.

Dates and times of the Midterms and Final: The dates of the midterms are subject to change. If they change you will be notified via emal.

Derivative exam June 23rd

Integration exam July 16th

Instructional Contact Hours (Seat Time)

This is a five (5) credit-hour course. Plan to spend at least five hours on course content or seat time (direct instruction) and at least sixteen to twenty on homework weekly.

Accelerated courses will require additional time per week.

Technology Statement

Third-Party Learning Tools

SCC utilizes a variety of software applications and web-based tools operated by third party vendors to support student learning. To allow student access to the application, site, or tool certain identifiable information may be required to establish a user name or password, submit work and/or download information from these tools. Inherent with all internet-based tools, there is risk that individuals assume when electing to use the products and services made available by these tools, as they may place information at risk of disclosure.

In this course, we will use moer.maricopa.edu to complete or participate in assignments, activities and/or access course materials. <u>Accessibility Statements and Privacy Policies</u> for all tools used at SCC are available.

To use the third-party tools responsibly, please observe all laws and the Maricopa Community College District Student Conduct Code. Some specific aspects of law and conduct code to remember are prohibitions against copyright infringement, plagiarism, harassment or interferences with the underlying technical code of the software. As a student using a third-party learning tool, you have certain rights. Any original work that you produce belongs to you as a matter of copyright law. You also have a right to the privacy of your educational records. Your contributions to the third-party learning tool constitute an educational record. By using the third-party tool, and not taking other options available to you in this course equivalent to this assignment that would not be posted publicly on the internet, you consent to the collaborative use of this material as well as to the disclosure of it in this course and potentially for the use of future courses.

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College Policies

Students are responsible for the college policies included on <u>Student Regulations</u> page of the Maricopa Community College District website. Additional information about Scottsdale Community College can be found in <u>the SCC General Catalog & Student Handbook</u>.

Academic Honesty

- Every student in this class is expected to produce his/her own original work.
- Plagiarism is unacceptable and is not tolerated.
- Plagiarism may result in being dropped from the course with a failing grade.

Plagiarism will result in actions as outlined in the Maricopa Community College District Academic Misconduct Policy.

Refer to the course policies section in the linked syllabus for additional course and department specific policies.

Accessibility

Scottsdale Community College is committed to providing a fully accessible learning experience to all students. See SCC's list of <u>Accessibility Statements and Privacy</u>

<u>Policies</u> for technologies used for eLearning. If you require disability-related assistance, please contact the <u>SCC Disability Resources and Services Office</u>.

Accommodations

Scottsdale Community College provides equal opportunity to qualified students. If you

have a documented disability (medical, physical, learning, psychological, etc.) and wish to request disability-related accommodations to complete course requirements, contact SCC Disability Resources & Services (located in SC building; (480) 423-6517). Course requirements cannot be waived, but reasonable accommodations may be provided based on disability documentation and course objectives.

Code of Civility

Instructors are expected to be professional, courteous, respectful and empathic to students. They will:

- Begin and end class on time
- Be prepared for each class session
- Provide academic feedback and grade assignments in a timely manner
- Be available for individual consultation
- Clarify assignments and inform students of any adjustments to the class schedule

Students are expected to be reflective, courteous, respectful and empathic to classmates, instructor and other college staff assisting in their learning. Students are expected to arrive on time for class and remain until class has ended. The instructor should be notified in advance if there is a need to leave early. Students are expected to:

- Mute mobile phones and pagers before entering classroom
- Be in class and be on time
- Be prepared for class sessions
- Participate in class activities
- Follow instructions and complete assignments
- Keep up with and turn in assignments by due dates
- Put forth their best efforts
- Exchange phone numbers with two classmates in order to keep current.
- Ask questions when they don't understand
- Maintain knowledge of their grade status
- Contact instructor right away about concerns or situations that may interfere with their success in class

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Diversity and a Safe Learning Environment

This classroom will be a safe learning environment for every individual as far as I am able to ensure that outcome. This means I will treat each student with respect, and in turn I expect respect to be given to the instructor and every individual in this course.

Disagreement does not equal disrespect. We all bring different points of view, different personal values, different life experiences, and different personal preferences with us into the classroom. This diversity makes for great discussion, adds interesting dimensions to our interpersonal relationships, and is welcome in the academic arena. Though we celebrate our differences, I expect each student to respect the rights and needs of fellow classmates. Students cannot feel safe to express themselves without the assurance that their ideas, attitudes and beliefs will be treated with respect.

Maricopa Learning Tool Disclaimer

Maricopa's Canvas Learning Management System employs Learning Tools Interoperability ("LTI") standards to enhance the learning experience. Examples of learning applications that use LTI specifications to connect to Canvas include simple communication apps (e.g. Conferences, Chat), learning environments for complex subjects like math or science (e.g., Pearson MyLabs), plagiarism detection apps (e.g., Turnitin), and other integration tools that may route users to another (vendor) website. MCCCD provides links to these sites. Please be aware that when you use these links, you are leaving the Canvas environment and the protections MCCCD has built in to assure compliance with Maricopa's Data Privacy and Security Standards and other legal compliance. At present, MCCCD has been unable to verify that the vendors' software and systems conform to Maricopa standards in this or any other regard. Hence, there is some risk that instructors electing to use the products and services made available by these LTI vendors may place any student information shared with the vendor at a risk of disclosure.

Pregnant & Parenting Students

Students who are pregnant may receive accommodations similar to those given to students with a temporary illness when deemed medically necessary. Students may be eligible to receive attendance leniency, extended deadlines, alternative test dates, or in cases of severe temporary illness, an "incomplete" from a course. For additional information, see the Maricopa Community College District policy for Working with Pregnant and Parenting Students.

Students who are pregnant may contact <u>SCC Disability Resources & Services</u> for consultation. If a student needs an academic or athletic accommodation due to pregnancy, they will need to provide documentation, from their doctor, regarding their condition. Medical documentation regarding absences must also be provided. Disability Resources & Services is located in the SC Building; (480) 423-6517.

SCC General Education Statement

communicating in Written, Oral, Visual, and Numerical form. General Education is WOVeN through the curriculum and co-curricular experiences at Scottsdale Community College.

Sexual Harassment

Sexual harassment is any unwelcome, verbal or physical conduct of a sexual nature that is sufficiently severe, persistent, or pervasive that it alters working conditions and creates a hostile environment or reasonably interferes with, limits, or deprives a student of the ability to participate in or benefit from any educational program or activity.

Sexual harassment and discrimination in any college education program or activity, is prohibited. Students should report any discrimination and/or harassment they experience and/or observe to the Vice President of Student Affairs (SCC's Title IX Coordinator); located in the Administration Building (AD), phone (480) 423-6300.

To view the full Sexual Harassment Policy, refer to the Maricopa Community College District Sexual Harassment Policy for Students.

Student Conduct Code

The classroom is an educational learning environment where students are expected to engage in behaviors which are conducive to their own learning and the learning of their peers. To facilitate this, respect for self and others is mandatory and necessary. Should a student exhibit disruptive behavior and/or use profane language to the extent that it interferes with the learning environment, an academic consequence may be imposed. Any student found by a faculty member to have committed academic misconduct may be subject to the following academic consequences:

- Warning A notice in writing to the student that the student has violated the academic code.
- Grade Adjustment Lowering of a score on a test or assignment.
- Discretionary Sanctions Additional academic assignments determined by the faculty member.
- Course Failure Failure of a student from a course where academic misconduct occurs.

Further information see the Maricopa Community College District <u>Student Conduct</u> Code.

Withdrawal Policy

 Student may initiate an official withdrawal from any course by submitting a withdrawal form with required signatures to the A&R office within published deadlines.

- Failure to attend any classes is not a guarantee for a refund or an excuse of debt incurred through registration. See the Maricopa Community College District Refund Policy for detailed information.
- Official date of withdrawal is last date of attendance as determined by student's withdrawal or as reported by the instructor.
- The official date of withdrawal will determine degree of refund, if any.
- Failure to file official withdrawal form within published deadlines can result in a failing grade and may affect refund of course tuition and fees.

Additional information on withdrawals is outlined in the Maricopa Community College District Withdrawal Policy.

Student Support Services

A variety of student services are accessible online. Services are free of charge to all registered SCC students. Refer to the **First Steps: Helping You Succeed** module in any one of your Canvas courses for more detailed information.

Technology Skills & Computer Equipment

For this course, you will need a working e-mail address, a Canvas account, and access to the internet. Internet access can be from school, home, or work. Additionally, experience and comfort using the internet and word processing tools is beneficial for course success.

- SCC's Student Tech Center provides free computers and internet access to all registered students.
- Maricopa Community Colleges provides all students with an email address. It is now the official way to receive communication from the college and district. Look up your email account at the <u>Maricopa Student Email</u>
- You will be able to log into the <u>Canvas Learning Management System</u> using your MEID and associated password.

Course materials are best accessed through either Chrome or FireFox browsers. To download these browsers visit:

Chrome Website

FireFox Website

Help with Canvas

- Check out the <u>Canvas Student Guide</u> for self-help with Canvas, or call 1-888-994-4433 for 24/7 support
- Visit the <u>Maricopa 24/7 help site</u> for a live chat with a support team member

Note: It is essential that you set your notifications in Canvas before you get started with the course. This video will help you set your notification preferences.

SCC Help Desk

Contact the SCC Help Desk at (480) 423-6274. Hours are Monday – Friday 8a-8p and Saturday from 8a-4p. Summer Hours vary.

Public Safety Services

SCC Public Safety Office Phone Number: (480) 423-6175

SCC Emergency Number: (480) 784- 0911

All Maricopa County Community College Public Safety offices have a fully monitored, centralized dispatch center. This center is actively staffed 24 hours a day. Dispatchers will send officers to the location of the emergency activity. Non-emergency situations should be reported directly to the SCC Public Safety office by calling (480) 423-6175 or x36175. The SCC Public Safety office provides the campus with AZPOST certified police officers and MCCCD board approved police service aides and is staffed 24 hours a day, providing services such as patrol (foot, bike, cart, or patrol car), safety and disability shuttles (when resources allow), and camera surveillance. There are classroom intercom systems and outdoor call boxes that ring into the public safety office when activated.

Please remember, if you see something "out of place" or suspicious contact the Public Safety Department.

Helpful links for review are found on the public safety page of the SCC website:

- Public Safety Procedures
- Active Shooter How to Respond
- Emergency Response Quick Reference Guide
- Workplace Violence Overview

The instructor reserves the right to change any course specific policy at any time. The instructor will alert you in class and through moer.maricopa.edu messages upon any policy change.

Students are responsible for the information contained in this syllabus, the Syllabus page in your Canvas course and the **College Policies & Student Services** page found in the First Steps module of your Canvas course. Students will be notified by the instructor of any changes in course requirements or policies.