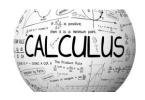


MATH 135: Calculus I



SPRING 2020 Syllabus

Course Information

Prerequisite:

Placement into calculus, or completion of Math 112 or Math 115, or equivalent.

Student Learning Goals:

The successful student should understand the fundamentals of differential and integral calculus and should be able to solve problems similar to those in the official homework list, the MathXL assignments, and the worked examples from the text related to the official homework problems.

Course Purpose:

This course is intended to provide an introduction to calculus for students in the biological sciences, business, economics and pharmacy. Math 136 is a possible continuation of this course.

Meeting Times (All times are in EDT)*:

Lecture: Lecture:

Sections 13-15, MTh 10:55am-12:15pm, CANVAS Sections 21-23, MTh 8:40-10:00am, CANVAS

Recitations: Recitations:

 Section 13, F 09:15am-10:35am, CANVAS
 Section 21, W 10:20am-11:40am, CANVAS

 Section 14, F 10:55am-12:15pm, CANVAS
 Section 22, W 12pm-1:20pm, CANVAS

 Section 15, F 12:35pm-1:55pm, CANVAS
 Section 23, W 1:40pm-3:00pm, CANVAS

Instructor Information

Lecturer: Sheila Tabanli (Dr. T)

Sections: 13-15, 21-23

Email: sheila.tabanli@rutgers.edu

Website: https://sites.rutgers.edu/sheila-tabanli/

Updated Tues. 2pm-3:30pm, CANVAS

Office Hours: Thur. 8pm - 9:30pm, CANVAS

Recitation Michael D. Paul Recitation Jose Sosa

Instructor: Instructor:

Sections: 13-15 **Sections:** 21-23

Email: <u>mike.paul@rutgers.edu</u> Email: <u>jsosa@rutgers.edu</u>

Office Hours: Thursdays Office Mondays & Wednesdays

2:30pm - 5:30pm, CANVAS **Hours:** 9:00am - 10:10am, CANVAS

Textbook & Grading

Textbook:

Calculus: Special Edition: Chapters 1-5, 7th edition, Smith, Strauss, and Toda. Kendall Hunt, 2018.

(ISBN: 978-1524971359)

Important: The textbook does not come with a license for MathXL, which is the online homework portal required for Math 135.

Grading Policy:

Assessment	Weight
RU Ready Test (RURT)	5%
Midterm Exams	45%
Final Exam	35%
Quizzes	10%
MathXL (online homework)	5%
Total	100%

Determination of Final Grades:

Your final grade will be determined by following the Math Department's grading policy. Please see the document "Final Letter Grade Calculation" for details on how the final letter grade is calculated. In summary, your final letter grade will be determined by your course grade and a set of letter grade cutoffs that is determined for all sections of the course after the final exam is graded and tallied. No instructor knows these cutoffs in advance.

The determination of final exam letter grades is based both on how well students have mastered the required material and on the difficulty of the exam. For example, suppose that 10 students get A's on the final exam, and 5 students get B+'s etc. Then the students with the 10 highest overall point totals for the course will get A's, and the student with the next 5 highest point totals will get B+'s etc. The number of A's for the class is determined by the class's performance on the final exam. Thus, being at a certain rank or higher does not guarantee a particular letter grade. This grading policy is an accurate way of measuring how well that section mastered the required material.

Assessments

RU Ready Test (RURT):

You will take RURT during the second recitation. RURT consists of 25 multiple-choice questions. The timing of the test is 45 minutes. It is a paper-based test. There will not be any re-takes. The cutoffs for each of the RU Ready tests will be announced via Canvas. Students who pass the RURT earn the full 5% of the grade. Students who fail the RURT earn 0% of the grade.

Recitation Quizzes (Note the change in quiz format):

Quizzes will be available for a full 24-hour period, roughly corresponding to the day of recitation. For example: for a recitation that meets on Wednesdays; quizzes will be available from 10am on Wednesday to 10 am on Thursday. These quizzes will still be submitted via MathXL. Although you will be able to *start* the quiz at any time during the *24-hour period*, you will only have a limited time of (*20 minutes*) to complete the quiz. There will be unlimited attempts to take the quiz within the 24-hour period, the highest score counts. You will be able to revise your responses as much as you want during the limited time, but you will

not be given any feedback on your responses until the 24-hour availability period is over. You do not need to submit your scrap paper. Quizzes consist of 2-4 questions on the topics mentioned on the quiz schedule. *The two lowest quiz grades will be dropped.* There may be some extra-credit opportunities provided. There will be no make-up quizzes granted except for truly compelling reasons. You must notify Dr. T in advance in case of missing a quiz. Make-up quiz must be taken before the following recitation.

Homework:

You are required to purchase access to MathXL to complete the online homework. The MathXL assignments are similar to the exercises in the <u>official list of HW exercises</u>.

(The official HW exercises are not handed in for grading but instead, together with the MathXL exercises, form the main study guide for the course.)

Each assignment will have a specific due date and these assignments must be completed online & on-time.

You will have about 5 days to complete each assignment; late submissions will not be accepted. Each homework worth the same points. *The two lowest MathXL Homework grades will be dropped.* You will need these 3 things to get started with MathXL:

#1 Your valid email address (preferably Rutgers email address) AND RU School ID

#2 Your instructor's Course ID (check Canvas for section Course ID)

#3 An access code, credit card, or PayPal

Midterms (Note the change in midterm format):

The first midterm exam was closed book: no formula sheets, notes, calculator, or any electronic devices. The second and third midterm exams are timed, open-book assignments, calculator permitted type of online assignments given in the "ALL Sections" Canvas course site. Midterm exams will still be submitted via Canvas, they will be available for a full 24-hour period. Specifically, Exam #2 will be available on March 29, 12:01am -- 11:59pm EDT; Exam #3 will be available on April 26, 12:01am -- 11:59pm EDT.

You may start the exam at any time during the 24-hour availability period, but once you start the exam, you will have 90 minutes to complete and submit the exam (not exceeding the 24-hour availability period). The default instruction for students will be to print a copy of the exam, write all of your work in your printed copy clearly, and then scan and upload your work to Canvas. Although it is preferred that you print out a copy of the exam to make grading easier, if you do not have access to a printer then you will be allowed to write out your work on your own paper, but you must label your work clearly (with a readable handwriting) so it can be graded. If you do not have a scanner, you will be allowed to use any of several free scanning options on your phone or computer. All submissions must be clear and in the form of a pdf. *If you must miss an exam for a truly compelling and documented reason, you must communicate with Dr. T' before the next classtime, then your score on that exam may be calculated as an appropriate rescale of your final exam score.* The course coordinator will send out more information about the midterm exams later.

Final Exam (Note the change in final format):

It is expected that the University will release directives and/or guidelines to the various schools and departments about scheduling final exams. So any information below about the final exam is tentative.

The final exam will be administered similarly to the midterm exams. It will be available for a 24-hour period and submitted online. You will be able to start the final exam at any time in the availability period, but once you start the exam, you will have a limited period (approximately 3 hours) to complete and submit the exam. Details about the format of the final exam will also be announced later. It is also likely that there will be both a multiple-choice component that is submitted via MathXL and a show-all-work component submitted via Canvas.

The final exam is cumulative. It will be a timed, open-book, calculator permitted assignment given in the "ALL Sections" Canvas course site. There will be both a multiple-choice portion (submittable directly into

Canvas) and a show-all-work portion which you must scan and upload similar to the midterm exam. Exact details are still being worked out, but expect these two sections to be timed and submitted separately. Also expect a few extra minutes for the show-all-work portion to allow time to scan and upload your work.

If you must miss an exam for a truly compelling and documented reason, you must communicate with Dr. T before the next classtime, then your score on that exam may be calculated as an appropriate rescale of your final exam score. The course coordinator will send out more information about the midterm exams later.

Attendance

Attending all lectures is essential for success in this course. It is the student's responsibility to keep up with the work and the homework assignments. Attendance is not factored into your final grade. To stay updated, especially if you are absent, please check your RU email, CANVAS announcements and Dr. T's website.

Your Learning Experience Prior to Class **During Class** After Class • Review Chapter Actively Participate • Review Lecture & Content • Take Notes Recitation Notes Study and Solve Ask Questions Problems Meet your due dates Attend office hours/study groups

Important Dates (Tentative)

January 28	Last day to drop with no W
January 29	Last day to add
January 29 (for sections 21-23)	Last day to take RU Ready Test in recitation
January 31 (for sections 13-15)	Last day to take RU Ready Test in recitation
February 7	Last day to change to Precalculus
February 20	In-class Midterm#1
March 14-22	Spring Recess
March 29	Online Midterm#2
April 26	Online Midterm#3
May 4	Last Day of Classes
May 7, 4:00pm - 7:00pm	Online FINAL

Before adding or dropping a course, always consult an academic adviser first.

Student Code of Conduct

Please refer to the website http://studentconduct.rutgers.edu/student-conduct-processes/university-code-of-student-conduct/ for Rutgers University code of student conduct.

Academic Integrity

All Rutgers students are expected to be familiar with and abide by the academic integrity policy. Violations of the policy are taken very seriously. All online assignments are open-note. This means you may consult your lecture notes or textbook, and you may use a graphing calculator. You may not use any other services or resources, and you must submit work that is your own. All students are still expected to adhere to the Academic Integrity Policy. Any student who is reasonably suspected of submitting work that is not their own may be subject to reassessment when in-person instruction resumes. In such cases, standard protocol with the Office of Academic Integrity will be followed, and final course grades may be delayed.

Statement from Office of Disability Services

Rutgers University welcomes students with disabilities into all of the University's educational programs. In order to receive consideration for reasonable accommodations, a student with a disability must contact the appropriate disability services office at the campus where you are officially enrolled, participate in an intake interview, and provide documentation: https://ods.rutgers.edu/students/documentation-guidelines. If the documentation supports your request for reasonable accommodations, your campus's disability services office will provide you with a Letter of Accommodations. Please share this letter with your instructors and discuss the accommodations with them as early in your courses as possible. To begin this process, please complete the Registration form (https://webapps.rutgers.edu/student-ods/forms/registration).

If you need 50% or 100% extra time on exams, you will be given the appropriate extra time for all quizzes and exams. Note that this extra time applies to the limited time period, not the 24-hour period. So, for example, you would still have to start each 90-minute midterm exam within its respective 24-hour availability period, but you would have 135 minutes (if you have 50% extra time) or 180 minutes (if you have 100% extra time) to complete and submit the exam, not exceeding the 24-hour availability period. If you need a reduced distraction testing location, it is your responsibility to find an environment that works for you. Please carefully plan when you will start each assignment within its respective 24-hour period so that you may complete the assignment at an appropriate location entirely within the limited time period.

Student-Wellness Services

Counseling, ADAP & Psychiatric Services (CAPS) (848) 932-7884 / 17 Senior Street, New Brunswick, NJ 08901 http://health.rutgers.edu/medical-counseling-services/counseling/

CAPS is a University mental health support service that includes counseling, alcohol and other drug assistance, and psychiatric services staffed by a team of professional within Rutgers Health services to support students' efforts to succeed at Rutgers University.

<u>Crisis Intervention</u>: http://health.rutgers.edu/medical-counseling-services/counseling/crisis-intervention/

Report a Concern: http://health.rutgers.edu/do-something-to-help/

Violence Prevention & Victim Assistance (VPVA) (848) 932-1181 / 3 Bartlett Street, New Brunswick, NJ 08901 www.vpva.rutgers.edu/

The Office for Violence Prevention and Victim Assistance provides confidential crisis intervention, counseling and advocacy for victims of sexual and relationship violence and stalking to students, staff and faculty. To reach staff during office hours when the university is open or to reach an advocate after hours, call 848-932-1181.

Mental Health Resources

College is a very stressful time for many of you, and not everyone has a good support system. Unfortunately, a lot of new students also often do not know the resources available to them. Many of you will also cope by self-medicating, usually with alcohol. If you are looking for support, you can check the many resources at **Rutgers Student Health**. You should particularly use these services if you are seeking counseling or if you are concerned about your drinking or substance abuse (or that of a friend).

If you need emergency support, call 911 or the National Suicide Prevention Lifeline at 1-800-273-TALK.

You can also tell your professor if you are having difficulty, and they can help you find the proper support. Above all, *please let someone know if you are in crisis.*

Note: Anything you tell your professor will generally be kept in confidence. Please be aware though that all Rutgers employees (other than those designated as confidential resources such as advocates, counselors, clergy, or healthcare providers) are obligated to report information about discrimination and harassment to the university. This means that if you tell a faculty member about a situation of sexual harassment or sexual violence, or other related misconduct, the faculty member must share that information with the university's Title IX Coordinator.

If you wish to speak to a confidential employee who does not have this reporting responsibility, you can find <u>a list of resources here</u> (see Appendix A).

UPDATED LECTURE SCHEDULE		
Date	Textbook Section/Topic	
1/23	Algebra and Precalculus Review	
1/27	2.1 Introduction to Limits	
1/30	2.2 Algebraic Computation of Limits	
2/3	2.3 Continuity (no IVT)	
2/6	3.1 Introduction to Derivative: Tangents	
2/10	3.2, 3.3 Derivative Rules	
2/13	3.5 Chain Rule	
2/17	REVIEW	
2/20	EXAM #1: 1.1–1.4, 2.1–2.4, 3.1–3.3, 3.5	
2/24	3.6 Implicit Differentiation	
2/27	3.7 Related Rates	
3/2	3.8 Linear Approximation	
3/5	4.4 Limits with Infinity and Asymptotes	
3/3	(No Graphing)	
3/9	4.5 L'Hopital's Rule	
3/12	SPRING RECESS	
3/16	SPRING RECESS	
3/19	SPRING RECESS	
3/23	4.1 Extreme Values	
3/26	REVIEW	
3/29	EXAM #2: 3.6, 3.7, 3.8, 4.4, 4.5	
3/30	4.3 Graphing Functions (Part 1)	
4/2	4.3 Graphing Functions (Part 2)	
4/6	4.6 Optimization (Part 1)	
4/9	4.7 Optimization (Part 2)	
4/13	5.1 Antiderivatives	
4/16	5.2, 5.3 Riemann Sums and the Integral	
4/20	5.4 Fundamental Theorem of Calculus	
4/23	REVIEW	
4/26	EXAM #3: 4.1, 4.3, 4.6, 4.7, 5.1, 5.2, 5.3	
4/27	5.5 Substitution Rule	
4/30	FINAL REVIEW	
5/4	FINAL REVIEW	
TBD	FINAL	