Calculus I (MATH 101 A, B)
Sabancı University, Spring 2021/22

Lecturer (Section A): Matteo Paganin
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Office Hours: Thursday 12:40-13:30 or by appointment, on Zoom (link on SUCourse)

Lecturer (Section B): Nurdagül Anbar Meidl
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Office Hours: Tuesday 11:40-12:30 or by appointment, on Zoom (link on SUCourse)

Coordinator: Gamze Kuruk (office hours by appointment on Zoom)
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Class Hours: (Section A) Mon 15:40 - 17:30 *in SGM/online*, Tue 11:40 - 12:30 *in FENS G077/online*
(Section B) Mon 11:40 - 13:30 *in FMAN 1099/online*, Tue 12:40 - 13:30 *in SGM/online*

Recitation Hours: Fri 8:40 - 10:30 (A1 - A5),
Fri 10:40 - 12:30 (B1 - B5),
Fri 13:40 - 15:30 (C1 - C4).

You are responsible for every announcement made in class or in SUCourse. Not attending the class or not following SUCourse regularly is not an excuse, in case you miss something.

Textbook: Calculus Early Transcendentals 2nd Edition (Global Edition), Briggs, Cochran & Gillett. You can purchase it following the instructions found on the course page, in SUCourse.

For online homeworks, students must have a personal account on Pearson MyLab. Detailed instructions, including how to create/link such an account, will be shared on SUCourse, during the second week of classes.

Condensed guideline of the present syllabus:

- Read this syllabus from top to bottom.
- Check that you have a Zoom account and a TopHat account, both using your sabanciuniv.edu address.
- Follow the announcements on SUCourse.
- Attend the lectures via Zoom or in class, and answer the questions presented at the same time via TopHat.
- Review the lecture notes before the recitations.
- Do the MyLab homeworks, if you purchased the book. The account on MyLab must be created with your sabanciuniv.edu address.
- Attend the recitations via Zoom, answering the questions presented at the same time via TopHat, and upload a pdf of your solutions of the weekly worksheet on SUCourse. During the recitation, you are required to keep your webcam on.
- Finalize and upload your solutions of the worksheet on SUCourse by the next day. This is the *only* version we will grade.
- Prepare for the Midterm and the Final exams.
- Take advantage of the Office Hours, to ask your questions, and check out the suggested problems, again on SUCourse.

All the details, of what is mentioned above and more, are in the next pages

Aim of the Course: We hope to gain an understanding of:

- Functions and graphs,
- Limits and the derivative, differentiation rules,
- Applications of derivatives such as graph sketching, optimization, relative rates,
- The area problem and the definite integral,
- Computing definite or indefinite integrals,
- Applications of single-variable integrals as time allows.

For the entire course, we will work on single-variable functions. You will find a tentative breakdown of material at the end of the syllabus.

Learning Outcomes: On completion of this course the student should be able to:

1. Understand and use basic properties of elementary functions
2. Understand the idea of limit analytically/graphically, and evaluate limits
3. Understand the definition of derivative and its geometric meaning
4. Compute derivatives using standard differentiation techniques
5. Apply the notion of derivative graphing and optimization problems
6. Understand the definition of definite integral and its geometric meaning
7. Compute integrals using standard integration techniques
8. Understand the idea of integration over unbounded intervals and compute them.

Lectures and Recitations: Lectures are given in class and broadcasted online via Zoom. Recitations are given online, via Zoom. Attendance is checked (see below in Participation) using the log files of Zoom (for the recitations) and TopHat. You are required to register a Zoom account using the sabanciuniv.edu mail address provided by the university. Log data related to other mail addresses will be ignored with no warning.

Each recitation will consist of the following activities

Discussion: Assistants will discuss solutions of various exercises, involving students with TopHat questions.

Problem solving: Students are given a worksheet to work on, alone or in groups, with the support of the Assistants.

Quiz: Students are given few questions, similar to the problems in the worksheets or in the discussion.

Grading: Your grade exclusively depends on the following listed items. The details of each item are in the next page. There will be no other extra-credit opportunities.

Midterm	33%
Final	33%
Lecture Participation	5%
Recitation Participation	5%
Recitation Quizzes	10%
Weekly Worksheets	14%
Online homeworks (requires MyLab account)	5%

IMPORTANT:

Every document submitted needs to be hand-written on paper, to be converted to pdf, and to include name, surname, student ID number, and signature in the top left corner of the first page.

Any page missing any of these information will be ignored.

Submissions by mail are **never** considered, SUCourse is the only means accepted.

NA Policy: Students missing both the midterm and the final, without a valid excuse, will receive NA if they also miss the make-up.

In general, if you will have serious issues preventing you from regularly following the course, you are required to contact the course coordinator Gamze Kuruk. Please see also Class Discipline below.

Midterm and Final: These are tests performed in person on campus. The midterm will be on the below listed date and time. More detailed information will be available in the due course. The university will later announce the final exam date. The final may be given on any day between 11/6/2022 and 23/6/2022. Student Resources schedules it, so do not plan to leave İstanbul before 23/6/2022 *(see also the make-up policy below).*

During the exams, the use of books, notes, electronic devices (including cell phones, smart watches, calculators, computers etc.), or any other kind of supporting learning material is **NOT** allowed. A student violating this rule will receive 0 points for that exam.

Midterm	April 17th - between 9:30 and 12:00
Final	Scheduled and announced by SR

Participation Grades: Participation is measured both in lectures and in recitations.
In each lecture and recitation, a certain number of pop-up questions will be presented to the students, via TopHat. Students attending their correct Zoom session or class will get 1 participation point if they also answer, correctly or not, at least half of the questions. Only the TopHat answers given by students attending their correct Zoom lecture/recitation will be counted. During recitations, participation cannot be counted if a student has their webcam off.
There will be no make-up for missed questions. At the end of the semester, we will drop the worst 30% scores (separately for Lecture participation and Recitation participation).

Recitation Quizzes: There will be a short quiz, usually at the end of the each recitation. Suggested problems, useful to review and practice outside the recitations, are listed in SUCourse. During the entire duration of each quiz, students are proctored and recorded. More details are announced on SUCourse.
There will be no make-up for missed quizzes. At the end of the semester, the worst 3 grades will be dropped.

Weekly Worksheets: In every recitation, students are asked to upload the first draft of their solutions of a worksheet, on SUCourse. We then expect the final version of the solutions to be uploaded by Saturday at 19:00, the day after. The final version will be valid only if the first draft contains some relevant work. Valid final versions are granted 3 points, 1 for each correct solutions of the first three problems of the worksheet. If the worksheet contains more than 3 questions, those are optional. The first draft will never be graded.
There will be no make-up for the worksheets. At the end of the semester, the worst 3 grades will be dropped.

Online homework: During the second week of the course, detailed instruction on how to create an account, use your code, and access the MyLab resources, will be shared with you on SUCourse.

The homeworks are posted on each Tuesday evening and are due on Thursday at 23:45.
There will be no make-up for the homeworks. At the end of the semester, we will drop the worst 30% scores.

Exams Make-up Policy: If you miss an exam and wish to make it up, you must contact Gamze Kuruk by mail, and explain your excuse as soon as possible.
If it is a health problem you need to bring a medical report, that must be given or checked by SU Health Center within 3 days of the date of the report. Make-up for the midterm or the final will be at the end of the semester (after the finals period). Only students that had contacted the coordinator with a valid excuse will be informed about the time and place. The make-up exam will contain all topics and is performed in person on campus.

Academic Integrity: All university policies on academic integrity apply to our course, and they will be enforced. (more information on `http://www.sabanciuniv.edu/en/academic-integrity-statement`).

In general, to ensure Academic Integrity, any student might be asked to validate any activity contributing to their grade in an interview via Zoom (recorded, with audio and video). A student failing to explain the submitted work, or refusing/missing the interview, will receive zero from that work.

In particular, no form of cheating is welcome in the exams, quizzes or any assignment, such as copying whole or part of each other's answers, using cheat-sheets etc. The action against such violations could range from getting a zero on the particular assignment to explaining the case in front of the Disciplinary Committee.

Class Discipline: It is our responsibility to provide students with excellent teaching and learning environments. We are therefore asking you to respect both our responsibility to teach and the right of other students to learn. Any action that disturbs your classmates or disrupts the online activities is unacceptable. Repeated violations of the above rules may cause a student to be counted as absent for a lecture or a recitation.

Attention must be taken regarding COVID-19 spread prevention. Students attending classes must comply with the rules listed at `https://mysu.sabanciuniv.edu/en/covid-19-rules`, especially those regarding "OPEN AND CLOSED AREAS". The maximum capacity of the classrooms will always be respected and students are required to correctly wear a mask and sit only in the designated seats at all time. The class will not start, or will be suspended, otherwise.

For the physical attendance, students will be admitted in the auditorium on a "first come first served" basis.

General Suggestions:

- Feel free to ask us and your Assistants questions in and out of class, especially during office hours.
- Remember that you do not have to be a math genius to be successful in this course (although it wouldn't hurt!). Regular study habits are sufficient to get a decent grade.
- Attend the classes and recitation hours regularly. Make sure you attend your own (registered) recitation section.
- Studying out of class for this course should become a routine. Key to success in mathematics (and anything else) is practice.
- GeoGebra and Desmos are useful softwares/websites to visualize many of the concepts we discuss.

Below is a tentative breakdown of topics.

Week	Date	Topic (Sections from the textbook)
1	Feb 28, Mar 1	1.1, 1.2
2	Mar 7, 8	1.3, 1.4
3	Mar 14, 21	2.1, 2.2, 2.3, 2.4
4	Mar 21, 22	2.5, 2.6, 3.1, 3.2
5	Mar 28, 29	3.3, 3.4, 3.5, 3.6
6	Apr 4, 5	3.7, 3.8, 3.9, 3.10
7	Apr 11, 12	4.1, 4.2
8	Apr 18, 19	4.3, 4.4, 3.11
9	Apr 25, 26	4.5, 4.6, 4.7
10	May 9, 10	4.7, 4.9, 5.1, 5.2
11	May 16, 17	5.3, 5.4, 5.5, 6.1, 6.2
12	May 23, 24	7.1, 7.2, 7.3
13	May 30, 31	7.4, 7.5, 7.8
14	Jun 6, 7	7.8