

SABANCI UNIVERSITY, Spring 2024
MATH 204 AB – Discrete Mathematics

This syllabus is subject to change in unforeseen circumstances

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Lecturer: (Section B) Mohammad Sadek
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Class Hours: (Section A) T 05:40 pm – 06:30 pm, R 10:40 am – 12:30 pm (FENS G077)
(Section B) T 04:40 pm – 05:30 pm, R 02:40 pm – 4:30 pm (FENS G077)

Recitation Hours: F 10:40 am – 11:30 am (A1 – A4),
F 11:40 am – 12:30 pm (B1 – B4),
F 12:40 pm – 01:30 pm (C1 – C3),
F 02:40 pm – 03:30 pm (D1 – D3),
F 03:40 pm – 04:30 pm (E1 – E4),
F 04:40 pm – 05:30 pm (F1 – F4).

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: Discrete Mathematics and its Applications, 8th ed., Kenneth H. Rosen.

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

- First order logic, proof techniques, mathematical induction.
- Sets, functions, sequences, sums,
- Algorithms, analysis of time and space complexity,
- Divisibility and primes,
- Basic and advanced counting techniques, recurrences, solving recurrences,
- Relations,
- Graphs, (if time allows).

Grading: Your grade exclusively depends on the items listed below. There will be no other extra-credit opportunities.

Midterm I	25 %
Midterm II	25 %
Final	30 %
Recitation quizzes	20 %

Exams: MATH 204 is a red course. The midterms exact times are announced by Student Resources.

Midterm I	Sunday, 24 March, 15:30
Midterm II	Sunday, 05 May, 16:00

The final may be given on any day between May 30 - June 09. Student Resources will determine the dates and times for all final exams, and instructors cannot change it. So, do not plan to leave Istanbul before Jun 10. We will not accommodate travel arrangements, or other personal business.

Makeup Policy: If you miss a midterm or the final for any reason, you can take the makeup exam. You do not need to submit any documents. Makeup for either midterm or the final will be at the end of the semester (after the finals period ends). Only students that missed one of three exams will be contacted about the exact time and place. The makeup exam will contain all topics, and will be harder than the regular exams. If you miss two exams out of three for any reason, your letter grade will be NA, and will not be allowed to take the makeup.

Recitation Grade: This consists of quiz scores (20 %). The best 8 of your quiz scores will determine the quiz grade. Every student is expected to take the quiz in their respective section; otherwise, the quiz grade will not count. Your participation and behavior in class may affect your recitation grade (disturbing your classmates, attempting to cheat in quizzes (which may cause other problems), being late, leaving early etc. may hurt your recitation grade).

Quizzes: The best 8 of your quiz scores will determine the quiz grade. There will be quizzes in almost all recitations (10 to 12 quizzes). There will be no make up for any of the quizzes for any reason. Suggested problems will be posted on SUCourse.

Lecture Attendance Check: There will be attendance checks during lecture times.

Extra Help: You are welcome to utilize the office hours of your instructor or your TA. The exact Office hours will be posted on SUCourse shortly.

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 particular, no form of cheating is welcome in the exams or quizzes, such as copying whole or part of each others' answers, using cheat-sheets etc. Such behavior will be harshly punished.

Class Discipline: It is our responsibility to provide students with excellent teaching and learning environments. We are therefore asking you to please respect both our responsibility to teach and the right of other students to learn. Any action that disturbs your classmates or interrupts the lecture is unacceptable. The following rules must be followed as long as you are our students.

1. Classes will start punctually on time. By coming to a class late, you will not only lose important material and announcements, but you will also disturb and distract others in the class, and disrupt the flow of the lecture or discussion.
2. Leaving early is unacceptable (unless we are aware ahead of time). If you are unable to attend class, you are responsible to find out what you have missed.
3. Turn your mobile off or put it on silent mode and stow it away.
4. Class Attendance: Attendance and participation in class sessions are essential to the process of education. If students fail to attend class, they fail to take advantage of an educational opportunity. Students' grades may suffer if their absences from any class session cause them to miss any direct assessment activities (e.g., a quiz). For these reasons students are expected to attend all classes regularly.

Below is a very hopeful tentative breakdown of topics.

Week		Topic (Sections from the textbook)
1	Feb. 15	1.1 - 1.3
2	Feb. 19 - 23	1.4 - 1.8
3	Feb. 26 - Mar. 1	5.1, 5.2
4	Mar. 4 - 8	2.1 - 2.3
5	Mar. 11 - 15	2.4, 2.5, 3.1
6	Mar. 18 - 22	3.2, 3.3,
7	Mar. 25 - 29	4.1, 4.3
8	Apr. 1 - 5	4.3, 6.1
9	Apr. 8 - 12	Spring Break
10	Apr. 15 - 19	6.2, 6.3, 6.4
11	Apr. 22 - 26	6.5, 8.1
12	Apr. 29 - May 3	8.1 - 8.3
13	May 6 - 10	8.4, 8.5
14	May 13 - 17	9.1, 9.2
15	May 20 - 24	10.1 - 10.3
16	May 27 - 29	10.4 - 10.5