American University of Beirut

MATH 101: Calculus and Analytic Geometry I

Syllabus (2023–2024 Fall; Sections L2 + E3/E4)

Summary: Calculus is a branch of mathematics developed to clarify concepts such as continuous change, rate of change, area, volume, and convergence to the point of quantitative precision. It gathers various theorems and computational techniques to help mathematicians, scientists, and engineers make predictions about the physical world and solve engineering problems. This course concentrates on the calculus of functions of one real variable.

Textbook: Thomas' Calculus (14th edition in SI Units) by G. B. Thomas, J. Hass, C. Heil, M. Weir

Tentative Course Outline:

- Functions (review)
- · Limits and continuity
- Derivatives and their applications
- Definite integrals and their applications

Exercises: Recommended exercises will be posted on Moodle. A selection of these will be discussed during the recitations. For best results, you are advised to solve the recommended exercises *before* attending the recitation.

Instructors:

• Lectures:

(L2) Siamak Taati (Email: st71@aub.edu.lb; Office: Bliss Hall 312B)

• Recitations:

(E3) Fatima Berjawi (Email: fjb06@mail.aub.edu)(E4) Zadour Khachadourian (Email: zk00@aub.edu.lb)

Office hours:

Office hours will be held every week by the lecturer at the following times:

• Mondays 14:00–15:00 and Wednesdays 11:00–12:30 (to be updated at the beginning of the semester)

Feel free to drop by if you need help or have questions or concerns. Your recitation instructor will hold an additional weekly office hour; its time and location will be communicated to you during the first recitation session.

Course Policies:

- You are expected to attend every lecture and recitation session, and to actively participate in class discussions.
- Announcements and supplementary materials will be posted on Moodle. You are expected to regularly check the Moodle page of the course.

Exams:

- Midterm 1 (Thursday, October 5, 18:30–21:30 Nicely 211)
- Midterm 2 (Monday, November 6, 18:30–21:30 Nicely 211)
- Final (to be determined by the Registrar's Office)

Grading Policy: The term grade will be calculated in two ways and the higher grade will be used.

	method 1	method 2
Active participation	5%	5%
Midterms	60%	30%
Final	40%	65%

A missed exam will count as a zero unless a valid reason (such as a medical report from the AUBMC) is provided.

Unique Learning Needs of Students with Disabilities: AUB strives to make learning experiences as accessible as possible. If you anticipate or experience academic barriers due to a disability (including mental health, chronic or temporary medical conditions), please inform your lecturer immediately so that we can privately discuss options. In order to help establish reasonable accommodations and facilitate a smooth accommodation process, you are encouraged to contact the Accessible Education Office: accessibility@aub.edu.lb; +961-1-350000, x3246; West Hall, 314.

Academic Integrity: Please refer to AUB Student Code of Conduct, in particular to section 1.1, which concerns academic misconduct including cheating, plagiarism, in-class disruption, and dishonesty. Please be aware that misconduct is vigorously prosecuted and that AUB has a zero tolerance policy. Course policy is that credible evidence of cheating will result in course failure.

Non-Discrimination: AUB is committed to facilitating a campus free of all forms of discrimination including sex/gender-based harassment prohibited by Title IX. The University's non-discrimination policy applies to, and protects, all students, faculty, and staff. If you think you have experienced discrimination or harassment, including sexual misconduct, we encourage you to tell someone promptly. If you speak to a faculty or staff member about an issue such as harassment, sexual violence, or discrimination, the information will be kept as private as possible, however, faculty and designated staff are required to bring it to the attention of the University's Title IX Coordinator. Faculty can refer you to fully confidential resources, and you can find information and contacts at [https://www.aub.edu.lb/president/titleix]. To report an incident, contact the University's Title IX Coordinator Trudi Hodges at 01-350000 ext. 2514, or titleix@aub.edu.lb. An anonymous report may be submitted online via EthicsPoint at [http://www.aub.ethicspoint.com].