

MATH 208 Introduction to Discrete Mathematics, 2024 Spring Syllabus
Section 001: MTWF 9:40–10:30 a.m., Kolbe Hall 213

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Website: <https://www.hafner.us/ua/>
Office hours: MTW, 10:45–11:15+, or by appointment

Prerequisites: MATH 145/149 with a grade of C– or better, or placement. If you do not meet the prerequisites, you may be withdrawn from the course without refund.

Course Objectives/Learning Outcomes: Students will be expected to be able to

- communicate mathematical results through the proper use of mathematical notation and words;
- use symbolic logic and various proof-writing techniques, including Mathematical Induction;
- describe the basic properties and operations of sets, functions and relations;
- learn the basics of logic circuits, number systems, set theory, sequences, algorithms, and probability.

Text: *Discrete Mathematics with Applications*, 5th Edition, Susanna S. Epp, Cengage Learning. If you are registered for the class, you should have access to a digital version of the textbook through WebAssign, paid for by your “First-day Course Materials E-Content Fee”; this is provided to you via Brightspace, in the “Content Browser”, under “WebAssign and eBook Access”. If you would prefer to source your textbook elsewhere, or if you already have access by some other means, you can opt out of this program for a refund using the “Course Materials” link. See my website for more information.

Calculator: No calculators will be permitted on in-class assessments. All electronics must be silenced and stored out of sight during tests and exams.

Some out-of-class assignments and exercises will require the use of a calculator or computer, but there are plenty of free online tools that are sufficient for this purpose. Contact me if you have questions about where to find the necessary resources.

Homework: Assigned homework consists of three primary components:

Reading the textbook will be necessary to gain a full picture of the content of this course. The text is packed with more information than it is possible to present in class, so you should read each section before and/or after the corresponding lecture.

A list of recommended exercises from the textbook will be supplied. These exercises will not be collected, but they are important for your learning and mastery of the material. You may find it necessary to do more problems than those suggested. Without adequate practice, you are likely to find the tests and exam to be too long and difficult.

Several homework problems will be assigned to be submitted and graded. Late work will not be accepted; however, a modest number of points will be omitted from the total “possible”, so you can miss an assignment or two without it hurting your grade. (If you do

not miss any assignments, that adjustment will essentially convert a portion of your total into bonus points.)

See my website for more information.

Tests: We will have six or seven in-class tests, roughly every other week. All tests are equally weighted. (Points are used solely as a bookkeeping device for grading within a test; the point total of one test has no relationship with the point total of another.) At the end of the semester, I will replace up to two of your lowest test grades with your final exam grade if the latter is higher.

If you know in advance that you will not be present for a scheduled test, contact me as soon as possible; we might be able to arrange for you to take it early. I do not allow makeups after the fact for any reason. This is the main reason for the test score replacement described above. If you have documentation that your absence is for a reason considered excused by the University, I will also replace that test score without it counting against the usual limit of two.

Final exam: A comprehensive final exam will be administered during finals week, as dictated by the University's schedule.

Grades: Your course grade will be based on the weighted average of your scores on assignments and assessments, with your homework total worth 15% of your grade, your test average worth 60%, and your final exam score worth 25%. From that, your *minimum* grade in the course is shown in the table below. (I reserve the right to make small upward adjustments at my discretion. Also, I may weight the final exam more heavily if it will help your grade.)

Percent:	<60	60+	63+	67+	70+	73+	77+	80+	83+	87+	90+	93+
Grade:	F	D–	D	D+	C–	C	C+	B–	B	B+	A–	A

Communication: Aside from face-to-face discussion, the best way to contact me is by email. While lengthy or detailed discussion is best handled in person, I encourage you to ask me brief questions about course material—including homework—by email if it is feasible to do so. Aside from the convenience for you, it also makes it easier for me to send hints or clarifications to the entire class if I feel they are of general interest. Email is also the best way to schedule a meeting outside of class time or handle other administrative matters.

I will sometimes send important information or announcements to the class as a whole, or attempt to contact you directly if the need arises, using your UA email address. Make sure you check this account regularly.

My use of Brightspace is very limited; instead, information relevant to the course will be posted to my website, which you should check frequently. **Do not** attempt to contact me via the internal messaging systems of Brightspace or WebAssign, as I do not check those sites frequently—use regular email instead.

Other policies: All University rules and regulations are in effect, including those on attendance, discipline, academic dishonesty, and harassment. Avoid creating distractions and disruptions to the class: silence your phone, do not converse with your classmates during lecture, etc.

You must be on the class list and properly enrolled in the course to participate in any way, including attending class or having work graded. See the University's website for information on add/drop deadlines. If you have a disability that requires accommodation, contact the Office of Accessibility immediately. Free tutoring is available in the University's tutoring centers: <https://www.uakron.edu/tutoring/>

COVID statement from the University: "COVID-19 is still present and serious. Before entering class, you should have completed your daily health assessment. You should not come to class if you fail your health check or feel ill. At that time, I also ask you to notify me that you will be absent. While you are in class on campus, you are required to: always cough or sneeze into your elbow or a tissue and adhere to other public safety protocols and directives for your specific classroom/lab/studio. Students who do not follow these health and safety requirements will be instructed to leave class immediately. Students who violate this protocol will need to leave the classroom and MAY be marked absent. Repeated violations of these health-saving protocols may lead to sanctions under the Student Code of Conduct, up to and including suspension or expulsion. Current guidelines can be found at: <https://uakron.edu/return-to-campus/>."