

Information Sheet
Real Analysis
MA 363, Fall 2022
MWF, 2:00–2:50, JXJ 1320

Professor: Phillips **Office:** JXJ 2204 **Phone:** 2022 **Office Hrs:** TBA, by appt

Textbook. *Introduction to Analysis*, fifth edition, by Edward D. Gaughan

Topics. We will undertake an investigation of the real numbers, limits, continuity, derivative, integrals, sequences, and series. This means we will cover (parts of) chapters 0–6.

The project. Ours will be a serious attempt to understand limits in the service of analyzing functions that preserve the structure of the real numbers. Our efforts will be informed by attention to aesthetics, precision, and utility. This course is focused on proof, and so it's worth noting that mathematics studies are central to any liberal education—recall that the Greek root of the word *mathematics* translates roughly as “that which is learnable.” Mathematics is thus paradigmatic of all learning. And so bracing and accompanying all of our efforts in this class of signal importance in the mathematics curriculum, we shall attend purposefully to nothing less than *learning itself*, (re)learning how to learn.

Attendance. It is unwise to miss class.

Homework. Homework will be assigned at the end of each class, will include a few presentations, and will account for one fifth of the final grade. “A *minimum* of two hours out of class preparation is expected of all students for each hour in class.”

Exams. There will be three midterm exams and a final exam. Each midterm will be announced at least one week in advance. The final exam will be comprehensive. All four exams will be worth 100 points each. ***There will be no make-up exams.***

Grading. The student's final grade will be based on the four exams and homework. The grading scale is

450–500 points: A
400–450 points: B
350–400 points: C
300–350 points: D
0–300 points: F

Disability services. If you have a need for disability-related accommodations or services, please inform the Coordinator of Disability Services in the Dean of Students Office at

2001 C. B. Hedgcock Building (906-227-1737 or disability@nmu.edu). Reasonable and effective accommodations and services will be provided to students if requests are made in a timely manner, with appropriate documentation, in accordance with federal, state, and University guidelines.