

Syllabus for Math 2250, Fall, 2007 Calculus

- **Text:** The text for this course is *University Calculus* by Haas, Weir, and Thomas.
- **Instructor:** Jesse Ratzkin
 - **Office:** 447 Boyd Hall
 - **Office Hours:** Mondays 10:30–12:00, Thursdays 11:00–12:00 and by appointment
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 - **webpage:** <http://www.math.uga.edu/~jratzkin/teaching/uga/m2250>
- **Tentative Schedule:** We will cover these topics in order, but the dates may vary a little.

date	topic	sections of the text
Aug. 16–20	intro to limits	2.1–2.2
Aug. 22–24	more about limits	2.4–2.5
Aug. 27–29	continuity	2.6
Aug. 30	derivative at a point	2.7
Aug. 31	derivative as a function	3.1
Sept. 5–7	rules of differentiation	3.2
Sept. 10–12	derivative as a rate of change	3.3
Sept. 13	derivatives of trig functions	3.4
Sept. 14–18	the chain rule and parametric equations	3.5
Sept. 19	implicit differentiation	3.6
Sept. 24–27	derivatives of inverse functions, including the logarithm	3.7–3.8
Sept. 28–Oct. 1	related rates	3.9
Oct. 3–4	linearization	3.10
Oct. 5–8	extreme values of functions	4.1
Oct. 10–11	mean value theorem	4.2
Oct. 12	monotone functions, 1st derivative test	4.3
Oct. 15–18	concavity, curve sketching	4.4
Oct. 19–24	applications	4.5
Oct. 29–31	L’Hopital’s Rule	4.6
Nov. 5	Newton’s methods	4.7
Nov. 7–9	antiderivatives	4.8
Nov. 12–14	estimates with finite sums	5.1–5.2
Nov. 15–16	the definite integral	5.3
Nov. 19–26	the fundamental theorem of calculus	5.4
Nov. 28–29	indefinite integrals, substitution	5.5
Nov. 30–Dec. 3	area between curves	5.6
Dec. 4–6	review	

There will be three exams in this course, including the final (which scheduled for **Friday, Dec. 14, 12–3 PM**). The midterm exams will be on **Friday Sept. 21** and **Friday Nov. 2**.

- **Other important dates:**

- Labor Day: Sept. 3
- Last day to drop: Oct. 12
- Fall break: Oct. 25–26
- Thanksgiving recess: Nov. 21–23
- Tuesday Dec. 4 has a Friday schedule for the university

- **Grading:** To assign grades, I will form a weighted sum of all the grades you receive throughout the semester. The weighting will be

midterm exams	25% each
homework	15%
final exam	35% .

I expect that the median grade in this class will be a C.

- **Homework:** You will be submitting homework online, using a program called webwork. To use this program, direct your favorite browser to <https://webwork.math.uga.edu/webwork2> find our class listing, and log on. You can submit answers to a problem until you get it right or until the due date passes (whichever happens first). Also, some of these assignments will be hard, so it's a good idea to start an assignment early. Please ask let me know about any problems you have or questions you get stuck on.
- **Exam Policies:** I do not allow reference materials (e.g. a page or index card of notes) during the midterm or final exams. I do allow calculators, but they are not required.
- **ADA Statement:** The Americans with Disabilities Act requires that reasonable accommodations be provided for students with physical, cognitive, systemic, learning and psychiatric disabilities. Please contact me at the beginning of the semester to discuss any such accommodations you may require for this course.
- **General Comments:** Please ask me questions. In general, this is the best way for you to learn the material, and the best way for me to tell how well the class is following the lectures. Asking many questions makes you happier and my job easier. I also encourage you to come to my office hours, or drop by my office outside of office hours. I'm ususally available for questions.

Please keep in mind that mathematics is not a spectator sport! You can only learn math by doing it, so it is imperative that you do the homework.

Good luck.