

## HOMEWORK 8 MATH 104, SECTION 4

**Office Hours:** Tuesday 2:30-4pm and Wednesday 5:15-6:45pm at 735 Evans.

**Nima's Office Hours:** Monday 8-12, Tuesday 9-12 and Wednesday 9-11am at 1010 Evans.

### PROBLEM SET

Submit your homework at the beginning of the lecture on Tuesday. A select number of problems will be graded. *Late homework will not be accepted under any circumstances.*

You are encouraged to discuss the problems with your classmates, but you must write your solutions on your own and acknowledge collaborators/cite references if any.

Write clearly! Mastering mathematical writing is one of the goals of this course.

You have to staple your work if it is more than one page.

#### **Due October 29:**

- Ross, Exercise 19.1, 19.2, 19.4, 19.6
- Ross, Exercise 20.12, 20.18
- Ross, Exercise 23.1(b)(d). You need to justify your answers.
- Ross, Exercise 23.2(a)(c). You need to justify your answers.
- Ross, Exercise 23.6, 23.8

There will be no problem set due November 5 because of the second midterm. However, the topic in Week 10 (uniform convergence of sequences of functions) will be tested in the exam. You should do some exercises to get familiar with it. For instance:

#### **No need to turn in:**

- Ross, Exercise 24.2, 24.14
- Ross, Exercise 25.2, 25.4

### READING

There will be reading assigned for each lecture. You should come to the class having read the assigned sections of the textbook.

**Due October 29:** Ross, Section 20, 23

**Due October 31:** Ross, Section 24, 25