

Mathematics 2131: Vector Calculus

Winter 2024-2025

PREREQUISITES: Math 1172

INSTRUCTOR: T. Miao **OFFICE:** RB 2013 **PHONE:** 346-7722
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LECTURES: 3 hours per week

Tuesday and Thursday 8:30 am - 10:00 am BB 1054

TEXT: There is no required textbook for the course as there are many great resources online. Practice problems will be assigned from the following open-source textbook:

MIT open course online calculus textbook

<https://ocw.mit.edu/ans7870/resources/Strang/Edited/Calculus/Calculus.pdf>

COURSE OUTLINE: The topics to be covered are, tentatively, the following chapters from the book above:

Chapters 11, 12, 13, 14 and 15.

OFFICE HOURS: Tuesday 10:00 am - 11:00 am

If these hours do not fit your schedule you are welcome to consult with me whenever you find me in my office. You may also make appointments through the Secretary of the Department of Mathematical Sciences in RB 2012; the phone number is 343-8469.

MARK DISTRIBUTION:

Your mark for the course will be calculated according to the following formula:

- (a) 10% from homework assignments.
- (b) 30% from the mid-term test and 60% from the final exam. The final exam may cover both the first half and the second half of the course. The mid-term test will be from 8:30 am to 10:00 am on Thursday, February 27, 2025. **Note this date is subject to change.**

RE-EVALUATION OF TEST:

If you want to have any of the questions in your mid-term test re-evaluated, it is important that you follow the following procedure:

- (a) **DO NOT MAKE ANY CHANGES TO YOUR TEST PAPER.** If you do, then I am obliged to report this to the Dean, who shall then seek a severe penalty consistent with the offense, up to and including expulsion from the University.

(b) This instruction must be followed strictly. On a **SEPARATE** piece of paper note what is wrong with the way your test is marked. Attached it to your test paper and hand it to me. **DO NOT WRITE ANYTHING ON THE TEST PAPER.**

(c) No mark changes will be considered after seven days from the day the test is handed back.

Note that in any re-evaluation of your marks, while there is a potential for your mark to increase, there is also the possibility for your mark to decrease as well.

HOMEWORK ASSIGNMENTS: WeBWorK

WeBWorK is a free online homework system that will be required to complete the assignments. The link to access WeBWorK as well as login information will be provide to you on D2L.