Calculus B
Spring Quarter, 2011-3

Instructor: *Dr. Matthew E. Coppenbarger, Ph.D.* (*Associate Professor*)
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Office Hours: M (12-1), TR (1-2), W (2-3). *Note:* These office hours are subject to change due to committee meetings and assignments that have yet to be finalized.
Prerequisites: Grade of C or better in either 1016-271 (Calculus A) or 1016-262 (Calculus with Foundations II).

Class: MF 10-10:50 (*GOS-1174*), MF 11-11:50 (*GOS-2305*), W 10-11:50 (*GOS-2300*). There will be a 10 minute break each class (except exam days).
Textbook: *Thomas' Calculus: Early Transcendentals, Twelfth Edition*, by George B. Thomas, Jr.

Remarks:

- Suggestions and questions in class are encouraged. I expect each student to be attentive and participating in the class discussions.
- *Attendance will be taken every day.* It is school policy that a student must have no more than two unexcused absences from the workshops and no more than two unexcused absences from the lectures to earn a course grade better than a C. Being sick is an excused absence. You may be required to provide a doctor's note. Nonetheless, send me an email as soon as you know you will miss class.
- Your instructor DOES NOT use *mycourses*. All information about the course can be found at the website above. Look under the "Current Courses" link.
- Rarely, I will send important notifications, updates, and/or corrections about class to you through SIS. So make sure you regularly check your RIT email.
- Please turn off all wireless devices during class!
- Any student in need of special accommodations should see me sometime in the first week.
- Early alerts will be sent at the end of the third and sixth week of classes.

Homework:

These assignments are an integral part of the course and must be carefully done as they are the best preparation for exams. There will be a total of 10 homework assignments and the lowest will be dropped. This means there are assignments due this Friday and on each midterm exam day.

Grading is based on the following seven items:

(1) *Appearance.* Your assignment should be written on regular sized white paper (either blank, lined, or graph – engineering paper is fine, too). If your assignment is removed from spiral bound notebook, then the excess paper should be removed or trimmed. Attach the cover sheet on each homework assignment. Use a real staple to attach multiple pages (no origami staples).
(2) *Legibility.* The grader must be able to read what you have written. So write neatly!
(3) *Organization.* In part, this means keep it sequential – the grader should not have to search for problems out of order nor follow arrows all over the page to grade a problem. Additionally, you should clearly label the beginning of each section, staple the pages in order, and be consistent if you put the problems in columns. And, when appropriate, clearly indicate that your answer, and nothing else in the problem, is what is to be considered when grading.
(4) *Presentation of solution.* In writing an answer to a problem, your target audience is a fellow student. Problems should be presented in a way that someone that has a fair understanding of the topic will be able to follow the steps taken to solve the problem. Do not assume that the grader is a fellow genius and can follow all of your cryptic expressions.
(5) *Work.* Provide all steps necessary to solve the problem. This includes showing an appropriate amount of work that demonstrates your knowledge and understanding of the material.
(6) *Correctness of the answer.*
(7) *Completion.* Your grader will not always have the time to grade every problem. In those cases, a portion of the score on the homework assignments may be based on your genuine attempt to solve all of the remaining ungraded exercises in the assignment.

Other remarks with regard to the homework:

- Problems that are graded are assigned a percentage by the grader (percentages are based on a straight scale – 90% and up is an A, 80% and up is a B, …, 60% and up is a D, and 0% is for nothing written down or no mathematical content). The number of points each problem is worth is based on two items: importance and difficulty.

- You should anticipate each assignment taking a few hours or more to complete. It is important to start early in case you struggle with the material.
- If you don't know how to do a problem, go over the relevant material in the lecture notes and in the textbook. Give yourself some time for a spark of inspiration. If you are still stuck, I can give some hints and pointers, but you should not expect me to fully solve the problem for you.

Feel free to work in groups to solve the homework problems. But each student is required to turn in his/her own assignment and write the solutions in his/her own words (otherwise, it's plagiarism).

Assignments will be due in class on Friday each week. New homework assignments will be posted no later than 11pm on the previous Friday.

Late assignments will be worth only about a third of the normal points available. It is better to turn in an incomplete assignment than it is to wait until you have everything done.

Quizzes should take 15 to 25 minutes to complete. The length of each quiz is usually one page (front and back). ***A missed quiz cannot be made up***.

Workshops:

These are organized around cooperative study where you are expected to work together in small groups. Each group is given a worksheet consisting of interesting applications of calculus that are used to trigger curiosity regarding how to solve more theoretical problems or real world applications. You will learn from each other, achieving solutions mainly through your own efforts.

I generally don't want you to have to work on these outside of class, so you will turn them in at the end of class. It is not always necessary to complete the assignment. The number of points each problem is worth is based on four items: importance, difficulty, participation, and the order in which the problem appears (problems at the beginning are generally worth more – problems at the end are generally worth less – so it is usually to your advantage to do them in order).

There may be a penalty for being late to class on workshop days.

Midterm Exams: There will be three midterms and given on Fridays of Weeks 3, 6 and 9. You will have the entire 2-hour class to complete them (but many students will finish early). ***A missed exam cannot be made up*** except due to a genuine emergency.

Final Exam: The final is a two hour cumulative exam given in the 11th week. Note that it is SMS policy not to give a final exam *before* its scheduled time.

Grading: Grades are assigned using a straight scale (90% and up is an A, 80% and up is a B, etc.). I do, however, reserve the right to lower the grading scale to your benefit. Please note that I do NOT utilize MYCOURSES to maintain your grades. I will keep you apprised of your grade periodically throughout the quarter. The relative weights of each of the previous items are listed in the following table.

Item	Relative Weight
Homework	10 %
Quizzes	10 %
Workshops	10 %

Item	Relative Weight
Exam I	15 %
Exam II	15 %
Exam III	15 %
Final	25 %

Schedule: We will cover the last four sections of Chapter 3, all of Chapter 4, portions of Chapter 5 and one section from Chapter 8. The following table is for the first three weeks of the course and is **tentative**. The entire schedule is available online and will be updated weekly.

Week	Sections Covered	Monday	Wednesday	Friday
1	3.8, 3.9	**Mar 12** **Section:** 3.8 *Workshop #1*	**Mar 14** **Section:** 3.8, 3.9	**Mar 16** **Section:** 3.9 *Workshop #2* *Hmwk #1 due*
2	3.10, 3.11	**Mar 19** **Section:** 3.10 *Workshop #3*	**Mar 21** **Section:** 3.10, 3.11 *Quiz #1*	**Mar 23** **Section:** 3.11 *Workshop #4* *Hmwk #2 due*
3	4.1, 4.2	**Mar 26** **Section:** 4.1 *Workshop #5*	**Mar 28** **Section:** 4.1, 4.2	**Mar 30** ***Exam I*** *Hmwk #3 due*