

Math 112 – Sections 11-15
Calculus I
Fall 2006

CLASS:	MWF, 11:00 – 11:50 p.m. 3714 HBLL
INSTRUCTOR:	Stephen Taylor; 367 TMCB; Phone: 422-3684 Email: staylor@math.byu.edu
OFFICE HOURS:	Sat. 12:00-4:00 in 367 TMCB, or by appointment
TEXT:	<i>Calculus</i> by Garner (Fourth or Fifth Edition)
PREREQUISITES:	Math 110 and Math 111 or a High School Algebra/Trigonometry Course
COURSE WEBSITE:	www.math.byu.edu/~staylor/math/math112/math112.html
GRADING SYSTEM:	3 Tests (150 points each) 450 Quizzes/Homework 250 Final Exam <u>300</u> Total 1000

950 points will guarantee an A	860 points will guarantee at least a B
920 points will guarantee at least an A-	830 points will guarantee at least a B-
890 points will guarantee at least a B+	800 points will guarantee at least a C+ , etc.

TESTS: Students are required to take each test at the announced time unless excused by the instructor prior to the test. *Test questions will largely be based on the homework.* The final exam will be given at the assigned time found on AIM and will be comprehensive. Department policy forces me to normalize the final course grades such that the average grade on the final exam for my sections is the average final grade for the class. Very seldom do I raise or lower a grade more than one letter grade of that earned on the final exam.

HOMEWORK AND QUIZZES: All required homework problems are on this syllabus. The problems in brackets are optional but potentially could show up on the final. I would suggest reading the bracketed problems and trying the ones you believe are most difficult. All other problems are required. Quizzes will be given on Tuesday and Thursday and will be taken directly off of homework problems with an occasional change in format. Solutions to all homework problems that may potentially be on quizzes will be posted the previous Friday. This means you have the weekend to review the solutions to the previous week's homework questions to prepare for the upcoming quiz. **Homework will be due every Friday and should include the assigned problems in the sections FULLY covered through the previous Wednesday.** This means that if I do not finish a section in class on Friday, it will not be due the following week.

Students will be expected not only to master computations, but also to demonstrate their understanding of calculus by constructing logically sound arguments. *Developing proficiency in critical thinking and logical inference is a major goal of the course.* Thoughtful reading of the text and lecture notes as well as solving problems is key to being successful. Looking over lecture notes *before* the class they are covered can greatly assist in understanding new topics. Not all material can be presented in class, in which case students are responsible to learn it through their own reading. **The students who earned A's in my last calculus course were the ones who came to class every day, and did nearly all of the homework correctly.** If you ever have questions about homework or the course feel free to stop by my office at any time. I hope you enjoy the course.

UNIVERSITY POLICIES: BYU's policy against sexual harassment extends not only to employees of the university but to students as well. If you encounter sexual harassment, gender-based discrimination, or other inappropriate behavior, talk to your instructor, department chair, or contact the BYU Equal Employment Opportunity Office at 422-5895 or the Honor Code Office at 422-2847. BYU is also committed to providing reasonable accommodation to qualified persons with disabilities. If you have a disability that may adversely affect your success in this course, please contact the University Accessibility Center at 422-2767. Services deemed appropriate will be coordinated with the student and instructor by that office.

Each student is expected to observe Brigham Young University's standards of honesty, integrity, respect for others, and personal behavior.

Math 112–Sections 11-15: Calculus I
Syllabus – Fall Term 2006

Problems

- 1.1: 1, 4a(ii)ce, 7bd, 9, 11bdf, 13, [2, 3, 4bd, 8, 11h, 14b]
1.2: 1, 2, 4, 6, 9, 10, 27bd, 28bd, [14, 15, 17bdf, 21, 25, 29]
1.3: 2bd, 3bdf, 4bdf, 6bd, 15, 17, [2f, 5, 10, 13, 16]
1.4: 2, 4, 6, 7bd, 8bcefh, 9abd, 11, [7e]
1.5: 1bdf, 2ceg, 5, 8begi, 9bdf, 13bdh, 21, [1h, 2dh, 4, 7, 8dfhjl, 9h, 13f, 16]
1.6: 1bdh, 2bd, 3bdf, 5, 8, 10, 12, [1f, 6, 11, 15]
1.7: 1bdfh, 2bdf, 7, 10, [4bd, 6, 8, 9]
1.8: 1bdf, 3bdf, 4, 7, 9, 11, 13, 14b, 23, 29bde, [5, 8, 12, 18, 24]
1.9: 1bdfh, 2, 6ce, 8a, 9, 12abc, 14, 17, [1j, 3, 4b, 5, 6b, 11bdf]
2.1: 1bd, 3, 7, 9, 11, 14, [6, 8, 10, 12, 23]
2.2: 1bdf, 2dhlp, 3bc, 4bc, 5b, 6abc, 13a, 14defjkl, [1h, 2befjn, 14abc, 19]
2.3: 1bdfhjl, 2bdfhjm, 4, [2l, 7]
2.4: 1bdfhj, 2bdfh, 3bdf, 7, 10bd, 11bdf, [1l, 2j, 8b]

Test I: Testing Center (Covers 1.1–2.4) Oct 4 - Oct 7

- 2.5: 1bdfh, 5cdfh, 8b, 9bdf, 10a, 11dfh, 12f, 13f, [1jln, 3, 5b, 8df, 9aijk, 10b, 11bj, 12b]
2.6: 1bd, 2bd, 3bd, 4ef, 5bdf, 11, [4bd, 12]
2.7: 1bdfh, 2, 3b, 5, 6b, 7bd, 11, 13, 17b, 18, [3c, 9, 10, 16bd]
3.1: 4, 5bd, 7bd, 8, 9bd, 10, 13, 15ac, [1, 3bdf, 11, 12bd, 16, 18]
3.2: 1, 2, 4, 5ad, 6, 8bc, 17, 18, 19, 25, [3b, 5c, 7bd, 9, 21]
3.3: 3bdfhjl, 4bdfhjl, 5bdf, 6, 13bf, 15bd, [1, 4n, 7, 13d, 17, 18]
3.4: 3bdfhjl, 4bdfhjl, 5bdf, 7, 9, 11, 13b, 18, [6b, 14, 16, 17]
3.5: 1bdfhjl, 2bdf, 3bdfhjlnp, 4bdhj, 5bd, 6, 8, 10bd, [4l, 7, 9, 10]
4.1: 2, 4, 6, 8, 10bdfhln, 11bdfh, [9, 13]
4.2: 1bdfhjlnp, 3, 4b, 6, 7bd, 8bd, 10, [5, 11a]
4.3: 1bd, 3b, 5bfjnr, 6b, 7, 8, 17bfj, 19, [15abc, 17d]
4.4: 1bdfhjl, 2bdfhjl, 6, 8, [2n, 7]

Test II: Testing Center (Covers 2.5–4.4) Nov 1 - Nov 4

- 4.5: 2, 4, 5, 6, 10, 12, 14, 17, 18, 20, 24, 26, 28, 30, 31, 32, 34, 35, [8, 11, 19, 25, 27]
4.6: 2, 4, 6, 8, 10, 11, 15b, 17, [1, 5, 12, 15d]
4.7: 2, 6, 8, 11, 12, 18, [4, 10, 13, 17, 19]
4.8: 2, 4, 6, 9, 12, 16, 19, 22, [3, 7, 10, 14, 15, 21]
4.9: 1bdfhjl, 2bdfhjl, 3bd, 4b, 6, [5]
4.10: 1, 2bd, 3b, 4bdh, 5bfjl, [4f, 6]
5.1: 1ac, 2f, 3f, 4bd, 5bf, 6, 7, 8b, 9b, 10, 14, 18, 20, [1bd, 2b, 3b, 6, 9f, 13, 16, 19]
5.2: 2bdfh, 3b, 4, 6, 10, 12, 14, [5, 7, 13]
5.3: 3, 6, 8, 10, 13, 16, 18, 19, [5, 7, 11, 14, 17, 20]
6.1: 1, 3, 4b, 6, 8bd, [2, 4d, 5, 7, 8e]
6.2: 2, 3, 5, 9, 10bd, 11bd, 13, [4, 8, 14]
6.3: 1bd, 2bdf, 3bd, 4, 6, 9bd, [5, 7, 8, 10, 11]
6.4: 1bdf, 2, 3, 4, 5bdfh, 6, 8, 14bd, 15, 18c, [7, 13b, 18b]
6.5: 1bdfhjl, 2bdfhjl, 3bdfh, 4b, 5bdf, 8, [9]
6.6: 1bdfh, 2bdfh, 3bdfh, 4b, 6d, 9, 10b, 12, 13, 16, [4d, 5, 6b]
6.7: 1bdfhj, 2bdfhj, 3bdfghjlo, 4abdf, 5ab, 6ab, 7bdf, 13

Test III: Testing Center (Covers 4.5–6.7) Dec 6 - 9