

STUDENT SYLLABUS**MAC2311-07/08/09 Calculus 1****Spring 2007**WEB PAGE: <http://www.math.fsu.edu/~bellenot/class/s07/call>

MEETING TIMES	Section 7	Section 8	Section 9
101 LOV Lectures	MWF 11:15-12:05	MWF 11:15-12:05	MWF 11:15-12:05
217 HTL Recitations	T 9:30-10:45	T 11:00-12:15	T 2:00-3:15

INSTRUCTORS	Lecture	Recitation
	Dr Steven Bellenot	Mr Tatar
OFFICES	223 Love	404/6E MCH
OFFICE HOURS	M2-3, W10-11, or by appointment	MW12:30-2, or by appointment
EMAIL	bellenot@math.fsu.edu	atar@math.fsu.edu
OFFICE PHONE	644-7405	none

ELIGIBILITY: MAC1140 (Pre-Calculus) and MAC1114 (Trigonometry) with a grade of C- or better.

TEXT: Steward, *Calculus – Early Transcendentals*, 5nd Edition, Brooks Cole, 2002.

CLICKER: The class requires an RF PRS unit for class use. The clicker will be used to answer questions during the lecture and to measure attendance which will be a factor in your grade.

CALCULATOR: The TI-89 graphing calculator is highly recommended as it will do symbolic calculus, but no calculators are allowed on the tests.

COURSE OBJECTIVES: The purpose of this course is to introduce students to the ideas and techniques of calculus and also to reinforce the prerequisite algebra and trigonometry. We will cover almost 400 pages (parts of chapters 2-6) which includes both differential and integral calculus with applications to related rates, graphing, optimization, areas and volumes.

COMMUNICATION: It is your responsibility to register for a (free) FSU computer account so that I can send you email, which you are expected to check regularly. If you prefer to read your email elsewhere then you can arrange to have messages forwarded, but you must still obtain an FSU account in the first instance. Please – no cell phones are allowed in class.

GRADING/EXAMS: There will be four 50 minute tests (Dates: Jan 31, Feb 21, Mar 21, Apr 9). Each test will cover the corresponding period, plus some ‘reminder’ material from previous period. The final will be given Thursday Apr 26 12:30-2:30pm, and will be comprehensive. Your grade will be based on how well you do on the tests (50%), the homework, quizzes, attendance, and participation (25%), and the final(25%). Letter grades will be assigned according to the usual scale (A: 90 and above; B: 80 and above; C: 70 and above; D 60 and above; F below 60). Plus/minus letter grades may be assigned to high/low numerical grades. A grade of I will not be given to avoid a grade of F or to give additional study time. Failure to process a course drop will result in a course grade of F.

EXAM POLICY: No makeup tests will be given. Late or unstapled assignments or projects will not be normally be accepted. A missed test may be excused if the student presents sufficient verifiable evidence of extenuation circumstances. If a test absence is excused, the the final exam will be used for the missing test grade. And unexcused absence from a test will be penalized. An unexcused missed assignment will result in a grade of zero. Absences from tests, and missing assignments due to family social events will not be excused. Acceptable medical excuses must state explicitly that the student should be excused from class. Students must take the final examination at the scheduled time. Students must bring FSU ID cards to all tests.

HOMEWORK: The web page has the complete (but tentative) schedule for the semester. Each recitation period will have 5-6 homework problems that will be presented by students in Tuesdays class.

HELP: (1) Help may be obtained at the Math Help Center (114 MCH).

Do not hesitate to come to our office hours, or to contact us via email. Email is checked often, and promptly answered. (Please – no html formated email, send text only.)

Details

- How I grade problems: There are several steps to solving a Calculus problem. One must understand the problem. One must select a method of solution which is not only correct but is efficient. One must execute the method and communicate its execution correctly. Finally the results must be checked for reasonableness of your answer. Partial credit is awarded with these factors in mind relative to the difficulty of the problem. Adding $2 + 2$ and getting 5 in the course of a problem could result in a score of 0/10 if the problem was $2 + 2 = ?$, to getting 10/10 if it was a silly mistake at the end of a two page problem solution.

Incorrect answers that are unreasonable are not given much partial credit. For example, the answer $(y - 1) = 2x(x - 1)$ to the question what is the equation of the tangent line to $y = x^2$ at $x = 1$ is unreasonable because lines have linear equations. Even though the error is a simple one, it is an error that should have been caught in the “is this answer reasonable phase”. What must you check so your answer is reasonable? This is one of the best reasons to attend class, it is not in the text.

Mathematics provides for many short calculations but correct communication requires sticking to mathematical rules. In particular, equations $RHS = LHS$ should only be used when the RHS and the LHS are equal. For example, the following limits problem contains two $=$ -signs and neither is used correctly.

$$\lim_{x \rightarrow 3} \frac{x^2 - 9}{x^2 - 5x + 6} = \frac{x + 3}{x - 2} = 6$$

The answer is wrong because of the missing limit operator for the middle expression. This kind of mistake is often caused by laziness rather than lack of understanding, or is it? It doesn't communicate understanding and so it does not deserve full credit.

There are many ways to solve most mathematical problems, but there is only so much time on a test. Choosing a correct but slow method may not cost you any points on the given problem but could rob you of time needed on other problems. For example the expansion below can be done by several methods but you should pick Pascal's triangle or the binomial theorem over successive products.

$$(x + h)^5 = x^5 + 5x^4h + 10x^3h^2 + 10x^2h^3 + 5xh^4 + h^5$$

Finally you need to show all your steps. Some calculators (TI-89 for example) will compute the expansion above for you – which is a good way to check your answer. But you have to show you can do the calculation too.

- **ACADEMIC HONOR POLICY:** The Florida State University Academic Honor Policy outlines the University's expectations for the integrity of students' academic work, the procedures for resolving alleged violations of those expectations, and the rights and responsibilities of students and faculty members throughout the process. Students are responsible for reading the Academic Honor Policy and for living up to their pledge to ... be honest and truthful and ... [to] strive for personal and institutional integrity at Florida State University. (Florida State University Academic Honor Policy, found at <http://dof.fsu.edu/honorpolicy.htm>.)
- **AMERICANS WITH DISABILITIES ACT:** Students with disabilities needing academic accommodation should:
 - (1) register with and provide documentation to the Student Disability Resource Center; and
 - (2) bring a letter to the instructor indicating the need for accommodation and what type. This should be done during the first week of class.

This syllabus and other class materials are available in alternative format upon request.

For more information about services available to FSU students with disabilities, contact the:

Student Disability Resource Center; 108 Student Services Building
(850) 644-9566 (voice); (850) 644-8504 (TDD); sdrc@admin.fsu.edu
<http://www.disabilitycenter.fsu.edu/>