Math 31 – Calculus II Spring 2019

Instructor: Dr. Corey Shanbrom Email: corey.shanbrom@csus.edu

Office: Brighton 125

Office Hours: Mon 3-4pm, Weds 2-3pm, Thurs 1-2pm, or by appointment.

Prerequisites: Grade of C- or better in Math 30 or appropriate high school based AP credit. It is your responsibility to prove to me that you have met this prerequisite by the end of the first week of classes; any student who fails to do so will be dropped.

Lectures: I am teaching two sections of Math 31; this syllabus applies to both. Section 04: MWF 12-12:50pm in SQU 122 and Th 12-12:50pm in BRH 209 Section 11: MWF 11-11:50am in SQU 450 and Th 10:30-11:20am in BRH 209

Text: There is no required text for this class. The official text is <u>Calculus</u>, <u>Early Trascendentals</u>, James Stewart, 8th edition. This is the official text, but it is not necessary to succeed in this course. In fact, almost any other modern calculus book (including older editions of Stewart) will suffice. We will not be using any text directly, as this is a lecture-based course with online homework. However, I do recommend owning some calculus book for the nice pictures and worked examples. Further, we will be covering chapters 5-8 and 11 of Stewart and following the book's structure fairly closely. Also note that future calculus courses may require the 8th edition of Stewart.

Grading: Homework 25%, Midterms 45%, Final 30%. This is an approximation. Letter grades will be determined by a curve at the instructor's discretion.

Exams: There will be three midterms, each worth 15% of your final grade. No notes, books, electronic devices, or bathroom breaks will be permitted during any exam. Exam make-ups will be permitted only in the case of a documented emergency. Midterm dates will depend on our progress, but will be announced at least one week before the exam. The final will be comprehensive and held as follows:

Section 04: Wednesday, May 15, 10:15am-12:15pm Section 11: Monday, May 13, 10:15am-12:15pm

Homework: Your homework *answers are submitted and graded online* using WeBWorK, which you can access through our class Canvas page. All problems are multiple-choice. Detailed instructions appear on another document, entitled "How to submit your homework." Problem sets will be available on WeBWorK. Due dates will be announced in class and also posted to both Canvas and WeBWorK. Complete solutions to problem sets will be available after the due date. Completion of certain problems will require a basic calculator.

You must also turn in written work for each problem by the assignment's due date. I will skim this and provide some feedback on the quality and clarity of your work, as I would on an exam. Exams are not multiple choice, and these will be evaluated partly on the quality and clarity of your work. You must submit complete written work to earn full credit for each homework assignment. Late homework will be accepted at a penalty.

Resources: I am your primary sources for help with the material, but other resources are available. The Math Lab in Brighton 118 offers free drop-in tutoring from math majors, grad students, and sometimes faculty. It is open M-Th 9am-5pm and F 9am-1pm. You can and should form study groups; these can meet in the Math Lab as well. Other textbooks and websites (eg, Wikipedia, Mathworld, some Youtube) are helpful.

Peer Assisted Learning (PAL): There are optional sections (NSM 12F) that students can take concurrently with Math 31. These are offered several times per week (see class schedule). NSM 12F is a one-unit course, graded Credit/No Credit, which is facilitated by undergraduate students who have successfully mastered the material in Math 31. In these PAL sections, Math 31 students work in small groups on worksheets dealing with the course topics.

I strongly recommend taking a PAL to all students. Data show an average boost in course grade between 15% and 20%, regardless of demographics, background, etc.

Even if you do not enroll in NSM 12F, you may still go to the PAL facilitator office hours for help. PAL office hours are held in SQU 315 and the times will be posted outside my office and SQU 315 when they become available.

Catalog Description: MATH 30 continuation. Methods of integration; improper integrals; analytic geometry; infinite sequences and series.

General Education:

GE Area: B4 (Mathematical Concepts and Quantitative Reasoning)

Writing Component: This class has a writing component. This means that you will have to write. On every exam you will find questions that require a paragraph or two explaining a concept, theorem, or method.

Learning Outcomes: Solve problems by thinking logically, making conjectures, and construction valid mathematical arguments. Make valid inferences from numerical, graphical, and symbolic information. Apply mathematical reasoning to both abstract and applied problems, and to both scientific and non-scientific problems.

Remarks: If you have a disability and require accommodations, you need to provide disability documentation to SSWD, Lassen Hall 1008, and discuss your needs with me as soon as possible.

If you are experiencing challenges in the area of food and/or stable housing, Sacramento State offers basic needs support for students. Visit csus.edu/basicneeds.

Cheating of any type will result in disciplinary action and an automatic fail. This will show up on future background checks, grad school applications, etc. If you are unsure what constitutes cheating, please see Sac State's Academic Honesty Policy; I have provided a link on Canvas.