

Course Syllabus
Calculus I - Math 1420.04
Spring 2018

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| Class Meeting Time | MW 1:00-1:50 and TTH 12:30-1:50 |
| Class Meeting Place | LDB 402 |
| Instructor | Dr. John G. Alford |
| Office | LDB 417B |
| Phone | (936) 294-4663 |
| E-Mail | jalford@shsu.edu |
| Office Hours | MW 3:00-4:00, TT 10:00-11:00, or by appointment |

Description

This course provides an introduction to some of the fundamental concepts, skills, and applications of differential calculus. Special emphasis will be on applications of calculus to the life sciences. This course is 4 credits.

Course Pre-requisite

The pre-requisite for this course is any one of the following:

- Math 1410 (Pre-Calculus) with a grade of C or better,
- Math 1314 and Math 1316 with grades of C or better,
- A or B in high school A/B calculus,
- a score of 70% or better on the placement exam,
- consent of instructor.

Objectives

A successful student will attain mastery of the following topics:

- limits and continuity,
- the derivative,
- techniques for differentiation of algebraic, logarithmic, exponential and trigonometric functions,
- applications of the derivative and anti-differentiation,
- the definite integral,
- the Fundamental Theorem of Calculus

Textbook

Textbook: *Calculus for Biology and Medicine (Third edition)*,
Author: Claudia Neuhauser

Grade

Your final grade will be based on a weighted average of homework assignments, 3 biology applications, 3 exams, and a comprehensive final exam. The weights are as follows:

Homework Average: **15%** (drop the two lowest grades),

Biology Application Average: **10%** ,

Exam Average: **25%** each (drop the lowest exam grade),

Comprehensive Final Exam: **25%** (replaces lowest exam grade if it is greater)

Homework assignments (problems from the textbook) and worksheets will be posted on Blackboard. The final exam is not optional. Make-up exams and make-up homework assignments are only allowed in cases of excused absences (see attendance policy below). You cannot re-take an exam and there are no extra credit assignments.

Important Dates

- Spring Break is March 12-16.
- The last day to Q drop is Friday, April 6.
- The final exam is Wednesday, May 9, 2:30-4:30 p.m.

Calculator Requirements

I highly recommend having a graphing calculator for this course. You cannot use your phone as a calculator or borrow a calculator during an exam. You may not use a graphing calculator that has a computer algebra system (e.g. TI-89).

Additional Notes

- Attendance - You should attend all classes and are responsible for all notes, announcements, assignments, quizzes, and exams. You should notify me via phone message or email as soon as possible as to why you were not in class or will not be attending class. **An absence is excused only in cases of medical emergencies, death in the family, or school sponsored events. To excuse an absence, you must provide legitimate documentation (for example, a doctors note) no later than the day that you return to class.**
- Cell Phone Use: Use of cell phones (text messaging, social media browsing, etc.) are prohibited during class time except for notifications in cases of emergency. Repeated use of your cell phone in class may result in you being asked to leave class and/or losing the privilege of lowest homework/quiz grades being dropped. During an exam, your cell phone should be stored securely in such a way that it cannot be seen or used. The visible presence of such a device during an exam may result in a zero on the exam and is considered de facto evidence of cheating.

- Academic Honesty - The University expects all students to engage in all academic pursuits in a manner that is above reproach. Students are expected to maintain complete honesty and integrity in the academic experiences both in and out of the classroom. Any student found guilty of dishonesty in any phase of academic work will be subject to disciplinary action. [http : //www.shsu.edu/ vaf_www/aps/documents/810213.pdf](http://www.shsu.edu/vaf_www/aps/documents/810213.pdf)
- Religious Holy Days - Students are excused from attending classes or other required activities, including examinations, for the observance of a religious holy day, including travel for that purpose. As a courtesy, it is appreciated if you notify me in advance and in writing of the dates and times that are to be missed so that appropriate arrangements can be made regarding homework and/or exams. [http : //www.shsu.edu/ vaf_www/aps/documents/861001.pdf](http://www.shsu.edu/vaf_www/aps/documents/861001.pdf)
- Disability Issues - It is the policy of Sam Houston State University that individuals otherwise qualified shall not be excluded, solely by reason of their disability, from participation in any academic program of the university. Further, they shall not be denied the benefits of these programs nor shall they be subjected to discrimination. Students with disabilities that might affect their academic performance should register with the Office of Services for Students with Disabilities located in the Lee Drain Annex (telephone 936-294-3512, TDD 936-294-3786, and e-mail disability@shsu.edu). They should then make arrangements with their individual instructors so that appropriate strategies can be considered and helpful procedures can be developed to ensure that participation and achievement opportunities are not impaired.

SHSU adheres to all applicable federal, state, and local laws, regulations, and guidelines with respect to providing reasonable accommodations for students with disabilities. If you have a disability that may affect adversely your work in this class, then I encourage you to register with the SHSU Services for Students with Disabilities and to talk with me about how I can best help you. All disclosures of disabilities will be kept strictly confidential. NOTE: No accommodation can be made until you register with the Services for Students with Disabilities. For a complete listing of the university policy, see: <http://www.shsu.edu/dept/academic-affairs/documents/aps/students/811006.pdf>

- Classroom Etiquette - Students will refrain from behavior in the classroom that intentionally or unintentionally disrupts the learning process and, thus, impedes the mission of the university. Students are prohibited from eating in class, using tobacco products, making offensive remarks, reading newspapers, sleeping, talking at inappropriate times, wearing inappropriate clothing, or engaging in any other form of distraction. Inappropriate behavior in the classroom shall result in a directive to leave class. Students who are especially disruptive also may be reported to the Dean of Students for disciplinary action in accordance with university policy. [http : //www.shsu.edu/students/guide/StudentGuidelines2010 – 2012.pdf#page = 29](http://www.shsu.edu/students/guide/StudentGuidelines2010-2012.pdf#page=29)
- Visitors in the Classroom - Only registered students may attend class. Exceptions can be made on a case-by-case basis. In all cases, visitors must not present a disruption to the class by their attendance.