MATH 151 – 501-503: Engineering Mathematics I, Spring 2012

Class: http://www.math.tamu.edu/~jhauenst/math151
Dept: http://www.math.tamu.edu/courses/math151
8:00 – 8:50 am MWF
HELD 111

Instructor: Dr. Jonathan Hauenstein

Office Hours: Milner 123   **Math dept phone:** (979) 845-7554
M: 9:00 – 10:00, R: 10:15 – 12:00   **Email:** jhauenst@math.tamu.edu
Other times by appointment or drop-in

Teaching Assistant: Bingbing Ji   **Email:** iice@math.tamu.edu
Blocker 605AX

Textbooks: *Calculus, Early Vectors.* Stewart, 1999.
MATLAB: An Introduction with Applications, 4th Edition. Gilat, 2010.

Content: This course provides students with quantitative and problem-solving skills of 2-dimensional vectors and differential calculus. At the conclusion of the course, students should be able to:
- know and use techniques of differentiation,
- apply techniques of differentiation to a variety of applications, including engineering applications,
- understand and apply vector operations in 2-dimensions, including dot product,
- understand the relationship between derivatives and integrals via the Fundamental Theorem of Calculus, and
- use computer algebra systems, such as MATLAB, to solve non-routine problems.

Collaboration: Collaboration is encouraged in this course. However, <u>copying someone else's work is not acceptable</u> and this act of academic dishonesty will be prosecuted following University policy.

Attendance: Daily attendance for class lectures is expected, but I will not take attendance directly. However, please note that, in this class, there is a strong correlation between class absences and poor grades.

Homework: Homework is designed to help students understand the material and to prepare them for the exams. Homework is handled through WebAssign http://www.webassign.net/tamu/login.html and is due each Monday at 11:55 pm. Since the four lowest scores will be dropped, no late homework will be accepted.

Suggested Homework: For additional homework problems, see http://www.math.tamu.edu/courses/math151/currenthw.html

MATLAB: All assignments must be turned in at the beginning of the lab session. Since the lowest score will be dropped, no late assignments will be accepted.

Quizzes: Quizzes will be given in the recitation session each week in which there is not an exam. The two lowest quiz scores will be dropped. The make-up policy is stated below.

Exams: There will be 3 common exams and a comprehensive final exam.

Exam schedule:
- First exam: Thursday, February 16th, 7:30 – 9:30 pm
- Second exam: Thursday, March 22nd, 7:30 – 9:30 pm
- Third exam: Tuesday, April 24th, 7:30 – 9:30 pm
- Final exam: Wednesday, May 9th, 10:30 am – 12:30 pm

Please bring your Aggie Card when taking your exams.

Scantron: By February 1st, you must give me 4 of the 882-E Scantron forms (long green) which I will bring to the exams for you. Five points will be deducted from the first exam if they are not turned in by February 1st. If you drop the course, you may pick up your remaining Scantron forms from the instructor's office.

Calculator: No calculators (or other electronic devices) may be used on quizzes or exams.

Grading: The final grade will be computed using the follow weights.

eHomework	9 %
MATLAB Assignments	6 %
Quizzes	10 %
Exams (3 – weighted equally)	50 %
Final Exam	25 %

The grading scale is as follows.

A	90 % and above
B	80 % – 89.9 %
C	70 % – 79.9 %
D	60 % – 69.9 %
F	Below 59.9 %

I reserve the right to possibly consider attendance and other factors (e.g., final exam score) for border line cases.

Make-up quizzes and exams: Make-up quizzes and exams will only be given with written evidence of an official University excused absence. Section 7.3 of the University Student Rules says that for an absence "to be excused the student must notify his or her instructor in writing (acknowledged email message is acceptable) prior to the date of absence if such notification is feasible. In cases where advance notification is not feasible (e.g., accident or emergency) the student must provide notification by the end of the second working day after the absence. This notification should include an explanation of why notice could not be sent prior to the class."

Return of Exams: The first three exams will be returned in class unless a student informs the instructor in writing (via email) by February 1st. In this case, the student will need to pick up the exam in the instructor's office.

Incompletes: Incompletes will be considered if all but a small portion of the class has been successfully completed and are prevented from completing the course by a severe, unexpected, and documented event. Students who are simply behind in their work should consider dropping the course.

Disabilities: The American with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protections for persons with disabilities. Among other things, this legislation provides that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you believe you have a disability requiring an accommodation, please contact Disability Services, Cain Hall, Room B118, (979) 845-1637. For additional information, visit http://disability.tamu.edu.

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Honor Code: "An Aggie does not lie, cheat or steal, or tolerate those who do." For additional information, visit http://www.tamu.edu/aggiehonor.

Additional help: Week in review: http://www.math.tamu.edu/courses/weekinreview.html
Amy Austin's videos: http://www.math.tamu.edu/~austin/wirmath151.html
Calclab information: http://calclab.math.tamu.edu/
Help sessions: http://www.math.tamu.edu/courses/helpsessions.html
Free tutoring: http://tutor.tamu.edu/
Old exams: http://www.math.tamu.edu/courses/math151/common-exams/

Other websites: Campus emergency: http://studentaffairs.tamu.edu/emergency
Department of Mathematics: http://www.math.tamu.edu
Student Rules: http://student-rules.tamu.edu