

**MAT 414**  
**Introduction to Ordinary Differential Equations**  
**Summer Session 1, 2014**

MTWTh 2:00 pm - 3:45 pm Hall of Languages 215

**Instructor:** Professor Suanne Au  
**Office:** Carnegie 207

**Phone:** 443-1498  
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**Office Hours:** MTWTh 4:00 - 5:00 pm

**Mathematics Prerequisite:** MAT 397 or graduate standing in mathematical sciences. Credit will not be given for both MAT 414 and 485. Students are expected to be able to take partial derivatives, set up and evaluate integrals, and do integration by parts.

**Textbook:** *Elementary Differential Equations*, 10th edition, by Boyce and DiPrima. (ISBN 9780470458327)

**Calculator Policy:** You are allowed to use a graphing calculator (such as TI-83) on all quizzes and exams. Symbolic calculators (such as TI-89) may not be used.

**Course Description:** We will cover parts of Chapters 1-3, 6, and 7. We will study differential equations of first and second order and also systems of first-order equations. A number of methods, including the Laplace transform, will be used to solve such equations and to understand the behavior of solutions. Applications in sciences and engineering will also be considered.

**Grading:** We will have a quiz every Thursday and a final exam on the last class day:

Quiz 1: Thu, May 22  
Quiz 2: Thu, May 29  
Quiz 3: Thu, Jun 5  
Quiz 4: Thu, Jun 12  
Quiz 5: Thu, Jun 19  
Final Exam: Thu, Jun 26

Each quiz is counted as 15% of your grade for the course, and the final exam is worth 25%.

**Attendance:** You are expected to attend and participate in class. Missing class is the most common reason for poor performance in the course. If you must miss a class, you are responsible for obtaining notes for that class from a student who attended. It is also your responsibility to find out about any announcements made in class.

**Students with Disabilities:** If you believe that you need accommodations for a disability, please contact the Office of Disability Services (ODS) at

<http://disabilityservices.syr.edu>

located in Room 309 of 804 University Avenue, or call (315) 443-4498 for an appointment to discuss your needs and the process for requesting accommodations. ODS is responsible for coordinating disability-related accommodations and will issue students with documented Disabilities Accommodation Authorization Letters, as appropriate. Since accommodations may require early planning and generally are not provided retroactively, please contact ODS as soon as possible. You are also welcome to contact me privately to discuss your academic needs although I cannot arrange for disability-related accommodations. Making arrangements with ODS takes time. Do not wait until just before the first test.

**Academic Integrity:** The Syracuse University Academic Integrity Policy holds students accountable for the integrity of the work they submit. Students should be familiar with the Policy and know that it is their responsibility to learn about instructor and general academic expectations with regard to proper citation of sources in written work. The policy also governs the integrity of work submitted in exams and assignments as well as the veracity of signatures on attendance sheets and other verifications of participation in class activities. Serious sanctions can result from academic dishonesty of any sort. For more information and the complete policy:

[http://supolicies.syr.edu/ethics/acad\\_integrity.htm](http://supolicies.syr.edu/ethics/acad_integrity.htm)

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**Religious Observances Policy:** SU religious observances policy recognizes the diversity of faiths represented among the campus community and protects the rights of students, faculty, and staff to observe religious holidays according to their tradition. Under the policy, students are provided an opportunity to make up any examination, study, or work requirements that may be missed due to are religious observance provided they notify their instructors before the end of the second week of classes. For fall and spring semesters, an online notification process is available through MySlice (Student Services → Enrollment → My Religious Observances) from the first day of class until the end of the second week of class. Related link:

[http://supolicies.syr.edu/studs/religious\\_observance.htm](http://supolicies.syr.edu/studs/religious_observance.htm)

**Getting Help:** Your instructor will be holding regular office hours and will make appointments with students having class conflicts with their scheduled office hours. In addition, the Mathematics Department offers regular math clinics. These will be set up by the second day of classes and will be posted outside the math office.

**Cell Phones:** all electronic devices other than the calculator should be turned off and put away during class. Calculators on cell phones are not to be used on tests or quizzes.