

## Course Outline

### MATH 246    Spring 2013    M. Jakobson

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<http://www.math.umd.edu/~mvy>  
Office hours : T,Th 11:15 - 12:15

**Prerequisite:** Math 141 or equivalent

**Texts:** Boyce & DiPrima, *Elementary Differential Equations*, 9th ed. [B&DiP]  
BHunt *et. al.*, *Differential Equations with MATLAB*, 3d ed. [DEwM]

**Syllabus:**

<u>Chapter in B&amp;DiP</u>	<u>Sections</u>	<u>Corresponding Chapters in DEwM</u>
1	1-4	1-4
2	1-8	5-7
8	1-2	8-10
3	1-8	11
6	1-4	13
7	1-8	14
9	1-5	15

**Homework:** Homework problems from the text will be assigned, but *not* collected. Selected problems will be discussed in class.

**MATLAB:** The mathematical software package *MATLAB* is an important element of the course. We will use *MATLAB* in analyzing and producing solutions of differential equations. Instructions for using *MATLAB* are presented in DEwM .

**Tutoring:** For information see [http : //www.math.umd.edu/undergrad](http://www.math.umd.edu/undergrad)

**Collaboration:** You'll work together in small groups on the *MATLAB* problem sets. Then you'll hand in a single solution to the problem set with the names of all group members on it.

You'll submit matlab projects printed on paper (not on the web ). You find info about printing at <http://www.helpdesk.umd.edu/>

**Grading:** There will be a total of 700 points available in the course, allocated as follows.

1. Three exams, each worth 100 points, see tentative dates below.
2. Several quizzes worth total 100 points.
3. Five graded *MATLAB* assignments, each worth 20 points. Tentative due dates for the submission of these problem sets are provided below.

4. Please note that for a makeup a written explanation from a doctor will need to be provided. With the proper explanation the next test will be the makeup for the missed quiz : i.e. the grade will be scaled up to reflect the missing score, and Final will be the makeup for the missed exam.
5. A 2-hour cumulative final exam worth 200 points.
6. The grades will be awarded by  
90%+ A, 80-89% B, 70-79% C, 60-69% D, 0-59% F.

**Tentative Schedule of Exams and *MATLAB* Assignment Due Dates**

<u>Exam or Assignment</u>	<u>Date</u>
Problem Set B	2/15
Exam # 1	2/21
Problem Set C	3/1
Problem Set D	3/29
Exam # 2	4/4
Problem Set E	4/12
Exam # 3	4/30
Problem Set F	5/3