Instructor: Ed Rothwell, C133 ER, 355-5231, rothwell@egr.msu.edu
Office Hours: MWF 10:00-10:50, 2234 EB (EM lab)
Web site: http://www.egr.msu.edu/~rothwell

2. MSU course notes: http://www.egr.msu.edu/em/research/goali/notes/


Grading: Homework 20%
Exam 1 20%
Exam 2 20%
Project 1 20%
Project 2 20%

Suggested References


Exam dates----
Exam 1: Monday, February 25, 4:10-5:30 PM, 1225 EB
Exam 2: Wednesday, May 1, 5:45-7:45 PM, 1225 EB

OTHER IMPORTANT DATES:
1/11 close of free add period
2/1 end of tuition refund period
2/27 MIDDLE OF SEMESTER – last day for withdrawal or dropping courses with no grade reported
EE 491: Electromagnetic Compatibility

Preliminary Course Outline ---------------------------------------------

1. Introduction
2. Fundamental Behavior of Electrical Systems
3. Signals and Spectra
4. General Formulation of Electric Circuit Theory
5. Non-ideal Behavior of Circuit Components
6. Antennas
7. Modulation and the Measurement of Signals
8. EMC Regulations
9. Conducted Emissions
10. Conducted Immunity
11. Radiated Emissions
12. Radiated Immunity
13. RF Network Analysis and Measurement Components
14. Cabling and Cross Talk
15. Shielding
16. Electrostatic Discharge (ESD)
17. System Design. Topics chosen from:
   A. Printed circuit board layout
   B. Grounding
   C. EMC filter design

Note: The above outline is subject to revision at the discretion of the instructor.