

EE433 Course Policies

EE 433 – Wireless and Cellular Communication Systems – Fall 2008

| | | | | |
|-----------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|----------------------------------------------------------|----------|
| Instructor: | Dr. Christopher R. Anderson | 318 Maury Hall | canderso@usna.edu | 293-6185 |
| Time & Location: | Section 6521: MWF-6, Th-5&6 | Rickover 064 / 071 | | |
| Textbook: | <u>Wireless Communications: Principles and Practice, 2nd Edition</u> by Theodore S. Rappaport. | | | |
| Office Hours: | MWF 3 rd & 5 th Period, Th 4 th Period. Additionally, you are welcome to drop in any day other than Tuesday, but it is generally a good idea to call/email in advance. | | | |

Course Description: An in-depth study of wireless and cellular systems. This study includes system design, mobile radio propagation (large-scale path loss, small-scale fading, and multipath), and modulation techniques for mobile radio. A working knowledge of the characteristics of the three major cellular/PCS systems in use in the U.S. today is also developed. Technical discussions of recent topics/publications related to the course material are also conducted. Laboratory experiments emphasize indoor and outdoor RF propagation measurements. A final project is required in lieu of a final examination.

Absences: Students are responsible for all material covered in class, whether or not they are present. Students who are absent should make arrangements to obtain copies of the lecture notes from a classmate. Students will be expected to study the notes and the relevant sections of the textbook **prior** to requesting EI from the instructor. You must notify the instructor well in advance if you are going to be absent for any exam.

Announcements and Information: Students will be expected to access class resources via the Internet. A detailed course syllabus, assignments, homework solutions, grades, etc. will be posted on the main course website (www.usna.edu/EE/EE433) and on Blackboard.

Homework Assignments and Grading: Homework is assigned and due as specified on the Syllabus. Whether or not you attend class, you are responsible for turning in homework assignments on time. Late homework (defined as homework turned in after the end of the class period in which it is due) will not be accepted, except in the case of a valid excused absence (e.g., Precoms, SIQ, etc)! Students that know ahead of time that they will be missing a class period should contact the instructor as soon as possible prior to the homework due date. Homework sets will be graded in class as indicated on the syllabus, with the grading scale TBD.

Project Information: EE433, and the follow-on EE434, are both project-based classes. These projects are designed to provide you with the opportunity to study one or more aspects of wireless communications in significantly greater detail than will be covered in either the class or the textbook.

Section Leader: The Section Leader will be appointed by the instructor and will be responsible for taking attendance for each class. At the start of the class, the Section Leader will call the section to attention and report by name the individuals that are absent. During class the Section Leader will update the attendance book to account for any tardy students or any students that may leave early. The class will be called to attention by the Section Leader for dismissal at the end of the period. In the event that the instructor/professor is late for class in excess of 10 minutes, the Section Leader will contact the EE Dept. Office at x3-6150. Pending the arrival of someone to take charge of the class, the Section Leader will supervise the class in a study period, will collect any homework due for that period, and will deliver the homework to the EE Department Office at the end of the period if no instructor arrives. The section leader will also be responsible for providing a written report of attendance and keeping track of bonus points earned by midshipmen during the class period.

Honor Concept: The Honor Concept will be observed in this class. If there are any questions related to the Honor Concept and its applicability to any assigned work, please contact the instructor for clarification. Unless otherwise directed by the instructor, all graded work is expected to be the original work of the student or, in the case of authorized group assignments, the entire group. Giving or receiving unauthorized assistance on a graded assignment is a violation of the Honor Concept.

Mid-Semester Grade Weightings

| 6 Week Grade | | 12-Week Grade | | 16-Week Grade | |
|---------------------|-----|----------------------|-----|----------------------|-----|
| Exam 1 | 35% | Exam 1 | 25% | Exam 1 | 20% |
| Project Proposal | 5% | Project Proposal | 5% | Exam 2 | 20% |
| 6-Week Project | 30% | 12-Week Project | 30% | Project Proposal | 5% |
| Milestones | | Milestones | | | |
| Class Participation | 15% | Project Status | 15% | Class Participation | 10% |
| | | Report 1 | | | |
| HW | 15% | Class Participation | 10% | HW | 15% |
| | | HW | 15% | Project Status | 15% |
| | | | | Report 1 | |
| | | | | Project Status | 15% |
| | | | | Report 2 | |

Final Grade Weightings

| | | |
|---------------------------|-----|------|
| Exam (Higher Score) | 20% | |
| Exam (Lower Score) | 10% | |
| Class Participation | 10% | |
| Homework | 10% | |
| Project | 50% | |
| • Project Proposal | | 5% |
| • Project Status Report 1 | | 7.5% |
| • Project Status Report 2 | | 7.5% |
| • Project Written Report | | 15% |
| • Project Presentation | | 15% |