

PHYS 306 - Spring, 2010
Wave Motion and Electromagnetic Radiation
Syllabus

Prerequisites: PHYS 262, Math 214

Credits: 3

Date: Tuesday and Thursday

Time: 1:30 PM - 2:45 PM

Location: Science and Technology I, room 310

Instructors: Prof. Jie Zhang

Contact Info: (703)993-1998 (phone), izhang7@gmu.edu (e-mail)

Office Hour: 3:00 PM to 4:00 PM, Tuesday and Thursday, or by appointment

Office: Room 351, Research Bldg 1

Class URL: http://solar.gmu.edu/teaching/2010_PHYS306/index.html

Description: Vibrating string, plane waves, interference, diffraction, polarization, electromagnetic waves, dispersion, and relativity

Text Book (required): "Optics" by Ajoy Ghatak, 2010, published by McGraw-Hill (ISBN 978-0-07-338048-2)

Homework: Homework problems will be assigned roughly weekly, and will be sent to you by email and posted online. Homework are due at the beginning of the class on the due day. You are encouraged to work on your homework assignments together in small groups, BUT copying homework from each other is not permitted. Full marks will only be given for homework where the full work is shown. Because homework solutions will be posted online promptly, no late homework will be accepted, except with a VALID medical excuse. The lowest homework grade will be dropped.

Exams: Two tests and one final exam. All exams are closed-book. Calculators will be needed for quantitative problems. It is the responsibility of each student to attend classes during scheduled examinations as listed in the syllabus regardless of work or family considerations. Make-up exams will be given only to students with a VALID medical excuse and they should contact the instructor as soon as possible. The final exam will be comprehensive.

Grading: Homework = 30%, Tests = 22.5% each, Final Exam = 25%