EE420 Fourier Optics

Fall 2012

Prerequisite: EE 320 or equivalent, Familiar with Fourier Transform

Instructor:
Zhiwen Liu
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Times & location:
Tuesday & Thursday 9:45 am – 11:00 am at 109 EE West

Office hours:
Wednesday 4:00 pm - 5:00 pm, Thursday 4:00 pm – 5:00 pm, or by appointment

Textbook:
Introduction to Fourier Optics (J. W. Goodman)

Topics:
- Two dimensional Fourier transform
- Diffraction
- Fourier transform lens
- Imaging (lens, holography, novel imaging techniques)
- Introduction to fiber optics
- Special topics and lab demos

Policies:
1. Grading policy:
   Homework 30%, midterm 30%, Final 40%
2. Homework Policy:
   ✓ Put your name and the course number on the right upper corner of the first page. Staple all the pages together. Write down your solution clearly.
   ✓ Collaboration is allowed but you must write down your own solution.
   ✓ Homeworks are due one week after the assignment. They will be collected in class. Late homework will not be accepted unless approved by the instructor.
3. Exam policy:
   ✓ Both midterm and final exams will be close-book. No collaborations are allowed.
   ✓ In case of an illness, doctors’ note is required.
   ✓ In case of a conflict schedule, the instructor must be notified two weeks in advance.