

PHYSICS 203B (2011)
Course Description

Instructor

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Assistant:
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Lectures

Tu, Th 9:30—10:50 Mayer Hall Addition 2623

Homework

Will be assigned during lecture, and solutions will be posted on the web at
<http://physics.ucsd.edu/students/courses/spring2011/physics203b/>

Close cousins to the homework problems will appear on the mid-terms and final.

Grade

Mid-Term	Mid-Term	Final
25%	25%	50%

Lecture notes will be posted on web at
<http://physics.ucsd.edu/students/courses/spring2011/physics203b/>

Texts

1. *Classical Theory of Fluids* by Landau and Lifshitz
2. *Classical Electrodynamics* by Jackson

Outline

1. Boundary value problems in electrostatics and magnetostatics
2. Electromagnetic waves and geometrical optics
3. Drude model for $\epsilon(\omega)$
4. Magnetic diffusion and skin depth
5. Wave guides
6. Radiation