

Waves, Kinetic Theory, and Relativity

College of Creative Studies
University of California, Santa Barbara

This is the third of 6 courses in the CCS Physics sequence and is required for all CCS Physics majors. Topics to be covered include:

- Fourier Analysis
- Sound waves
- Fluid dynamics
- Kinetic theory of matter
- The Maxwell-Boltzmann distribution
- Specific heat
- The special theory of relativity

Prerequisites: PHYS CS 32 or consent of instructor

Lecture:

Time: Tues/Thurs 3:30 - 4:50 p.m.

Place: BLDG 387, room 101

Instructor: Dr. Ilan Ben-Yaacov, ESB Room 2213, ext 5295, ilan@engineering.ucsb.edu

Office Hours: Tuesday 1:30 - 3:15pm in ESB 2213

Problem Sessions:

Time / Place: Wed 1:00 - 2:50 p.m., BLDG 387, room 101

Wed 3:00 - 4:50 p.m., BLDG 387, room 101

Instructor: Dr. Francesc Roig, roig@physics.ucsb.edu

Office Hours: Wed 10:00am - 12:00pm in BROIDA Room 6139

Teaching Assistant: James Garrison, garrison@physics.ucsb.edu

TA office hours: Tues 6:00-8:00pm in CCS Room 145

Grader: Kathryn McGill, kmcgill@umail.ucsb.edu

Grader office hours: Mon 6:00-8:00pm in CCS room 145

Required Texts: *Physics*, 5th edition, by Resnick, Halliday, and Krane, 2002, ISBN 0-471-32057-9
An Introduction to Mechanics, by Kleppner and Kolenkow, 1973, ISBN 0-07-035048-5

Class Web Page: <http://my.ece.ucsb.edu/PHYSCS33>