

# Electricity and Magnetism I Fall 2021

## Syllabus

The following schedule is tentative and subject to change, except for the dates of the midterm and final exams, which are fixed.

We will use the textbook by Griffiths, "Introduction to Electrodynamics", 4th Edition. We will cover chapters 1 (Mathematical review), 2, 3 (Electrostatics and potentials), 5 (Magnetostatics), 7 (Electrodynamics; Maxwell's equations), 8 (Conservation laws), half of chapter 9 (Electromagnetic waves in vacuum), and 12 (Special relativity). The tentative course progression is outlined below. You are encouraged to read the book chapters before or shortly after class.

Lecture dates	Book chapters	Homework
Wed 9/8	chapter 1	
Mon 9/13 & Wed 9/15	2.1, 2.2	HW1 due Wed 9/15
Mon 9/20 & Wed 9/22	2.3, 2.4	HW2 due Wed 9/22
Mon 9/27 & Wed 9/29	2.5, 3.1	HW3 due Wed 9/29
Mon 10/4 & Wed 10/6	3.2, 3.3, 3.4	HW4 due Wed 10/6
<b>Tue 10/12</b> & Wed 10/13	5.1, 5.2	HW5 due Wed 10/13
Mon 10/18 & Wed 10/20	5.3, 5.4	HW6 due Wed 10/20
Mon 10/25 & Wed 10/27	review, midterm exam	<b>midterm on Wed 10/27</b>
Mon 11/1 & Wed 11/3	7.1, 7.2	HW7 due Wed 11/3
Mon 11/8 & Wed 11/10	7.3, 8.1	HW8 due Wed 11/10
Mon 11/15 & Wed 11/17	8.2, 8.3	HW9 due Wed 11/17
Mon 11/22 & Wed 11/24	9.1, 9.2	HW10 due Wed 11/24
Mon 11/29 & Wed 12/1	12.1, 12.2	<i>No HW due after Thanksgiving</i>
Mon 12/6 & Wed 12/8	12.3	HW11 due Mon 12/6
Mon 12/13	review	HW12 due Mon 12/13
Fri 12/17	final exam	<b>Final exam Fri 12/17 12pm-1:50pm</b>