		Lecture topics	Laboratory topics/goals	required reading	HW	supplemental reading*	misc
W	24-Aug	introduction; math review; electric charge	Arduino introduction; protoboards		HW1 out	Feynman I.4-12, II.2-4	
F	26-Aug	electric forces & fields 1	Arduino examples / blinkenlights	HR 21.1-6	HW1 due / HW2 out	Feynman II.4	
M	29-Aug	electric forces & fields 2	basic Ardunio I/O	HR 22.1-9		Feynman II.5-7	
W	31-Aug	Gauss' law 1	sensors & feedback	HR 23.1-9		Feynman II.5-7	last day to drop **without** 'W'
F	2-Sep	Gauss's law 1; electric potential 1	*take home:* get arduino working at home	HR 24.1-7	HW2 due / HW3 out	Feynman I.13-14 II.6-7	
M	5-Sep	**LABOR DAY - NO CLASS**					
W	7-Sep	electric potential 2	sensors & feedback	HR 24.8-12		Feynman II.6-7	
F	9-Sep	**EXAM 1**					
M	12-Sep	potential, conductors, current	resistors & LEDs	HR 26.1-6	HW3 due / HW4 out	Feynman II.5-7	
W	14-Sep	current, resistance, dc circuits 1	circuit construction	HR 26.7-9; 27.1-5		ph102 notes; H&H	
F	16-Sep	dc circuits 2		HR 27.6-8	HW4 due / HW5 out	ph102 notes; H&H	
M	19-Sep	transistors	transistors	HR 41.9-11		ph102 notes; H&H	
W	21-Sep	capacitance & dielectrics 1	transistor circuits	HR 25.1-5		Feynman II.10-11	
F	23-Sep	capacitance & dielectrics 2		HR 25.6-8	HW5 due / HW6 out	Feynman II.10-11	
M	26-Sep	magnetic fields	further transistor circuits	HR 28.1-6		Feynman II.13-14, 29	
W	28-Sep	magnetic fields	integrators, differentiators, filters	HR 28.7-10		Feynman II.13-14, 29	
F	30-Sep	magnetic fields		HR 29.1-6	HW6 due / HW7 out	Feynman II.13-14, 29	
M	3-Oct	induction 1	oscillators	HR 30.1-7		Feynman II.16-17	
W	5-Oct	induction 2	op amps	HR 30.8-12		Feynman II.16-17	
F	7-Oct	**EXAM 2**					
M	10-Oct	ac circuits & impedance	amplifiers and modulation	HR 31.1-11	HW7 due / HW8 out	Feynman II.22-3; H&H; ph102 notes	
W	12-Oct	circuit analysis	op amp circuits			H&H; ph102 notes	MIDTERM GRADES DUE
F	14-Oct	maxwell's equations 1		32.1-5	HW8 due / HW9 out	Feynman II.18	
M	17-Oct	maxwell's equations 2	timers	32.6-11		Feynman II.20-21	
W	19-Oct	relativity 1	timers	37.1-5		ph102 notes; Feynman I.15-16, II.25-27	
F	21-Oct	relativity 2		37.6-12	HW 9 due / HW10 out	ph102 notes; Feynman I.15-16, II.25-27	
M	24-Oct	EM waves 1	mid-semester circuit project	33.1-5		Feynman II.20-21	
W	26-Oct	EM waves 2	mid-semester circuit project	33.6-10		Feynman II.20-21	
F	28-Oct	**NO CLASS**			HW 10 due / HW 11 out		
M	31-Oct	moving charges & radiation	mid-semester circuit project	notes		notes provided; Feynman I.28, 32	
W	2-Nov	radiation	mid-semester circuit project	notes		notes provided; Feynman I.28, 32	last day to drop **with** 'W'
F	4-Nov	scattering		notes	HW 11 due / HW12 out	notes provided; Feynman I.28, 32	
M	7-Nov	images 1	final project research; selection due	34.1-5		Feynman I.26-27	
W	9-Nov	images 2	final project work; description due	34.6-9	final project description	Feynman I.26-27	
F	11-Nov	images 3			HW12 due / HW13 out	Feynman I.26-27	
M	14-Nov	interference 1	final project work; parts list due	35.1-4	final project parts list	Feynman I.29	
W	16-Nov	interference 2	final project work; progress memo due	35.4-8		Feynman I.29-30	
F	18-Nov	**EXAM 3**					
M	21-Nov	diffraction 1	final project work	36.1-6	HW13 due / HW14 out	Feynman I.30	
W	23-Nov	**NO CLASS**					
F	25-Nov	**NO CLASS**					
M	28-Nov	diffraction 2	final project work	36.7-10		Feynman I.30	
W	30-Nov	Drude model of conductivity	final project work; progress report due	notes	HW14 due	TBD	
F	2-Dec	**EXAM 3**			final project progress report "due"		
M	5-Dec	final project demonstrations	final project demonstrations				
W	7-Dec	information processing & storage	final project demonstrations			notes provided	
F	9-Dec	TBD			take-home final given out		
	12-16 Dec	**TAKE-HOME FINAL**					

* Feynman = "The Fenyman lectures on physics"; H&H = Horowitz & Hill, "The art of electronics"; ph102 notes at http://faculty.mint.ua.edu/~pleclair/ph102/Notes/