

Physics 100
Fall 2010
MWF 1330-1420 in PSB 217

Text: Physics Concepts and Connections, 5th ed. by Art Hobson
** electronic version at <http://www.coursesmart.com/0321662555/?a=1773944> **
copy of printed text on reserve in Sinclair Library Wong AV Center ##
ask for Call Number: PC #524

Instructor: Michael Jones
Office/phone/e-mail: Watanabe 228, 956-2932, jonesm@hawaii.edu
Office hours: Monday & Tuesday 1100-1200 or after class
Web site: <http://www.phys.hawaii.edu/~mdj/physics100.html>

no	week	text sections
class	starting	
	23 Aug.	Overview, fundamentals 1.1-1.2, 1.4-1.8; + 1st half of Galileo DVD 2.2, 2.4-2.5
	30 Aug.	Galileo & how objects move 2.6, Chap. 3 + 2nd half of Galileo DVD
M	6 Sept.	Newton & why objects move Chap. 4
	13 Sept.	gravity, Newton & Einstein Chap. 5; 11.1-11.2
	20 Sept.	work, energy, power Chap. 6
	27 Sept.	thermodynamics Chap. 7
MIDTERM 1 -- Friday 1 Oct. ** calculator + 1 page of notes allowed **		
	4 Oct.	electromagnetism Chap. 8
	11 Oct.	EM waves, climate change Chap. 9
	18 Oct.	Einstein & relativity Chap. 10
	25 Oct.	quantum phenomena Chap. 12; 13.1-13.2
	1 Nov.	quanta & atoms 13.5-13.7; 14.1-14.3
MIDTERM 2 -- Friday 5 Nov. ** calculator + 1 page of notes allowed **		
	8 Nov.	nuclei & radioactivity Chap. 14
	15 Nov.	fission & fusion 15.1-15.5
F	22 Nov.	nuclear weapons 15.6-15.8 & arms control
	29 Nov.	energy options Chap. 16
F	6 Dec.	review Epilogue

FINAL EXAM -- Monday 13 Dec. 1415-1615

grades: 10% homework & in-class questions (once per week)
+ 20% each midterm
+ 50% final exam

Physics 100 Student Learning Outcomes

Students are expected to understand the important physics concepts, the context in which they were developed, and their connections to society. This includes

- 1) understanding of the scientific process
- 2) ability to apply physics concepts
- 3) ability to use and understand quantitative data

The ultimate goal is for students to be able to think critically about issues involving physics as citizens in a technological society.