

Diagnostic Radiology Imaging Physics Course Syllabus 2007-2008

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Textbook: *The Essential Physics of Medical Imaging, 2nd edition*
Bushberg, Seibert, Leidholdt and Boone. Lippincott Williams & Wilkins, 2002.
Few copies of this book are available in the radiology library. The book can be purchased from www.amazon.com or www.bn.com for \$149 (new) or used for lower price.

Date	Week	5-6 PM in RR202	Reading
5-Jul-2007	1	Introduction to Medical Imaging Radiation and the Atom	Chapter 1 Chapter 2
12-Jul-2007	2	Interaction of Radiation with Matter	Chapter 3
19-Jul-2007	3	Interaction of Radiation with Matter (cont.)	Chapter 3
26-Jul-2007	4	Computers in Medical Imaging Computer Networks, PACS and Teleradiology	Chapter 4 Chapter 17
2-Aug-2007	5	X-Ray Production, Tubes and Generators	Chapter 5
9-Aug-2007	6	X-Ray Production, Tubes and Generators (cont.)	Chapter 5
16-Aug-2007	7	Screen-Film Radiography	Chapter 6
23-Aug-2007	8	Screen-Film Radiography (cont.)	Chapter 6
30-Aug-2007	9	Image Quality	Chapter 10
6-Sep-2007	10	Image Quality (cont.)	Chapter 10
Board Format Quarterly Quiz #1 (outside of class)			
13-Sep-2007	11	Digital Radiography	Chapter 11
20-Sep-2007	12	Digital Radiography (cont.)	Chapter 11
27-Sep-2007	13	Radiation Protection	Chapter 23
4-Oct-2007	14	Radiation Biology	Chapter 25
11-Oct-2007	15	Radiation Biology (cont.)	Chapter 25
18-Oct-2007	16	Radiation Dosimetry	Chapter 24
25-Oct-2007	17	Fluoroscopy	Chapter 9
1-Nov-2007	18	Radiation Safety in Fluoroscopy	Handout
8-Nov-2007	19	X-ray and Fluoro Lab 1	
15-Nov-2007	20	X-ray and Fluoro Lab 2	
22-Nov-2007	21	Holiday - Thanksgiving	

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29-Nov-2007	22	Ultrasound Board Format Quarterly Quiz #2 (outside of class)	Chapter 16
6-Dec-2007	23	Ultrasound (cont.)	Chapter 16
13-Dec-2007	24	Ultrasound (cont.)	Chapter 16
20-Dec-2007	25	Computed Tomography	MD Faculty
27-Dec-2007	26	Holiday Break - No Class	
3-Jan-2008	27	Ultrasound - Clinical Lecture & Lab	Chapter 13
10-Jan-2008	28	Computed Tomography (cont.)	Chapter 13
17-Jan-2008	29	Computed Tomography (cont.)	Chapter 13
24-Jan-2008	30	Computed Tomography Lab	
31-Jan-2008	31	No Class (Ski Day)	
7-Feb-2008	32	No Class (ACR In-Training Exam)	
14-Feb-2008	33	CT - Clinical Lecture Board Format Quarterly Quiz #3 (outside of class)	MD Faculty
21-Feb-2008	34	Mammography	Chapter 8
28-Feb-2008	35	Mammography (cont.)	Chapter 8
6-Mar-2008	36	Mammography Clinical Lecture	MD Faculty
13-Mar-2008	37	NMR	Chapter 14
20-Mar-2008	38	NMR (cont.)	Chapter 14
27-Mar-2008	39	NMR (cont.)	Chapter 14
3-Apr-2008	40	MRI	Chapter 15
10-Apr-2008	41	MRI (cont.)	Chapter 15
17-Apr-2008	42	MRI (cont.)	Chapter 15
24-Apr-2008	43	MRI (cont.)	Chapter 15
1-May-2008	44	MRI (cont.)	
8-May-2008	45	<i>MRI Advanced Techniques</i>	
15-May-2008	46	Q&A Review (all topics) Board Format Quarterly Quiz #4 (outside of class)	
22-May-2008 through 3-Jul-2008	47	Nuclear Medicine Physics Lectures begin (more information coming)	