2012학년도 1학기
Quantum Mechanics I (영강) (PHY505)
강의계획서

<과목개요>

We study essential concepts of quantum physics.

<학습목표>

We study Sakurai’s Modern Quantum Mechanics from Chapter 1 through Chapter 3.

<추천 선수과목 및 수강요건>

undergraduate courses Classical Mechanics, Electromagnetism, Quantum Mechanics I and II, Mathematical physics

<수업자료(교재)> 반드시 기입해 주십시오.

Main textbook * J. J. Sakurai, Jim Napolitano Modern Quantum Mechanics, 2nd edition Addison-Wesley Pub. Co, (2010)

<참고문헌 및 참고자료> 반드시 기입해 주십시오.

References * Baym, Gordon Lectures on Quantum Mechanics W. A. Benjamin/Cummings (1973)

<과제물>

One problem set each week

<주별 학습 내용>

week	period	part	text	
1	03.01 - 03.02	Fundamental Concepts	Ch.1 Sakurai	
2	03.05 - 03.09	Fundamental Concepts	Ch.1 Sakurai	

3	03.12 - 03.16	Fundamental Concepts	Ch.1 Sakurai	
4	03.19 - 03.23	Fundamental Concepts	Ch.1 Sakurai	
5	03.26 - 03.30	Quantum Dynamics	Ch.2 Sakurai	
6	04.02 - 04.06	Quantum Dynamics	Ch.2 Sakurai	
7	04.09 - 04.13	Quantum Dynamics	Ch.2 Sakurai	
8	04.16 - 04.20	Quantum Dynamics	Ch.2 Sakurai	
9	04.23	Mid-term Exam		
10	04.30 - 05.04	Theory of Angular Momentum	Ch.3 Sakurai	
11	05.07 - 05.11	Theory of Angular Momentum	Ch.3 Sakurai	
12	05.14 - 05.18	Theory of Angular Momentum	Ch.3 Sakurai	
13	05.21 - 05.25	Theory of Angular Momentum	Ch.3 Sakurai	
14	05.28 - 06.01	Theory of Angular Momentum	Ch.3 Sakurai	5.28 Buddha's Birthday
15	06.11 - 06.13	Theory of Angular Momentum	Ch.3 Sakurai	6.6 Memorial day
16	06.18	Final Exam		

<기타>

Homework 35%
Mid-term Exam 30%
Final Exam 30%
Attendance 5%==> 5-n. If n is greater than 5, then you will get F,
where n is the number of absence.