

ECE 353-001: Computer Architecture and Organization Syllabus - Fall 2009

ADMINISTRATION:

Instructor: Yanjia Sun E-mail: Yanjia.sun@njit.edu

Office: FMH 414

Office hours: Monday and Wednesday: 10:00am-12:30pm. Other time by appointment only

TEXTBOOK:

John D. Carpinelli, *Computer Systems Organization and Architecture*, Addison-Wesley, Boston, MA, 2001, ISBN # 0-201-61253-4.

PREREQUISITE:

ECE 252, ECE 395

OUTLINE:

Chapter	Topic	Week
3	Instruction Set Architectures	1
4	Basic Computer Organization	2
5	Register Transfer Languages	3,4
6	CPU Design - Hardwired Control, Test #1	4,5
7	Microsequencers Control Unit Design	6,7
8	Computer Arithmetic	8,9
9	Memory Organization	10,11
10	I/O Organization, Test #2	11,12
11	RISC Processing	13
12	Parallel Processing	14

NOTE: FINAL EXAM will be held during the week of December 11-17.

COURSE POLICIES

Absenteeism and participation: Every student must mark the attendant sheet after class every time. Your final grade may be adjusted upward or downward depending on class attendance and participation.

Homework submission: The written Homework is due at the end of the class on the due day. No late homeworks will be accepted. Homework assignments will be announced in class at least one week before the due date.

Presentation: Every student will complete a team project to do two in-depth presentations about this book. Every team can consist of three or four students, and selects two chapters from Chapter 5 to Chapter 12 as your topics by sortilege in the first class. Each member of a team is supposed to contribute equally to the project and, therefore, will receive the same grade for all assignments.

Intellectual Dishonesty: All submitted assignments would consist of only the student's own work. Seeking help from fellow students is encouraged; however, once your questions or problems are solved, you should go back to do your own work. Never ask others to do your work nor let others copy yours. If

copying is suspected everybody involved will receive a zero for the assignment.

Classroom Protocol: You are in a professional program and, in turn, are expected to “live” the role of a professional while in class. That means being on time in attendance and do not leave until you are dismissed. Turn off your cell phone and no clicking or typing while people are making presentation. Any noise from your cell phone or computer counts a violation.

GRADING

Homework: 20%	Presentation: 15%
Test 1: 15%	Test 2: 15%
Final Exam: 30%	Participation: 5%

Class Presentation Evaluation

		Needs Work				Very Good
Introduction	Previewed Main Points	1	2	3	4	5
	Gained Attention / Interest	1	2	3	4	5
Delivery	Established Rapport	1	2	3	4	5
	Speaking (Not Reading)	1	2	3	4	5
Organization	Logical Flow	1	2	3	4	5
Conclusion	Strong and to the Point	1	2	3	4	5
Content	Background / Development	1	2	3	4	5
	Main Points Discussed	1	2	3	4	5
	Analysis / Discussion	1	2	3	4	5
Fielding Questions	Clarity of Explanation	1	2	3	4	5

Total Points (50 Max.) _____

Comments:
