

EECS 281 Syllabus - Fall, 2004

Instructor: Prof. Francis Wolff Office: Olin 610 or 514, (216) 368-5038
Instructor Email: fxw12@case.edu Office Hours: 11:30-12:30 TR
Classroom: ROCK 301 T/R 10-11:15AM Recitation: will be announced in class.
Website: http://bear.ces.cwru.edu/eecs_281

Objective:

This course will provide students with knowledge about combinational logic, sequential circuits, programmable logic, state machines, computer architecture, and assembly language programming.

Prerequisites:

ENGR 131 (programming ability in a high-level language)
Knowledge of Boolean algebra, sets, relations, functions

Grading:

5 Exams: 24% each (only 4 count, average every 3 weeks), and 4% Homeworks.

Textbook:

Digital Design Practice & Principles, Third Edition Updated, 2001, John F. Wakerly
Prentice-Hall, Inc. ISBN 0-113-089896-1
Textbook web page: <http://www.ddpp.com/>

Tentative List of Topics :

<u>Chapter</u>	<u>Title/Topics (pages listed in parentheses)</u>
1,3	Introduction – (1-24), CMOS Digital Circuits, Basic Electricity, Elements of Logic
3	Basic Electricity, Elements of Logic
2	Numbering systems, binary/hex codes
4	Combinational Logic Design Principles
5	Combinational Logic Design Practices, HDL's, PAL/PLA
5	Building on the basic elements, higher logical functions
6	Combinatorial Logic Design Examples
7	Sequential Logic Design Principles
8-9	Sequential Logic Design Practices
10	Memory, CPU's and Computer Organization Micro Architecture & Assembly Language

Homework Assignments:

About one assignment per week, will be may include written problems and/or simulation work.
Late homework, unless excused, will be assessed a penalty of 10% per day late.

During the semester I am prepared to meet individually, by appointment, with any and all students enrolled in this course. I would like especially to meet with students with disabilities who are registered with the Coordinator of Disability Services (368-5230) and who may need individual arrangements. Also, please see the CWRU University Statement of Ethics at <http://www.cwru.edu/provost/ugstudies/instrman/ethics.html> for more information.