

**San Francisco State University
School of Engineering**

Course Description:

ENGR 290: Introduction to PSPICE

Prerequisite: ENGR 100 and concurrent enrollment of ENGR 205

Credit: 1 unit

Introduce students to a simple computer-aided-design (CAD) circuit design tool, PSPICE, to support electronic circuit analysis.

Course Objectives:

The course is going to cover dc, transient domain, frequency domain, noise and Monte Carlo analysis with circuits with LC, diode, BJT and MOSFETs in order to enable students to conduct circuit analysis and simulation.

Textbook:

PSPICE for Basic Microelectronics, McGraw Hill, by Joseph G. Tront. 2007

Instructor:

Hao Jiang (Spring 2014)

Rm: Sci 213C; Tel: 86379; Office Hour W 2-5pm.

Email: jianghao@sfsu.edu; Web: iLearn.sfsu.edu

Course Contents:

1. Dc analysis
2. Time domain analysis
3. Frequency domain analysis
4. Analysis on Diode circuits
5. Analysis on BJT circuits
6. Analysis on MOSFET circuits

Evaluation:

1. 5 labs (75%)
 - a. Each lab report is 10 points.
 - b. Each attendance is 5 points.
2. 1 final independent project (25%)

>40%	40- 44%	45- 49%	50- 54%	55- 59%	60- 64%	65- 69%	70- 74%	75- 79%	80- 84%	85- 89%	90- 95%	> 95%
F	D-	D	D+	C-	C	C+	B-	B	B+	A-	A	A+