Final Homework and CAD Project

This assignment is due at 4pm on Monday, May 2.

Grading. This entire assignment is worth approximately 22% of your final grade. It consists of two parts: (i) SIS CAD tool technology mapping application (Handout #34a), and (ii) CAD programming problem (Handouts #34b-f and any additional handouts to be added on clarifications, etc.); Part (i) is a small final homework assignment, which should not take much work; it is worth 2% of your final course grade. Part (ii) is the final CAD programming project; it is worth 20% of your final course grade.

Working in Groups. For the small homework (part (i) above), you must work solo and hand in your individual assignment. For the final CAD mini-project (part (ii) above), you are allowed to work in a group-of-two. You both get the same grade. However, solo submissions are also allowed.

1. CAD Tool Tutorial: Introduction to Technology Mapping Using SIS. This tutorial and problem is an introduction to technology mapping using the UC Berkeley “SIS” framework. See Handout #34a for details.

2. CAD Programming Mini-Project. This problem is the final CAD mini-project; it is worth 20% of your course grade. It allows you the opportunity to create and test out your own CAD tool for the optimal retiming of a synchronous digital system, under two cost functions. See Handouts #34b-f, and others for details.