

CSc 4710/6710

Spring 2003

Homework 2: Due: 28 January, 2003 (Tuesday)

---

Consider the problem of designing a database for a department-wide grade book system at GSU. A department has a number of TEACHERs (each has a teacher number, last name, first name, email and password) who teach SECTIONS of COURSEs. Courses are described by a course number and a course title. Sections of courses are offered in a particular term (e.g. Fall2000, Spring2001, etc.) and have a computer number (a 5-digit number) which is unique within the term for all sections in that term. Teachers also designate grade cutoff percentages for each of the four letter grades A, B, C, and D (i.e. A-cutoff may be at 90, B-cutoff at 80, C-cutoff at 70, and D-cutoff at 60) for each section they teach. The department has STUDENTs described by student number, last name, first name, email address, password. The students enroll in sections. For each section, the teacher designates a number of grading COMPONENTs such as homework 1, mid term, final, project 1, etc. Each component has a maximum score out of which the student's work is graded. Each component is also assigned a weight (e.g. mid term is worth 25%). Finally for each enrolled student in a section, the teacher grades each component of that section, and assigns a score to the student for that particular component. Design an E-R schema for the grade book system described here.