CS3L: Introduction to Symbolic Programming
Lecture 6: Mini-Project Prep
Summer 2008 Colleen Lewis colleenL@berkeley.edu

Announcements
- Mini-Project Assigned Today
  - Due Monday at 11:59 pm
- Midterm Thursday 9:10-11:10
- Back-up lab materials
- Homework 5 due tonight at 11:59 pm

Case Study Review – Draw a Diagram of Each
- Draw a diagram of Version 1 and 2 of the case study
- Work with a partner
- Be prepared to explain your diagram

Mini-Project
- Day Span isn’t helpful because it doesn’t work across years (or centuries)
- You’re going to write century-day-span
  - Works for years 1900 to 2999

century-day-span examples
- (century-day-span (January 3 1990) (January 9 1990)) 7
- (century-day-span (March 30 1989) (February 2 1990)) 310
- (century-day-span (January 1 1984) (January 1 1985)) 367
- (century-day-span (January 1 2001) (January 1 2005)) 1462

How would we test century-day-span?
- Jan 4 1999 Feb 28 2001 (crossing over leap year)
- Jan 1 1900 Dec 31 2999 (test extremes!)
- Didn’t cross over leap year but has feb
- Test days in month to make sure # are in range Test Helper procedures
- Test two days in same month of same year
- Consecutive days
- General day span – helper procedure testing!
- Two days in the same year crossing over feb 29th
- Test over multiple leap years
- Test over mult. Years w/ no leap years
Helper Procedures
- dates in the same month;
- dates in the same year in different months;
- dates in different years, where the month of the first date precedes the month of the second date;
- dates in different years, where the month of the first date follows the month of the second date;
- dates in different years that do not span a "leap day";
- dates in different years that span a "leap day";
- dates that span the leap day in the year 2000;
- dates that span the non-leap day in the year 1900;
- dates in different years with the first date in a leap year;
- dates in different years with the second date in a leap year;
- dates in different years with both dates in a leap year.

Tips on the project
- Work with a partner
- Exchange contact information
- Set up a time to work
- Work on it before the midterm
- It will be good practice
- Next week is going to be intense you should be 100% focused on Monday’s new stuff!

Pair Programming
- What should it look like?
  - Split in the middle and not talk (BAD)
  - One person doesn’t do any work (BAD)
  - One person doesn’t let the other person work (BAD)
  - Write good comments!!! (GOOD)
  - Split up who does helper procedures (GOOD)
  - Check each other’s procedures (GOOD)
  - Good placeholder names