project[2]: formatted input/output
Due Thursday, 2/11/2016, 12:59:59pm

Project Goals

The goals of this project are to:
1. Get you familiar with computing and evaluating expressions
2. Get you familiar with logical expressions and control statements

Important Notes:

1. **Formatting:** Make sure that you follow the precise recommendations for the output content and formatting: for example, do not change the text in the first problem from "`Enter the birthday of person 1 (mm/dd/yyyy)`" to "`Enter the first birthday (mm/dd/yyyy)`". Your assignment will be auto-graded and any change in formatting will result in a loss in the grade.
2. **Comments:** Header comments are required on all files and recommended for the rest of the program. Points will be deducted if no header comments are included.

Problem 1

Write a program that asks the user to enter two dates in the format `mm/dd/yyyy`, representing the birthdays of two people. The program should print out a message indicating which person is the oldest, based on those dates. The program should function as follows (items underlined are to be entered by the user):

```
Enter the birthday of person 1 (mm/dd/yyyy): 6/7/1965
Enter the birthday of person 2 (mm/dd/yyyy): 4/23/2000

Person 1 is the oldest.
```

Save your program in a file called `age.c`.

Challenge 1 for Problem 1 (2 extra credit points): Your program should check that the values entered for the day, month and year are within proper ranges (1 through 31 for days, 1 through 12 for months and 1900 to 2016 for the years). For example, a run of the program would be:

```
Enter the birthday of person 1 (mm/dd/yyyy): 67/7/1965

Month 67 is invalid.
Enter the birthday of person 1 (mm/dd/yyyy):
```

Save your program in a file called `age_challenge1.c`.

Problem 2

Write a program that asks the user to enter an integer smaller than or equal to 100 and then it computes the following series:

$$sum = 2^2 + 4^2 + 6^2 + ... + n^2$$

where n is the largest even integer, smaller than or equal to the value entered by the user. Your program **must** use a `while` loop for this purpose. The program should function as follows (items underlined are to be entered by the user):

```
Enter an integer smaller than 100:  7
Sum = 56
```

Save your program in a file called `series.c`.

Challenge 1 for Problem 2 (2 extra credit points): Your program should also print the values of the individual series numbers that are being added, as follows (items underlined are to be entered by the user):

```
Enter an integer smaller than 100:  7
Sum = 4 + 16 + 36 = 56
```

Save your program in a file called `series_challenge1.c`.

Grading Rubric

Grading will be done for each problem as follows:

Correctly-named file	5%
Header comment	2%
Program compiles	5%
Correctly-reading data from terminal	18%
Correct result printed	20%

Submission details

The project needs to be submitted, Tuesday, 2/11/2016, 12:59:59pm.

To submit your project, you will have to save your project files to an ECC machine using the Linux VM or the nomachine client:

- create a directory called "project2"
- save your *.c files in that directory
- save your description file into that directory
- DO THIS ONCE: Install the submission script _**(don't type the '>' symbols)**_
  > cd ~
  > wget http://www.cse.unr.edu/~newellz2/submit
  > chmod +x ./submit
- TO Submit:
  > cd project1
  > ~/submit

The submission script copies all files in the current directory to our directory. You may submit as many times as you like before the deadline, we only keep the last submission.

Academic Honesty

Academic dishonesty is against university as well as the system community standards. Academic dishonesty includes, but is not limited to, the following:

Plagiarism: defined as submitting the language, ideas, thoughts or work of another as one's own; or assisting in the act of plagiarism by allowing one's work to be used in this fashion.

Cheating: defined as (1) obtaining or providing unauthorized information during an examination through verbal, visual or unauthorized use of books, notes, text and other materials; (2) obtaining or providing information concerning all or part of an examination prior to that examination; (3) taking an examination for another student, or arranging for another person to take an exam in one's place; (4) altering or changing test answers after submittal for grading, grades after grades have been awarded, or other academic records once these are official.

Cheating, plagiarism or otherwise obtaining grades under false pretenses" constitute academic dishonesty according to the code of this university. Academic dishonesty will not be tolerated and penalties can include canceling a student's enrollment without a grade, giving an F for the course, or for the assignment. For more details, see the University of Nevada, Reno General Catalog.