Kerry Ojakian's CSI 32 Class
HW #3

General Instructions:

- Homework must be put in a your dropbox folder; if there are multiple parts, create a single folder for the assignment. Make sure you give clear names to your files and folders.

- Remember that you must work on your own without help from anyone (that includes classmates and tutors).

The Assignment

1. Using Tkinter, make a drawing of a face (keep it short and simple!). Your program must use at least the following methods of the Canvas class : `create_rectangle`, `create_oval`, `create_line`.

2. For both of the following problems make slight modifications to in-class programs, and use the events ' $< Enter >$' and ' $< Leave >$'.

   (a) Use tkinter to create a program that does the the following. A window opens with one Label widget. When the mouse is moved inside the Label, the word "INSIDE" should be printed to the console. When the mouse is moved outside the Label, the word "OUTSIDE" should be printed to the console.

   (b) Modify the last program so that rather than printing to the console, the actual text in the Label changes so that it is "INSIDE" when the mouse is inside the label and "OUTSIDE" when the mouse is outside the Label

3. In our class programs we wrote the classes Person and its child class Student. Get both of these classes from the program files. Then create a class CUNY_Student which is a child class of Student; put in internal data and methods that seem appropriate to you, but at least do the following:

   (a) CUNY_Student should use the constructor from Student, and have additional internal data.

   (b) CUNY_Student should have at least one completely new method.

   (c) CUNY_Student should override at least one method from its parent class.

4. Create a UML diagram for the last problems using UMLet.