# READ THIS FIRST:

Do your best to do every item on your own; if you cannot immediately do an item, go on to others and then come back to it later. Please check the resources section if you have any problems and talk with your professor if there are any further questions.

Due: Thursday, November 3, 2016.

# Goals:

- Practice getting around the command line compiling and running Java programs.
- Practice getting around in and using GitHub.
- Practice using and creating UML class diagrams.
- Explain some basic concepts about OOP that we covered in class.
- Work hard to get lab points.

## **Instructions**:

- 1. *Programming*. From your textbook (Liang), write Java programs that solve the following problems using Object Oriented Programming (OOP) concepts:
  - $\bullet$  Problem 11.10
  - Problem 11.13

Make sure you follow the style guidelines http://www.reev.us/cmpt220f16/style.html that were given for this course.

For extra credit (2 pts) you could come dressed in a costume related to Java programming, and you must explain it to whoever asks you about it. This will be on the day of the deadline of this lab.

## Resources:

- Your textbook (Liang)!
- Project submission guidelines for this course: www.reev.us/cmpt220f16/project\_submission.html
- Coding style guidelines for this course: www.reev.us/cmpt220f16/style.html
- "How to" use the command line "shell": www.reev.us/cmpt220f16/shell.html
- The official Java reference: http://docs.oracle.com/javase/tutorial/collections/TOC.html
- Stack Overflow Java Tag: http://stackoverflow.com/questions/tagged/java

## **Submission**:

- Push your work to your GitHub repository before the due date (see the top of this document). Remember to include your name, the date, and the assignment in the (copious, meaningful, and accurate) commit messages. Then double check your files are on GitHub and finally sit back and pat yourself in the back, you did very good!
- Make sure all your programs (\*.java) are in a folder called labs/8/ inside your repository folder.