# HW #8: Bank- Due: Monday, December 9, 11:59 PM

## Where do I hand my code in?

In your YU Github repository, under the following directory: IntroToCompSci\hw8

### What must I do for this assignment?

You have been given the skeleton of the code for a Bank. You must fill in all the methods in all the classes to make it all fully working. The primary class for other/client code to call is the Bank class, but every method on every class is fair game for my tests.

Please note: no class in this entire assignment may have any public instance variables – all data access must be via getters/setters only

#### Do I have to Hand in a Junit or Main?

You are <u>not required</u> to hand in a main method/class or a Junit, but I do recommend that you create, and submit, a Junit test class called edu.yu.cs.intro.bank.test.BankTest which runs your code through a series of tests and demonstrates that it all works as far as you can tell. The nature of the test should be creating some patrons, some accounts for those patrons, and executing a series of transactions. While this is not required, it will show me what level of effort you made and how thorough you were, which can tip things in your favor in terms of grading.

#### **Learning Goals**

This is the first time you will deal with code that spans a number of classes, superclasses and subclasses, and abstract and concrete classes. In other words, this is a head first dive into object-oriented development. It is critical for the final, for later assignments, and for coming semesters that you understand every aspect of the code.

#### Where are the detailed instructions!?!?!

This is your first step towards the real world of software engineering, where you are given general requirements and not detailed "rachel bitcha haketana" specifications of what you have to do.

## Help! I'm Freaking Out!

Don't freak out – this is in fact a hard assignment, which is why you have 2x the amount of time to do it. It is also your first step past the "toys" we've built until now, and a good preparation for next semester...

The logic in each class is trivial. The challenge here is getting used to dealing with many classes, as well as superclasses and subclasses.

#### How do I Start?

Read through all the code I gave you, including all the comments. Map out a piece of paper the inheritance hierarchy between the classes, as well as what the flow through the code has to be (what calls what, what creates what objects, etc.) to implement each of the methods in Bank.

## Special Collaboration Rules for This Assignment

You <u>may</u> discuss Object Oriented concepts with each other and help each other understand how the different classes I have given you relate to each other. <u>YOU MAY NOT</u> share any code in any way.

## Weight / Value of this Assignment

You have twice the amount of time for this assignment (2 weeks), and it is worth 2x what other assignments are worth.

## What Assignment Will Come Next?

We will have at least one more assignment, one that deals with collections (which we have not learned yet.) Perhaps more than that, but at least that, bli neder.