

## Lab 8 – ArrayLists

1. Write as a single main program. Use autoboxing.
  - a. Instantiate an ArrayList of Doubles
  - b. Make the first three elements 12.2, 6.1 and 4.3
  - c. Print out the list
  - d. Insert 3.0 at the front of the list
  - e. Print out the list
  - f. Insert 2.5 at index 1
  - g. Append 6.7 to the end of the list
  - h. Print the list
  - i. Replace the value at index 2 with 5.9
  - j. Print the list
  - k. Fetch the value at index 3 and print that value
  - l. Print the length of the array.

2. In Lab 3 you wrote a class called BankAccount.

You will now implement a new Bank class that contains an array list of BankAccount objects. This class will support the following methods:

```
public void addAccount(double initialBalance)
public void deposit(int account, double amount)
public void withdraw(int account, double amount)
public double getBalance(int account)
public void displayAccounts()
```

Note: displayAccounts will display all accounts in the array list of accounts in two columns. The first column is the account number and the second column is the balance for that account. Put titles on the columns.

An account number is the index of that account.

3. You are given the files Coin.java, Purse.java, and PurseTest.java on the assignment page. Coin is completely implemented. Your job is to implement Purse.java. Use PurseTest.java to test your Purse class. Comment out parts of PurseTest.java, start small and build.