

Assignment 7

1. (1) Create an unsynchronized and synchronized version of the class Account with one float argument balance, constructor with a given value of balance like parameter, default constructor that sets balance to 0, getBalance() for getting the current balance and deposit(amount) that adds the amount to the value, and withdrawal(amount) for withdrawing the amount from the balance, if amount<=balance.
 - a. (1) Create 5 threads of the ChangeBalance task that changes the balance of the given account, by generating a random choice (random number <=10) and random amount (<=2000), and if the choice is an even number, the amount will be added to the balance and if it is an odd number, the amount will be withdrawn from the balance (if the amount<=balance). After the changing balance, put each thread to sleep for 7 milliseconds.
 - b. (2) Solve the subtask a. in three ways, by using subclassing the Thread class, by implementing Runnable interface and by using the Executor framework.