

LAB: 5

simulate Bank account management with savings & current accounts.

class Account

{

private String name;

private String account;

private double bal;

public Account (String name, String account, double bal)

{

this.name = name;

this.account = account;

this.bal = bal;

}

public void deposit (double amt)

{ if (amt > 0)

{ bal += amt;

s.o.p ("Deposited : " + amt);

else {

s.o.p ("Invalid Deposit");

}

public void displayBal()

{

s.o.p ("Balance : " + bal);

}

public void withdraw (double amt)

{

if (amt > 0 & amt <= bal)

{ bal -= amt;

s.o.p ("Withdrawn : " + amt);

else {

s.o.p ("Insufficient Funds");

}

```
public double getBal ()
```

```
{ return bal;
```

```
}
```

```
public void setBal (double bal) {
```

```
    this.bal = bal;
```

```
}
```

```
class SavAct extends Account {
```

```
    private static final double int-rate = 6.05;
```

```
    public SavAct (String name, String accnum, double bal) {
```

```
        super (name, accnum, bal);
```

```
    }  
    public void addInterest () {
```

```
        double interest = getBal () * int-rate / 100;
```

```
        setBal (getBal () + interest);
```

```
        s.o.p ("Interest added : " + interest);
```

```
    }
```

```
class CurAct extends Account
```

```
{  
    public public static final double win-bal = 500;
```

```
    public static final double penalty = 50;
```

```
    public CurAct (String name, String accnum, double bal)
```

```
    { super (name, accnum, bal);
```

```
    }  
    public void withdraw (double amt)
```

```
    { if (amt > 0 && getBal () - amt >= win-bal)
```

```
        { setBal (getBal () - amt);
```

```
            s.o.p ("Withdrawn : " + amt);
```

```
            checkMinBal ();
```

```
        }  
        else {
```

```
            s.o.p ("Insufficient Funds");
```

```
        }
```

```
private void checkMinBal()
```

```
< if (getBal() < min-bal)
```

```
{ setBal (getBal() - penalty);
```

```
s.o.p ("Below min balance, penalty applied: " + penalty);
```

```
}  
}
```

```
public class Bank
```

```
< public static void main (String [] args)
```

```
{ SavAct savacc = new SavAct ("Rahul", "RahulB", 1000);
```

```
CurAct curacc = new CurAct ("Rohan", "RohanA", 500);
```

```
s.o.p ("Savings Account");
```

```
savacc.deposit (500);
```

```
savacc.displayBal ();
```

```
savacc.addInterest ();
```

```
savacc.withdraw (200);
```

```
savacc.displayBal ();
```

```
s.o.p ("Current Account");
```

```
curacc curacc.deposit (300);
```

```
curacc.displayBal ();
```

```
curacc.withdraw (1000);
```

```
curacc.displayBal ();
```

```
curacc.withdraw (200);
```

```
curacc.displayBal ();
```

```
}  
}
```

o/p:-

Savings Account:

Deposited: 500.0

Balance: 1500.0

Interest added: 90.75

Withdrawn: 200.0

Balance: 1390.75

Current Account:

Deposited: 300.0

Balance: 800.0

Insufficient Funds

Balance: 800.0

Withdrawn: 1000.0

Balance: 600.0