Date : ____________

Program:

```
import java.util.Scanner;
class Account
{
   protected string name;
   protected string accno;
   protected double balance;
  public Account(string name, string accno, double balance)
  {
     this.name = name;
     this.accno = accno;
     this.balance = balance;
  }
  public void deposit(double amount)
  {
     if (amount>0)
      {
        balance + = amount;
        System.out.println("Deposit successful.
              New Balance: " + balance);
      }
     else
      {
      System.out.println("Amount is not-positive");
      }
   }
```

```
public void displayBalance()
{
  System.out.println(" Balance: "+ balance);
 }
public void withdraw(double amount)
{
  if(amount >0 && amount >= balance)
   {
    System.out.println("Withdraw successful.
    New Balance : "+ balance);
   }
  else
   {
    System.out.println(" Insufficient Balance");
   }
 }
}
Class SavAcc extends Account
{
  double
  ~~int~~ interest;
 public SavAcc(string name, string accno, double
          balance, double interest)
 {
   super( name, accno, balance);
   this. interest= interest;
  }
```

```
public void ComputeandDeposit (int year)
{
  double interest =balance * Math.pow(1 + int /1000, year
                          -balance);
   bdlance+ = interest;
  System.out.println("Interest deposited. New
          Balance: " + balance);
 }
 public void withdraw (double amount)
  {
      super.withdraw(amount);
   }
}
Class CurAcc extends Account
 {
   private double minBalance;
   private double servicecharge;
  public CurAcc (String name, String accno, double
       balance, double minBalance, double servicecharge)
   {
     super( name, accno, balance)
     this.minBalance = minBalance;
     this.servicecharge = servicecharge;
    }
   public void withdraw (double amount)
    {
```

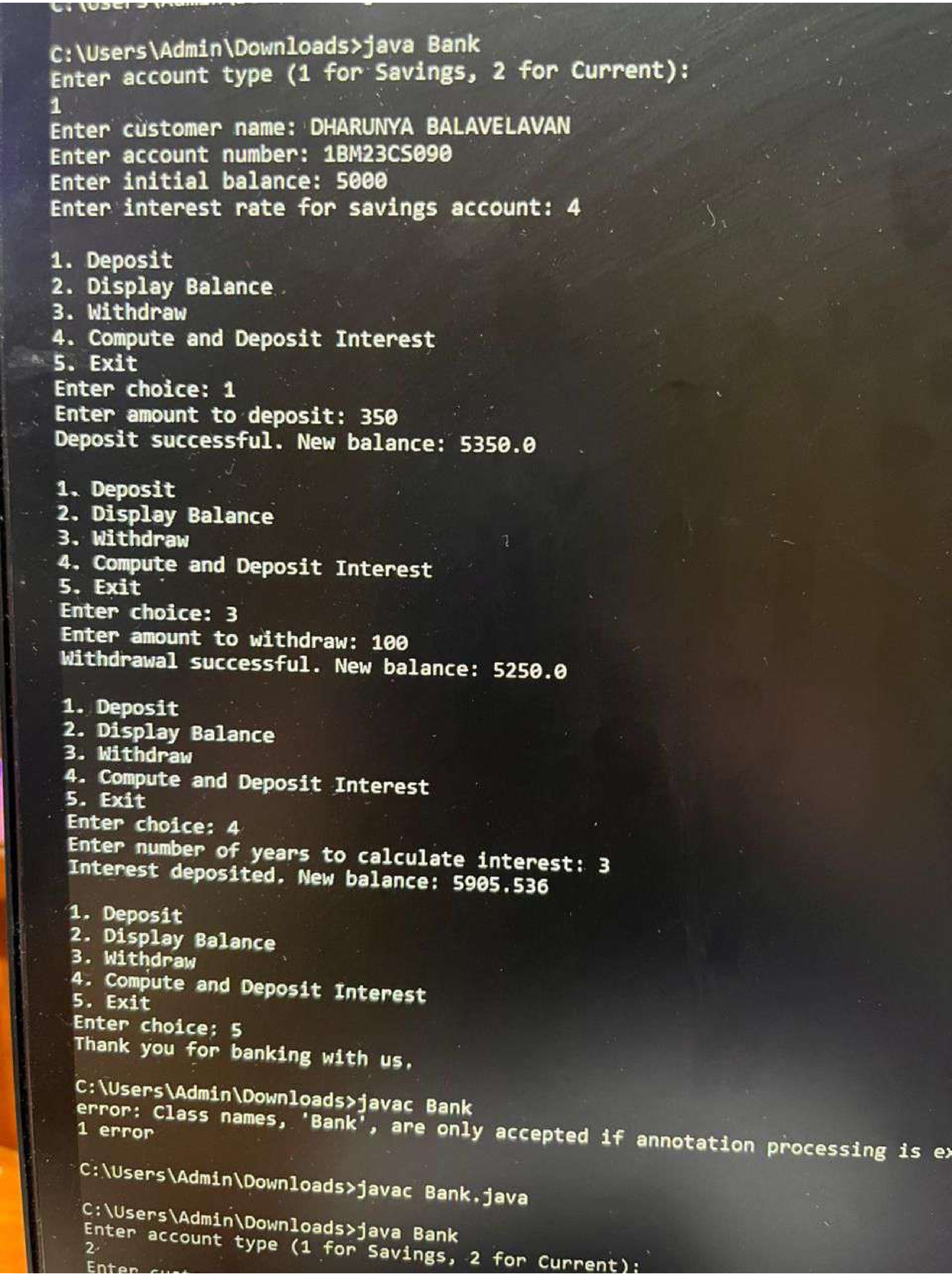
```
if (balance-amount ~~&~~< minBalance)
 {
 System.out.println (" Balance below minimum
    charge. Service charge : " + servicecharge);
  balance-= (amount + servicecharge);
 }
else
 {
  balance - = amount;
  System.out.println(" withdraw successful.
 New Balance : " + balance);
 }
}
public class BOOK
{
 public static void main (String []args)
 {
 Scanner sc = new Scanner (System.in);
System.out.println(" Enter account type (1 for
    savings, 2 for current)");
int accType = sc.nextInt();
 sc.nextLine();
System.out.println(" Enter customer name :"
  name = sc.nextLine();
System.out.println(" Enter Account number :"
 accno. = sc.nextLine();
```

```
System.out.println("Enter the Balance : ");
 balance = sc.nextDouble();
 Account account;
 if (accType ==1)
   {
    System.out.println("Enter Interest rate : ");
     interest = sc.nextDouble();
    account=new SavAcc(name, accno, balance,interest);
    }
  else
   {
    System.out.println(" Enter minimum Balance : ");
     minBalance = sc.nextDouble();
    System.out.println (" Enter service Charge : ");
     serviceCharge = sc.nextDouble();
    account= new CurAcc(name,accno, balance,
               minBalance, ServiceCharge);
    }
    int choice;
    do
     {
      System.out.println ("1.Deposit ");
     System.out.println ("2.Display Balance ");
     System.out.println ("3.withdraw Amount ");
      if (account instanceof SavAcc)
       {
     System.out.println("4Computeand Deposit");
System.out.println("5.Exit");
System.out.println(" Enter your choice:");
 int choice= sc.nextInt();
 switch(choice)
 {
   case 1:
   System.out.println(" Enter amount to deposit:");
   double depositamount = sc.nextDouble();
   account.deposit(depositamount);
    break;
   case 2:
     account.display Balance();
      break;
   case 3:
    System.out.println(" Enter amount to
                     withdraw:");
   double withdrawAmount = sc.next Double();
    account.withdraw(withdrawAmount);
    break;
   case 4:
     if (account instance of SavAcc)
      {
      System.out.println(" Enter no.of years:");
          int year = sc.nextInt();
      ((SavAcc) account.computeandDeposit
                    Interest(year);
      }
```

Date :

```
else
  {
    System.out.println("Invalid");
    }
 break;
case 5:
   System.out.println("Thank you for choosing us");
    break;
default: System.out.println("Invalid choice");
   }
}
while (choice!=5);
sc.close();
  }
}
```

29.10



```
C:\Users\Admin\Downloads>java Bank
Enter account type (1 for Savings, 2 for Current):
1
Enter customer name: DHARUNYA BALAVELAVAN
Enter account number: 1BM23CS090
Enter initial balance: 5000
Enter interest rate for savings account: 4

1. Deposit
2. Display Balance
3. Withdraw
4. Compute and Deposit Interest
5. Exit
Enter choice: 1
Enter amount to deposit: 350
Deposit successful. New balance: 5350.0

1. Deposit
2. Display Balance
3. Withdraw
4. Compute and Deposit Interest
5. Exit
Enter choice: 3
Enter amount to withdraw: 100
Withdrawal successful. New balance: 5250.0

1. Deposit
2. Display Balance
3. Withdraw
4. Compute and Deposit Interest
5. Exit
Enter choice: 4
Enter number of years to calculate interest: 3
Interest deposited. New balance: 5905.536

1. Deposit
2. Display Balance
3. Withdraw
4. Compute and Deposit Interest
5. Exit
Enter choice: 5
Thank you for banking with us.

C:\Users\Admin\Downloads>javac Bank
error: Class names, 'Bank', are only accepted if annotation processing is ex
1 error

C:\Users\Admin\Downloads>javac Bank.java

C:\Users\Admin\Downloads>java Bank
Enter account type (1 for Savings, 2 for Current):
2
Enter cust
```