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<b>Status</b>	Finished
<b>Started</b>	Saturday, 5 October 2024, 12:27 PM
<b>Completed</b>	Saturday, 5 October 2024, 1:07 PM
<b>Duration</b>	39 mins 46 secs

## Question 1

Correct

Marked out of 5.00

Create a class known as "BankAccount" with methods called deposit() and withdraw().

Create a subclass called SavingsAccount that overrides the withdraw() method to prevent withdrawals if the account balance falls below one hundred.

**For example:**

**Result**

```
Create a Bank Account object (A/c No. BA1234) with initial balance of $500:
Deposit $1000 into account BA1234:
New balance after depositing $1000: $1500.0
Withdraw $600 from account BA1234:
New balance after withdrawing $600: $900.0
Create a SavingsAccount object (A/c No. SA1000) with initial balance of $300:
Try to withdraw $250 from SA1000!
Minimum balance of $100 required!
Balance after trying to withdraw $250: $300.0
```

**Answer:** (penalty regime: 0 %)

Reset answer

```
1 class BankAccount {
2     private String accountNumber;
3     private double balance;
4
5     BankAccount(String acc, double bal){
6         this.accountNumber = acc;
7         this.balance = bal;
8     }
9     public void deposit(double amount) {
10        this.balance += amount;
11    }
12    public void withdraw(double amount) {
13        if (balance >= amount) {
14            balance -= amount;
15        } else {
16            System.out.println("Insufficient balance");
17        }
18    }
19    public double getBalance() {
20        return this.balance;
21    }
22 }
23 class SavingsAccount extends BankAccount {
24     public SavingsAccount(String acc, double bal) {
25         super(acc, bal);
26     }
27
28     @Override
29     public void withdraw(double amount) {
30         if (getBalance() - amount < 100) {
31             System.out.println("Minimum balance of $100 required!");
32         } else {
33             super.withdraw(amount);
34         }
35     }
36 }
37 class prog {
38     public static void main(String[] args) {
39         System.out.println("Create a Bank Account object (A/c No. BA1234) with initial balance of $500:");
40         BankAccount BA1234 = new BankAccount("BA1234", 500);
41
42         System.out.println("Deposit $1000 into account BA1234:");
43         BA1234.deposit(1000.0);
44         System.out.println("New balance after depositing $1000: $" + BA1234.getBalance());
45
46         System.out.println("Withdraw $600 from account BA1234:");
47         BA1234.withdraw(600.0);
48         System.out.println("New balance after withdrawing $600: $" + BA1234.getBalance());
49
50         System.out.println("Create a SavingsAccount object (A/c No. SA1000) with initial balance of $300:");
51         SavingsAccount SA1000 = new SavingsAccount("SA1000", 300);
```

	Expected	Got	
✓	<p>Create a Bank Account object (A/c No. BA1234) with initial balance of \$500:</p> <p>Deposit \$1000 into account BA1234:</p> <p>New balance after depositing \$1000: \$1500.0</p> <p>Withdraw \$600 from account BA1234:</p> <p>New balance after withdrawing \$600: \$900.0</p> <p>Create a SavingsAccount object (A/c No. SA1000) with initial balance of \$300:</p> <p>Try to withdraw \$250 from SA1000!</p> <p>Minimum balance of \$100 required!</p> <p>Balance after trying to withdraw \$250: \$300.0</p>	<p>Create a Bank Account object (A/c No. BA1234) with initial balance of \$500:</p> <p>Deposit \$1000 into account BA1234:</p> <p>New balance after depositing \$1000: \$1500.0</p> <p>Withdraw \$600 from account BA1234:</p> <p>New balance after withdrawing \$600: \$900.0</p> <p>Create a SavingsAccount object (A/c No. SA1000) with initial balance of \$300:</p> <p>Try to withdraw \$250 from SA1000!</p> <p>Minimum balance of \$100 required!</p> <p>Balance after trying to withdraw \$250: \$300.0</p>	✓

Passed all tests! ✓

Question **2**

Correct

Marked out of 5.00

Create a class `Mobile` with constructor and a method `basicMobile()`.

Create a subclass `CameraMobile` which extends `Mobile` class, with constructor and a method `newFeature()`.

Create a subclass `AndroidMobile` which extends `CameraMobile`, with constructor and a method `androidMobile()`.

display the details of the `Android Mobile` class by creating the instance.

```
class Mobile{  
  
}  
class CameraMobile extends Mobile {  
  
}  
class AndroidMobile extends CameraMobile {  
  
}
```

expected output:

```
Basic Mobile is Manufactured  
Camera Mobile is Manufactured  
Android Mobile is Manufactured  
Camera Mobile with 5MG px  
Touch Screen Mobile is Manufactured
```

**For example:**

**Result**

```
Basic Mobile is Manufactured  
Camera Mobile is Manufactured  
Android Mobile is Manufactured  
Camera Mobile with 5MG px  
Touch Screen Mobile is Manufactured
```

**Answer:** (penalty regime: 0 %)

```
1 class Mobile{  
2     Mobile(){  
3         System.out.println("Basic Mobile is Manufactured");  
4     }  
5 }  
6 class CameraMobile extends Mobile{  
7     CameraMobile(){  
8         super();  
9         System.out.println("Camera Mobile is Manufactured");  
10    }  
11    public void newFeature(){  
12        System.out.println("Camera Mobile with 5MG px");  
13    }  
14 }  
15 class AndroidMobile extends CameraMobile {  
16     AndroidMobile(){  
17         super();  
18         System.out.println("Android Mobile is Manufactured");  
19     }  
20     public void androidMobile(){  
21         newFeature();  
22         System.out.println("Touch Screen Mobile is Manufactured");  
23     }  
24 }  
25 class prog{  
26     public static void main(String args[]){  
27         AndroidMobile am = new AndroidMobile();  
28         am.androidMobile();  
29     }  
30 }
```

	Expected	Got	
✓	Basic Mobile is Manufactured Camera Mobile is Manufactured Android Mobile is Manufactured Camera Mobile with 5MG px Touch Screen Mobile is Manufactured	Basic Mobile is Manufactured Camera Mobile is Manufactured Android Mobile is Manufactured Camera Mobile with 5MG px Touch Screen Mobile is Manufactured	✓

Passed all tests! ✓

## Question 3

Correct

Marked out of 5.00

create a class called College with attribute String name, constructor to initialize the name attribute, a method called Admitted(). Create a subclass called CSE that extends Student class, with department attribute, Course() method to sub class. Print the details of the Student.

College:

String collegeName;

public College() {}

public admitted() {}

Student:

String studentName;

String department;

public Student(String collegeName, String studentName,String depart) {}

public toString()

Expected Output:

A student admitted in REC

CollegeName : REC

StudentName : Venkatesh

Department : CSE

**For example:**

**Result**

A student admitted in REC

CollegeName : REC

StudentName : Venkatesh

Department : CSE

**Answer:** (penalty regime: 0 %)

Reset answer

```
1 class College{
2     protected String collegeName;
3     public College(String cname) {
4         this.collegeName = cname;
5     }
6     public void admitted() {
7         System.out.print("A student admitted in "+collegeName);
8     }
9 }
10 class Student extends College{
11     String studentName;
12     String department;
13
14     public Student(String cname, String sname,String dept) {
15         super(cname);
16         this.studentName = sname;
17         this.department = dept;
18     }
19
20     public String toString(){
21         return "\nCollegeName : " + collegeName +
22             "\nStudentName : " + studentName +
23             "\nDepartment : " + department;
24     }
25 }
26 class prog {
27     public static void main (String[] args) {
28         Student s1 = new Student("REC","Venkatesh","CSE");
29         s1.admitted();
30         System.out.println(s1.toString());
31     }
32 }
```

	Expected	Got	
✓	A student admitted in REC CollegeName : REC StudentName : Venkatesh Department : CSE	A student admitted in REC CollegeName : REC StudentName : Venkatesh Department : CSE	✓

Passed all tests! ✓

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