CS23333-Object Oriented Programming Using Java-2023

Quiz navigation

1 2 3

Show one page at a time

Finish review

Status	Finished
Started	Monday, 30 September 2024, 5:16 PM
Completed	Monday, 30 September 2024, 6:02 PM
Duration	45 mins 55 secs

Question **1**

Correct

Marked out of 5.00

Flag question

Create a class Student with two private attributes, name and roll number. Create three objects by invoking different constructors available in the class Student.

Student()

Student(String name)

Student(String name, int rollno)

Input:

No input

Output:

No-arg constructor is invoked
1 arg constructor is invoked
2 arg constructor is invoked
Name =null , Roll no = 0
Name =Rajalakshmi , Roll no = 0
Name =Lakshmi , Roll no = 101

For example:

Test	Result
1	No-arg constructor is invoked 1 arg constructor is invoked 2 arg constructor is invoked Name =null , Roll no = 0 Name =Rajalakshmi , Roll no = 0 Name =Lakshmi , Roll no = 101

Answer: (penalty regime: 0 %)

```
public class Student{
    private String name;
    private int rollno;
    public Student(){
        System.out.println("No-arg constructor is invoked");
        this.name=null;
        this.rollno=0;
    }
    public Student(String name){
        System.out.println("1 arg constructor is invoked");
        this.name=name;
        this.rollno=0;
    }
    public Student(String name,int rollno){
        System.out.println("2 arg constructor is invoked");
        this.name=name;
        this.rollno=rollno;
    }
    public void display(){
        System.out.println("Name ="+name+" , Roll no = "+rollno);
    }
    public static void main(String args[]){
        Student student1=new Student();
        Student student2=new Student("Rajalakshmi");
        Student student3=new Student("Lakshmi",101);
        student1.display();
        student2.display();
        student3.display();
    }
}
```

	Test	Expected	Got	
	1	No-arg constructor is invoked 1 arg constructor is invoked 2 arg constructor is invoked Name =null , Roll no = 0 Name =Rajalakshmi , Roll no = 0 Name =Lakshmi , Roll no = 101	No-arg constructor is invoked 1 arg constructor is invoked 2 arg constructor is invoked Name =null , Roll no = 0 Name =Rajalakshmi , Roll no = 0 Name =Lakshmi , Roll no = 101	

Passed all tests!

Question **2**

Correct

Marked out of 5.00

Flag question

Create a Class Mobile with the attributes listed below,

private String manufacturer;
private String operating_system;
public String color;
private int cost;

Define a Parameterized constructor to initialize the above instance variables.

Define getter and setter methods for the attributes above.

for example : setter method for manufacturer is

void setManufacturer(String manufacturer){

this.manufacturer= manufacturer;

}

String getManufacturer(){

return manufacturer;}

Display the object details by overriding the toString() method.

For example:

Test	Result
1	manufacturer = Redmi operating_system = Andriod color = Blue cost = 34000

Answer: (penalty regime: 0 %)

```
public class Mobile{
    private String manufacturer;
    private String operating_system;
    private int cost;
    public String color;
    public Mobile(String manufacturer,String operating_system,String color,int cost){
        this.manufacturer=manufacturer;
        this.operating_system=operating_system;
        this.color=color;
        this.cost=cost;
    }
    public void setmanufacturer(String manufacturer){
        this.manufacturer=manufacturer;
    }
    public String getmanufacturer(){
        return manufacturer;
    }
    public void setoperatingsystem(String operating_system){
        this.operating_system=operating_system;
    }
    public String getoperatingsystem(){
        return operating_system;
    }
    public void setcolor(String color){
        this.color=color;
    }
    public String getcolor(){
        return color;
    }
    public void setcost(int cost){
        this.cost=cost;
    }
    public int getcost(){
        return cost;
    }
    public String toString(){
        return "manufacturer = "+manufacturer+"\n"+"operating_system = "+operating_system+"\
    }
    public static void main(String args[]){
        Mobile mobile=new Mobile("Redmi","Andriod","Blue",34000);
        System.out.println(mobile.toString());
    }
}
```

	Test	Expected	Got	
	1	manufacturer = Redmi operating_system = Andriod color = Blue cost = 34000	manufacturer = Redmi operating_system = Andriod color = Blue cost = 34000	

Passed all tests!

Question **3**

Create a class called "Circle" with a radius attribute. You can access and modify this attribute using getter and setter

Correct

Marked out of 5.00

Flag question

methods. Calculate the area and circumference of the circle.

Area of Circle = πr^2

Circumference = $2\pi r$

Input:

2

Output:

Area = 12.57
Circumference = 12.57

For example:

Test	Input	Result
1	4	Area = 50.27 Circumference = 25.13

Answer: (penalty regime: 0 %)

Reset answer

```
import java.io.*;
import java.util.Scanner;
class Circle
{
    private double radius;
    public Circle(double radius){
        this.radius=radius;


    }
    public void setRadius(double radius){
        this.radius=radius;


    }
    public double getRadius()    {
        return radius;


    }
    public double calculateArea()  {
       return Math.PI*radius*radius;

    }
    public double calculateCircumference()    {
        // complete the statement
       return 2*Math.PI*radius;
    }
}
class prog{
    public static void main(String[] args)  {
        int r;
        Scanner sc= new Scanner(System.in);
        r=sc.nextInt();
        Circle c= new Circle(r);
        System.out.println("Area = "+String.format("%.2f", c.calculateArea()));
        // invoke the calculatecircumference method
        System.out.println("Circumference = "+String.format("%.2f",c.calculateCircumference(

    }
}

```

	Test	Input	Expected	Got	
	1	4	Area = 50.27 Circumference = 25.13	Area = 50.27 Circumference = 25.13	
	2	6	Area = 113.10 Circumference = 37.70	Area = 113.10 Circumference = 37.70	
	3	2	Area = 12.57 Circumference = 12.57	Area = 12.57 Circumference = 12.57	

Passed all tests!

Finish review

◄ Lab-04-MCQ

Jump to...

Number of Primes in a specified range ►