

Q. write a program to calculate Area of circle ,circumference of circle,Area of rectangle,peremeter of rectangle using interface

```
import java.util.Scanner;

interface interface2 {
    public void accept();
    public void areacircle();
    public void circumcircle();
    public void arearectangle();
    public void pemremeterrecta();
}

public class interface1 implements interface2
{
    double radius,length,breadth,area,perimeter;

    @Override
    public void accept() {
        // TODO Auto-generated method stub
        Scanner sc=new Scanner(System.in);
        System.out.print("Enter the radius: ");
        radius= sc.nextDouble();
        System.out.print("Enter the Length: ");
        length= sc.nextDouble();
        System.out.print("Enter the Breadth: ");
        breadth= sc.nextDouble();
    }

    @Override
    public void areacircle() {
        // TODO Auto-generated method stub
        double area= Math.PI*(radius* radius);
        System.out.println("The area of circle is: "+area);
    }

    @Override
    public void circumcircle() {
        // TODO Auto-generated method stub
        double circumference=Math.PI*2*radius;
        System.out.println("The circumference of circle is: "+circumference);
    }

    @Override
    public void arearectangle() {
        // TODO Auto-generated method stub
        double area=length*breadth;
        System.out.println("The area of rectangle is: "+area);
    }

    @Override
    public void pemremeterrecta() {
        // TODO Auto-generated method stub
        double perimeter=2*(length*breadth);
        System.out.println("The perimeter of rectangle is: "+perimeter);
    }
}
```

```

    }
    public static void main(String[] args) {
        // TODO Auto-generated method stub
        interface1 obj=new interface1();
        obj.accept();
        obj.areacircle();
        obj.circumcircle();
        obj.arearectangle();
        obj.pemremeterrecta();
    }
}

```

Output:

```

<terminated> interface1 [Java Application] C:\Program Files\Java\jre1.8.0_101\bin\javav
Enter the radius: 3
Enter the Length: 5
Enter the Breadth: 9
The area of circle is: 28.274333882308138
The circumference of circle is: 18.84955592153876
The area of  rectangle is: 45.0
The perimeter of rectangle is: 90.0

```