

```
import java.util.*;
```

```
abstract class shape
```

```
{
```

```
    double a, b;
```

```
    abstract void printArea();
```

```
}
```

```
class Triangle extends shape
```

```
{
```

```
    // Scanner sc = new Scanner(System.in);
```

```
    Triangle (Double x, double y){
```

```
    {
```

```
        a = x;
```

```
        b = y;
```

```
    }
```

```
    void printArea(){
```

```
    {
```

```
        double area;
```

```
        area = (0.5 * a * b);
```

```
        System.out.println("area of triangle:" + area);
```

```
    }
```

```
}
```

```
class circle extends shape
```

```
{
```

```
    double area;
```

```
    circle (double r){
```

```
    {
```

```
        a = r;
```

```
    }
```

```
    void printArea(){
```

```
    {
```

```
        area = (3.14 * a * a);
```

```
        System.out.println("area of circle:" + area);
```

```
    }
```

```
}
```

class rectangle extends shape

{

double area;

Rectangle (double x, double y)

{

a = x;

b = y;

}

void printArea ()

{

area = (a * b);

system.out.println("area of rectangle :"
+ area);

}

}

class shapeMain

{

public static void main (String args[])

{

Scanner sc = new Scanner (System.in);

double b, h, l, be, l1;

system.out.println("Enter the base and height
of rectangle");

b = sc.nextDouble();

h = sc.nextDouble();

Triangle t = new Triangle (b, h);

t.printArea();

system.out.println("Enter the length
and breadth of rectangle");

l = sc.nextDouble();

be = sc.nextDouble();

Rectangle r = new Rectangle (l, be);


```
1. printArea();
```

```
System.out.println("Enter the radius of circle");
```

```
rl = sc.nextDouble();
```

```
Circle c = new Circle(rl);
```

```
c.printArea();
```

```
}
```

```
}
```