

```
import java.util.Scanner;
import java.lang.Math;
abstract class Shape {
    int a1;
    int a2;
    Shape (int a, int b) {
        a1 = a;
        a2 = b;
    }
    abstract void printArea();
}
class Rectangle extends Shape {
    Rectangle (int a, int b) {
        Super (a, b);
    }
    void printArea() {
        System.out.println ("Area of rectangle is : " + (a1*a2));
    }
}
class Triangle extends Shape {
    Triangle (int a, int b) {
        Super (a, b);
    }
    void printArea() {
        System.out.println ("Area of triangle is : " + ((a1*a2)/2));
    }
}
class Circle extends Shape {
    Circle (int a, int b) {
        Super (a, a);
    }
    void printArea() {
        System.out.printf ("The area of circle is : %f", (a1*Math.PI*a1));
    }
}
```

```
class ShapeMain {
```

```
public static void main (String args []) {
```

```
Rectangle r = new Rectangle (10, 20);
```

```
Triangle t = new Triangle (20, 30);
```

```
Circle c = new Circle (5, 0);
```

```
    r.printArea();
```

```
    t.printArea();
```

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

```
}
```

```
}
```


CA Command Prompt

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C:\Users\staga>cd Desktop

C:\Users\staga\Desktop>javac ShapeMain.java

C:\Users\staga\Desktop>java ShapeMain

Area of rectngle is:150

Area of triangle is:90

The area of circle is: 50.27

C:\Users\staga\Desktop>_