# **HackerRank**

# Area and Perimeter of geometric shapes

### **Problem Statement**

Write a program to calculate the area and perimeter of three basic geometric shapes:

- Circle
- Square
- Rectangle

The program should take inputs for each shape:

- Circle → radius r
- Square → side a
- Rectangle → length I and width w

(Use  $\pi = 3.1416$  for calculations. Show area and perimeter up to 2 decimal places.)

# **Input Format**

- First line: radius of circle (integer or float)
- Second line: side of square (integer or float)
- Third line: length and width of rectangle separated by a space

#### **Output Format**

Three lines showing area and perimeter of each shape in the following format:

Circle: <area> <perimeter>

Square: <area> <perimeter>

Rectangle: <area> <perimeter>

#### Sample Input 0

```
7
5
10 4
```

# Sample Output 0

```
Circle: 153.94 43.98
Square: 25.00 20.00
Rectangle: 40.00 28.00
```