

Aim:

Take an integer **n** from the user. Your task is to Write a program to find out the sum of the digits of the given number using the process of recursion. Print the result as shown in the Test cases.

- The program defines the **Sumof()** function.
- In the main program it takes the input **n** and sends it to the **Sumof()** function.
- The **Sumof()** function contains base and recursive criterion.

Constraints:

1 <= integer <= 10⁶

Sample Test Case:

4532 ----> Input integer

14 ----> Sum of the digits of the given number (4+5+3+2 = 14)

Source Code:

sumofdigits.py

```
'''
Complete the given function using recursive approach,
and also write the driver code test the functionality,
and pass all the visible and hidden test cases.

'''

def Sumof(n):
    if n == 0:
        return 0
    return n % 10 +Sumof(n // 10)

n = int(input())
result= Sumof(n)
print(result)
# take user input and add the function call
```

Execution Results - All test cases have succeeded!

Test Case - 1
User Output
4532
14
Test Case - 2
User Output
109
10
Test Case - 3

User Output
56
11