

## 1. Write a function to calculate the multiplication and sum of two numbers

```
In [5]: def sum_and_product(a,b):  
        mult = a*b  
        sum=a+b  
        print('SUM:',sum, 'PRODUCT:',mult)  
sum_and_product(2,3)
```

SUM: 5 PRODUCT: 6

## 2. Write a function to print the sum of the current number and the previous number

```
In [9]: def sum_and_product(num):  
        previous = 0  
        for i in range(num):  
            sum = previous + i  
            print(sum)  
            previous = i  
print("print current and previous")  
sum_and_product(3)
```

print current and previous  
0  
1  
3

## 3. Write a function to print characters from a string that are present at an even index number

```
In [ ]: string =input('enter a string')  
even_chars = []  
for i in range(len(string)):  
    if i % 2 == 0:  
        even_chars.append(string[i])  
print('Even characters: {}'.format(even_chars))
```

## 4. Write a function to remove first characters from a string

```
In [1]: string =input('enter any string:')
def remove_char(string):
    print(string[1:])
remove_char(string)
```

```
enter any string:loice
oice
```

## 5. Write a function to check if the first and last number of a list is the same

```
In [2]: list = [1,2,3,4,5,6,7,8,]
def first_last(list):
    if list[0] == list[-1]:
        print('they are the same')
    else:
        print('not the same')
first_last(list)
```

```
not the same
```

## 6. Write a function to print multiplication table from 1 to 10

```
In [3]: def multiplication_table(start, stop):
    for x in range(start, stop+1):
        for y in range(start, stop+1):
            print(str(x*y), end=" ")
        print()

multiplication_table(1, 10)
```

```
1 2 3 4 5 6 7 8 9 10
2 4 6 8 10 12 14 16 18 20
3 6 9 12 15 18 21 24 27 30
4 8 12 16 20 24 28 32 36 40
5 10 15 20 25 30 35 40 45 50
6 12 18 24 30 36 42 48 54 60
7 14 21 28 35 42 49 56 63 70
8 16 24 32 40 48 56 64 72 80
9 18 27 36 45 54 63 72 81 90
10 20 30 40 50 60 70 80 90 100
```

## 7. Given a two list of numbers, write a function to create a new list such that the new list should contain odd numbers from the first list and even numbers from the second list. ¶

```
In [4]: l1 = [2,5,8,12,4,6,87,32,65]
l2 = [1,6,3,90,4,5,32,4]
l3 = [n for n in l1 if n%2]+[n for n in l2 if not n%2]
print(l3)

[5, 87, 65, 6, 90, 4, 32, 4]
```

```
In [ ]:
```