

# Functions

```
``def function_name():  
    #indentation  
    .....``
```

```
In [1]: def say():  
        #  
        print('Hello')
```

```
In [2]: say()  
  
Hello
```

```
In [3]: def say_hello(name):  
        print('Hello', name)
```

```
In [4]: say_hello('Srikanth')  
  
Hello Srikanth
```

```
In [14]: # write a function that should print hello your name n times  
def say_hello_1(name, n):  
    for i in range(n):  
        #say_hello(name)  
        print('Hello',name)
```

```
In [15]: say_hello_1('Srikanth',5)  
  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth
```

```
In [11]: def say_hello_2(name,n):  
        txt = 'Hello {} \n'.format(name)  
        print(txt*n)
```

```
In [13]: say_hello_2('Srikanth',5)  
  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth  
Hello Srikanth
```

```
In [22]: def addition(a,b):  
         c = a+b  
         return c
```

```
In [24]: # create a function for multiplication, subtraction , division and paower  
  
def multiplication(a,b):  
    """This function will multiply two number a and b and return  
    c = a*b  
    """  
    return a*b  
  
def subtraction(a,b): return a-b  
  
def division(a,b):  
    if b == 0:  
        return print("Can't divide a number with 0")  
    else:  
        return a/b  
  
def power(a,b):  
    return a**b
```

```
In [26]: multiplication(5,5)
```

```
Out[26]: 25
```

```
In [30]: # write a function to generate random number of selected range and length  
def rand_num(a, b,length):  
    import random  
    rand = []  
    if a > b:  
        return print('{} > {} please select number a < b'.format(a,b))  
    for i in range(length):  
        num = random.randint(a,b)  
        rand.append(num)  
    return rand
```

```
In [32]: rand_num(50,30,20)
```

```
50 > 30 please select number a < b
```