

1. Write a python program to create a function that takes a list and returns a new list with the original list's unique elements.

```
l1=[]
def f1(*l):
    for i in l:
        return l1.append(i)
f1([2,9,7,4])
print(l1)
```

2. Write a python program to create a function that takes a number as a parameter and checks if the number is prime or not.

```
x=int(input("enter a number"))
def f(a):
    for i in range(2,a):
        if a%i==0:
            break
    if i==a-1:
        print("prime")
    else:
        print("not prime")
f(x)
```

3. Write a python program to create a function that prints the even numbers from a given list. Sample List : [1, 2, 3, 4, 5, 6, 7, 8, 9]

```
def even_number(sample_list):
    for x in sample_list:
        if x%2==0:
            print(x)
        else:
            continue

sample_list=[1, 2, 3, 4, 5, 6, 7, 8, 9]
even_number(sample_list)
```

4. Write a python program to create a function that checks whether a passed string is palindrome or not.

```
def palindrome(s):
    a=s[::-1]
    if s==a:
```

```
print("string is palindrome")
else:
print("string is not palindrome")

s=input("enter the string\n")
```

5. Write a python program to create a function to find the Min of three numbers.

```
x=int(input("enter first number"))
y=int(input("enter second number"))
z=int(input("enter third number"))
def f(a,b,c):
    if a<b:
        if a<c:
            print(a,"is minimum")
        else:
            print(c,"is minimum")
    else:
        if b<c:
            print(b,"is minimum")
        else:
            print(c,"is minimum")

f(x,y,z)
```

6. Write a python program to create a function and print a list where the values are square of numbers between 1 and 30.

```
def sq_num(n1,n2):
    l1=[]
    for x in range(n1,n2+1):
        l1.append(x**2)
    print(l1)

sq_num(1,30)
```

7. Write a python program to access a function inside a function.

```
def add_num(n1,n2):
    def add(n1,n2):
```

```

return n1+n2

res=add(n1,n2)
return res
print("enter two value")
n1,n2=int(input()),int(input())
a=add_num(

```

8. Write a python program to create a function that accepts a string and calculate the number of upper case letters and lower case letters.

```

def UL_letter(s1):
    n1=0
    n2=0
    for x in s1:
        if x.islower():
            n1+=1
        elif x.isupper():
            n2+=1
    print("lower case leeter is ",n1)
    print("upper case letter is ",n2)

s1=input("enter the string ")
UL_letter(s1)

```

9. Write a python program to create a function to check whether a string is a pangram or not.

```

def pangram(s):
    alpha="abcdefghijklmnopqrstuvwxyz"
    for char in alpha:
        if char not in s:
            return False
    return True
s='the quick brown fox jumps over the lazy dog'
if(pangram(s)==True):
    print("str is pangram")
else:
    print("str is not pangram")

```

10. Write a python program to create a function to check whether a string is an anagram or not.

```
def anagram(s1,s2):
    for char in s2:
        if char not in s1.lower():
            return False
    return True
s1,s2='abcd','bcad'
if(anagram(s1,s2)==True):
    print("str is anagram")
else:
    print("str is not anagram")
```