

Q1. Write a python program to print first 10 natural numbers using while Loop

Output:

```
===== RESTART: C:\Users\admin\Desktop\new\PR2BQ1.py =====  
1  
2  
3  
4  
5  
6  
7  
8  
9  
10
```

Q2. Write a python program to print summation of first five natural numbers using while loop

```
#print summation of first five Natural numbers  
a=1  
sum=0  
while (a<6) :  
    sum=sum+a  
    a=a+1  
print (sum)
```

Output :

15

Q3. Write a Python program to accept the number from user and print summation of number till that number using while loop

```
#print summation of numbers enter by user
n=int(input("Enter the Number"))
a=1
sum=0
while (a<n+1):
    sum=sum+a
    a=a+1
    print(sum)
```

Output :

Enter the Number15

120

Q4. Write a python program using while loop to print the answer of the following series $1^2+2^2+3^2+\dots+n^2$

```
#python program to print answer of following series using
#1^2+2^2+.....+n^2 using
while Loop
n=int(input("Enter a Number"))
sum=0
a=1
while (a<=n):
    sum=sum+(a**2)
    a=a+1
print(sum)
```

Output :

Enter a Number30

9455

Q5. Write a python program to accept a three digit number from user and print it's reverse(ex:123=321)

```
#To print the reverse of number entered by number
n=int(input("Enter a number"))
rev=0
while n>0:
    rem=n%10
    rev=(rev*10)+rem
    n=n//10
print(rev)
```

Output :

Enter a number597

795

Q6. Write a python program to accept a three digit number from the user and print summation of it's digit's ex(123=6)

```
#To print summation of entered number
n=int(input("Enter the three digit Number"))
sum=0
while n>0:
    rem=n%10
    sum=sum+rem
    n=n//10
print(sum)
```

Output :

Enter the three digit Number555

15

For Loops :

Q7. Write a Python program to print first 10 natural numbers using For loop

```
#Program to print first 10 natural numbers using for loop
for k in range(1,11):
    print(k)
```

Output :

1
2
3
4
5
6
7
8
9
10

Q8. Write a python program to print summation of first 10 natural numbers using for Loop

#print the summation of first 10 natural numbers

a=0

sum=0

for k in range (0,11):

4

```
a=a+k  
print(a)
```

Output:

55

Q9. Write a python program to find factors of a Number

```
#To find factors of a number  
n=int(input("Enter a Number"))  
for i in range (2,n):  
    while(n%i==0):  
        print(i,"|",n)  
        print("-----")  
        n=n//i
```

Output:

Enter a Number256

2 | 256

2 | 128

2 | 64

2 | 32

2 | 16

2 | 8

2 | 4

2 | 2

Q10. Write a python program to accept a number from the user and print the table of that number

```
#To Print the table of a given number
n=int(input("Enter a number"))
for i in range(1,11):
    print(n,"*",i,"=",n*i)
```

Output:

Enter a number3

3 * 1 = 3

3 * 2 = 6

3 * 3 = 9

3 * 4 = 12

3 * 5 = 15

3 * 6 = 18

3 * 7 = 21

3 * 8 = 24

3 * 9 = 27

3 * 10 = 30

Q11. Write a python program to print fibonacci series

```
#to print fibonacci series
n=int(input("Enter value of n"))
a=0
b=1
print(a)
print(b)
for i in range(2,n):
    c=a+b
    print(c)
    a=b
    b=c
```

Output:

Enter value of n25

0
1
1
2
3
5
8
13
21
34
55
89
144
233
377
610
987
1597
2584
4181
6765
10946
17711
28657
46368

