**PROGRAM :1**

#printing even number

i=2

while(i<=10):

print(i)

i=i+2

**OUTPUT :**

2

4

6

8

10

**PROGRAM :2**

#printing odd number

i=1

while(i<=10):

print(i)

i=i+2

**OUTPUT :**

1

3

5

7

9

**PROGRAM :3**

#using while

i=10

while(i>=1):

print(i)

i=i-1

**OUTPUT :**

10

9

8

7

6

5

4

3

2

1

**PROGRAM :4**

#printing tables

n=int(input("enter a number"))

i=1

while(i<=10):

print(n,"x",i,"=",n\*i)

i=i+1

**OUTPUT :**

enter a number 5

5 x 1 = 5

5 x 2 = 10

5 x 3 = 15

5 x 4 = 20

5 x 5 = 25

5 x 6 = 30

5 x 7 = 35

5 x 8 = 40

5 x 9 = 45

5 x 10 = 50

**PROGRAM :5**

#using functions

a=int(input("enter the value of a "))

b=int(input("enter the value of b "))

def add():

return a+b

def sub():

return a-b

def mul():

return a\*b

def div():

return a /b

def mod():

return a%b

print("addition =",add())

print("subtractin =",sub())

print("multiplication =",mul())

print("division =",div())

print("modulus =",mod())

**OUTPUT :**

enter the value of a 67

enter the value of b 76

addition = 143

subtractin = -9

multiplication = 5092

division = 0.881578947368421

modulus = 67

**PROGRAM :6**

# using function without input

def add(a,b):

return a+b

def sub(a,b):

return a-b

def mul(a,b):

return a\*b

def div(a,b):

return a /b

def mod(a,b):

return a%b

print("addition =",add(2,4))

print("subtractin =",sub(2,4))

print("multiplication =",mul(2,4))

print("division =",div(2,4))

print("modulus =",mod(2,4))

**OUTPUT :**

addition = 6

subtractin = -2

multiplication = 8

division = 0.5

modulus = 2

**PROGRAM :7**

#printing randon funtion

import random

while True:

i=input("enter 'n' to quit")

if(i=='n'):

print("Bye!")

exit()

else:

print("you got",random.randint(1,6))

**OUTPUT :**

enter 'n' to quit 4

you got 5

enter 'n' to quit5

you got 2

enter 'n' to quit4

you got 6

enter 'n' to quit5

you got 1

enter 'n' to quitn

Bye!

**PROGRAM :8**

#printing randon funtion

import random

while True:

i=input("enter 'r' to role 'q' to quit ")

if(i=='q'):

print("Bye!")

exit()

if(i=='r'):

print("role the dice ",random.randint(1,6))

**OUTPUT :**

enter 'r' to role 'q' to quit r

role the dice 2

enter 'r' to role 'q' to quit r

role the dice 2

enter 'r' to role 'q' to quit r

role the dice 4

enter 'r' to role 'q' to quit r

role the dice 5

enter 'r' to role 'q' to quit q

Bye!