

```
In [4]: 1 #Tell the output of this program
        2 name="surendra"
        3 if name=="surendra":
        4     print('thank you')
```

thank you

```
In [5]: 1 #Tell the output of this program
        2 num=10
        3 num1=10
        4 if 'num' is 'num1':
        5     print('same')
        6 else:
        7     print('differ')
```

differ

```
<>:3: SyntaxWarning: "is" with a literal. Did you mean "=="?
<>:3: SyntaxWarning: "is" with a literal. Did you mean "=="?
C:\Users\ashru\AppData\Local\Temp\ipykernel_4172\1561356444.py:3: SyntaxWarni
ng: "is" with a literal. Did you mean "=="?
    if 'num' is 'num1':
```

```
In [13]: 1 #Tell the output
        2 age=10
        3 if age=="10":
        4     print('thank you')
```

```
In [14]: 1 #Tell the output of this program
        2
        3 age=10
        4 if age=="10":
        5     print('thank you')
        6     print('thank you')
        7
        8
```

```
In [15]: 1 #Tell the output of this program
        2 age=10
        3 if age=="10":
        4     print('thank u1')
        5     print('thank u2')
```

thank u2

```
In [19]: 1 #Tell the output of this program
2 age=10
3 if age=="10":
4     print('thank you1')
5     print('thank you2')
6     print('thank you')
```

thank you

```
In [ ]: 1
```

```
In [22]: 1 #Tell the output of this program
2 age='10'
3 if age=="10":
4     print('thank you1')
5     print('thank you2')
6     print('thank you')
```

thank you1  
thank you2  
thank you

```
In [24]: 1 #Tell the output of this program
2 name="surendra"
3 if name:
4     print('thank you')
5     print('thank you1')
6     print('thank you2')
```

thank you  
thank you1  
thank you2

```
In [26]: 1 #Tell the output of this program
2 name=10
3 if name:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you1  
thank you2  
thank you3

```
In [27]: 1 #Tell the output of this program
2 name=None
3 if name:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

```
In [29]: 1 #Tell the output of this program
2 x=-90
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you1  
thank you2  
thank you3

```
In [30]: 1 #Tell the output of this program
2 x=0
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

```
In [31]: 1 #Tell the output of this program
2 x=True
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you1  
thank you2  
thank you3

```
In [32]: 1 #Tell the output of this program
2 x=False
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

Type *Markdown* and LaTeX:  $\alpha^2$

```
In [34]: 1 #Tell the output of this program
2 x,y=10,20
3 if x==y:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

```
In [35]: 1 #Tell the output of this program
2 x=-0
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

```
In [36]: 1 #Tell the output of this program
2 x=''
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you3

```
In [37]: 1 #Tell the output of this program
2 x=' '
3 if x:
4     print('thank you1')
5     print('thank you2')
6     print('thank you3')
```

thank you1  
thank you2  
thank you3

```
In [39]: 1 #Tell the output of this program
2 l=['surendra','priyanka','rahu','zini']
3 if 'Priyanka' in l:
4     print('available')
```

```
In [42]: 1 #Tell the output of this program
2 l=['surendra','priyanka','rahu','zini']
3 if 'priyanka' in l:
4     print('available')
```

available

```
In [43]: 1 #Tell the output of this program
2 l=['surendra','priyanka','rahu','zini']
3 if not ('priyanka' not in l):
4     print('available')
```

available

```
In [ ]: 1 #if else
```

```
In [44]: 1 #Tell the output of this program
2 l=['surendra','priyanka','rahu','zini']
3 if 'dev' in l:
4     print('available')
5 else:
6     print('not available')
```

not available

```
In [45]: 1 #Tell the output of this program
2 num=10
3 if num:
4     print('surendra')
5 else:
6     print('priyanka')
```

surendra

```
In [46]: 1 #Tell the output of this program
2 num=10
3 if (if type(num)=='int'):
4     print('surendra')
5 else:
6     print('priyanka')
```

```
Cell In[46], line 2
    if (if type(num)=='int'):
        ^
SyntaxError: invalid syntax
```

```
In [47]: 1 #find out the output of this program
2 num=10
3 if if type(num)=='int':
4     print('surendra')
5 else:
6     print('priyanka')
```

Cell In[47], line 2  
if if type(num)=='int':  
^  
SyntaxError: invalid syntax

```
In [48]: 1 #find out the output of this program
2 num=10
3 if type(num)=='int':
4     print('surendra')
5 else:
6     print('priyanka')
```

priyanka

```
In [49]: 1 #find out the output of this progra
2 num=10
3 if type(num)==int:
4     print('surendra')
5 else:
6     print('priyanka')
```

surendra

```
In [51]: 1 #tell the number is positive or negative
2 num=10
3 if num>0:
4     print('positive')
5 else:
6     print('negative')
```

positive

```
In [52]: 1 #even or odd program
2 num=10
3 if num%2==0:
4     print('even')
5 else:
6     print('odd')
```

even

```
In [53]: 1 #same or differ
          2 num=10
          3 num1=10
          4 if num==num1:
          5     print('same')
          6 else:
          7     print('differ')
```

same

```
In [54]: 1 #same or differ
          2 num=10
          3 num1=10
          4 if num is num1:
          5     print('same')
          6 else:
          7     print('differ')
```

same

```
In [55]: 1 #same or differ
          2 num=10
          3 num1=10
          4 if 'num'=='num1':
          5     print('same')
          6 else:
          7     print('differ')
```

differ

```
In [56]: 1 #same or differ
          2 num=10
          3 num1=10
          4 if 'num'=='num':
          5     print('same')
          6 else:
          7     print('differ')
```

same

```
In [57]: 1 #same or differ
2 num=10
3 num1=10
4 if 'num' is 'num':
5     print('same')
6 else:
7     print('differ')
```

same

<>:3: SyntaxWarning: "is" with a literal. Did you mean "=="?

<>:3: SyntaxWarning: "is" with a literal. Did you mean "=="?

C:\Users\ashru\AppData\Local\Temp\ipykernel\_4172\1638888182.py:3: SyntaxWarning: "is" with a literal. Did you mean "=="?

```
if 'num' is 'num':
```

Type *Markdown* and LaTeX:  $\alpha^2$

```
In [58]: 1 #program to find the number is present or not
2 num=35
3 if num==10:
4     print('ten')
5 elif num==20:
6     print('twenty')
7 elif num==30:
8     print('thirty')
9 else:
10     print('not ten not twenty not thirty')
```

not ten not twenty not thirty

```
In [59]: 1 #program to find the number is present or not
2 num=30
3 if num==10:
4     print('ten')
5 elif num==20:
6     print('twenty')
7 elif num==30:
8     print('thirty')
9 else:
10     print('not ten not twenty not thirty')
```

thirty



```
In [2]: 1 #program to find the number is present or not
2 num=30.0
3 if num==10:
4     print('ten')
5 elif num==20:
6     print('twenty')
7 elif num==30:
8     print('thirty')
9 else:
10     print('not ten not twenty not thirty')
```

thirty

```
In [ ]: 1 #nested if
```

```
In [3]: 1 #find out the output
2 age=26
3 height=6.0
4 if age>=22:
5     if (height>=5.7):
6         print('cong!')
7
```

cong!

```
In [5]: 1 #find out the output
2 age=26
3 height=3.8
4 if age>=22:
5     if (height>=5.7):
6         print('cong!')
7
```

```
In [6]: 1 #find out the output of this program
2 age=26
3 height=3.8
4 if age>=22:
5     if (height>=5.7):
6         print('cong!')
7     else:
8         print('your hegiht is less than 5.7')
9
```

your heiht is less than 5.7

```
In [7]: 1 #find out the output of this program
        2 age=16
        3 height=3.8
        4 if age>=22:
        5     if (height>=5.7):
        6         print('cong!')
        7     else:
        8         print('your hegiht is less than 5.7')
        9
```

```
In [8]: 1 #find out the output of this program
        2 age=16
        3 height=3.8
        4 if age>=22:
        5     if (height>=5.7):
        6         print('cong!')
        7     else:
        8         print('your heiht is less than 5.7')
        9 else:
       10     print('your age is less than 22')
       11
```

your age is less than 22

```
In [ ]: 1 #Dynamic input
```

```
In [9]: 1 name=input('enter your name')
        2 print(name)
```

enter your name  
ashru

```
In [10]: 1 #find the sum of two number using dynamic input
        2 a=input('enter a number for a: ')
        3 b=input('enter a number for b: ')
        4 sum=a+b
        5 print(sum) #when we don't declare the type of data then bydefault it act
        6
```

enter a number for a: 10  
enter a number for b: 20  
1020

```
In [11]: 1 #find the sum of two integer number using dynamic input
        2 a=int(input('enter a number for a: '))
        3 b=int(input('enter a number for b: '))
        4 sum=a+b
        5 print(sum)
```

enter a number for a: 10  
enter a number for b: 46  
56

```
In [12]: 1 #find the sum of two float number using dynamic input
2 a=float(input('enter a number for a: '))
3 b=float(input('enter a number for b: '))
4 sum=a+b
5 print(sum)
```

```
enter a number for a: 21
enter a number for b: 37
58.0
```

```
In [13]: 1 #find the sum of two integer number using dynamic input
2 a=int(input('enter a number for a: '))
3 b=(input('enter a number for b: '))
4 sum=a+b
5 print(sum)
```

```
enter a number for a: 23
enter a number for b: 24
```

```
-----
TypeError                                Traceback (most recent call last)
Cell In[13], line 3
      1 a=int(input('enter a number for a: '))
      2 b=(input('enter a number for b: '))
----> 3 sum=a+b
      4 print(sum)
```

**TypeError:** unsupported operand type(s) for +: 'int' and 'str'

```
In [14]: 1 #find the sum of two integer number using dynamic input
2 num1=int(input(''))
3 num2=int(input(''))
4 print(num1+num2)
```

```
32
21
53
```

```
In [15]: 1 #wap to find out the value of two number using choice
2 num1=int(input('enter the value of a: '))
3 num2=int(input('enter the value of b: '))
4 choice=input('enter a choice[+-*/]')
5 if choice=='+':
6     print(num1+num2)
7 elif choice=='-':
8     print(num1-num2)
9 elif choice=='*':
10    print(num1*num2)
11 elif choice=='/':
12    print(num1/num2)
13 else:
14    print('invalid option')
```

```
enter the value of a: 23
enter the value of b: 34
enter a choice[+-*/]+
57
```

```
In [1]: 1 #wap to find out the value of two number using choice
2 num1=int(input('enter the value of a: '))
3 num2=int(input('enter the value of b: '))
4 choice=input('enter a choice[+-*/]')
5 if choice=='+':
6     print(num1+num2)
7 elif choice=='-':
8     print(num1-num2)
9 else:                                     #we cant use else after the elif condition
10    print('invalid option')
11 elif choice=='*':
12    print(num1*num2)
13 elif choice=='/':
14    print(num1/num2)
15
```

```
Cell In[1], line 11
elif choice=='*':
^
SyntaxError: invalid syntax
```

```
In [17]: 1 #print u r name 5 times in while loop
2 i=1
3 while i<=5:
4     print('ashru')
5     i=i+1
```

```
ashru
ashru
ashru
ashru
ashru
```

```
In [18]: 1 #find out the output of this program
          2 i=1
          3 while i<=5:
          4     print('ashru')
          5     i=i+1
          6 print(i)
```

ashru  
ashru  
ashru  
ashru  
ashru  
6

```
In [2]: 1 #print the id of ur name
          2 i=1
          3 while i<=5:
          4     print(id(i))
          5     print('ashru')
          6     i=i+1
          7 print(i)
```

140715842507560  
ashru  
140715842507592  
ashru  
140715842507624  
ashru  
140715842507656  
ashru  
140715842507688  
ashru  
6

```
In [20]: 1 #print ur name in descending order
          2 i=5
          3 while i>=1:
          4     print('ashru')
          5     i=i-1
          6 print(i)
```

ashru  
ashru  
ashru  
ashru  
ashru  
0

```
In [21]: 1 #Find the output of this program
2 i=1
3 while i<=20:
4     print('ashru')
5     i=i+3
```

ashru  
ashru  
ashru  
ashru  
ashru  
ashru  
ashru

```
In [23]: 1 #Find the output of this program
2 i=1
3 while i>=5:
4     print('ashru')
5     i=i-1
6 print(i)
```

1

```
In [25]: 1 #Find the output of this program
2 i=1
3 while i<=20:
4     print(i)
5     i=i+3
```

1  
4  
7  
10  
13  
16  
19

```
In [31]: 1 #Find the output of this program
2 i=1
3 while i<=10:
4     if i%2==0:
5         print(i)
6     i=i+1
```

2  
4  
6  
8  
10

```
In [32]: 1 #wap to print the number which is not divisible by 1 to 10
2 i=1
3 while i<=10:
4     if i%2!=0:
5         print(i)
6         i=i+1
```

```
1
3
5
7
9
```

```
In [34]: 1 #print the pattern
2 *
3 **
4 ***
5 ****
6 *****
7 i=1
8 while i<=5:
9     print(i*'*')
10    i=i+1
```

```
*
**
***
****
*****
```

```
In [37]: 1 #print the pattern
2 *****
3 ****
4 ***
5 **
6 *
7 i=5
8 while i>=1:
9     print(i*'*')
10    i=i-1
```

```
*****
****
***
**
*
```

```
In [38]: 1 #find out the output of this code
          2 i=1
          3 while i<=5:
          4     print(i*i)
          5     i=i+1
```

```
1
4
9
16
25
```