

```
In [1]: if True:
        print('Data Science')
```

Data Science

```
In [2]: if False:
        print('Hiii')
        print('Bye')
```

Bye

```
In [3]: if True:
        print('Data Science')
        print('By for now')
```

Data Science

By for now

```
In [7]: #Number is Even or Odd
x = 4
r= x % 2
if r ==0:
    print('Even number')
```

Even number

```
In [9]: x=5
r=x%2
if r ==0:
    print('number is even')
```

```
In [11]: x=5
r=x%2
if r==0:
    print('Even Number')
print('odd number')
```

odd number

```
In [13]: x=8
r=x%2
if r==0:
    print('Even Number')
print('odd number')
```

Even Number

odd number

```
In [15]: x=13
r=x%2

if r==0:
    print('Even number')
if r==1:
    print('odd number')
```

odd number

```
In [17]: x=19
r=x %2
```

```
if r==0:  
    print('Even number')  
if r !=0:  
    print('Odd number')
```

Odd number

```
In [19]: x=3  
r=x%2  
if r==0:  
    print('Even number')  
    if x>5:  
        print('greater number')  
else:  
    print('odd number')
```

odd number

```
In [21]: x=4  
r=x%2  
if r ==0:  
    print('Even number')  
    if x>5:  
        print('greater number')  
else:  
    print('odd number')
```

Even number

```
In [23]: x=8  
r=x%2  
if r==0:  
    print('Even number')  
    if x >5:  
        print('greater number')  
else:  
    print('odd number')
```

Even number

greater number

```
In [25]: x=4  
r=x%2  
if r==0:  
    print('Even number')  
    if x>5:  
        print('greater number')  
    else:  
        print('smaller number')  
else:  
    print('odd number')
```

Even number

smaller number

if--elif--else

```
In [27]: x=9  
if x==1:
```

```
print('one')
elif x==2:
    print('two')
elif x==3:
    print('three')
elif x==4:
    print('four')
else:
    print('number not found')
```

number not found

Loops

```
In [29]: i=1

while i<=5:
    print('Data Science')
    i=i+1
```

Data Science
Data Science
Data Science
Data Science
Data Science

```
In [30]: i=1
while i<5:
    print('Data Science:' ,i)
    i+=1
```

Data Science: 1
Data Science: 2
Data Science: 3
Data Science: 4

```
In [35]: i=5
while i >=1:
    print('Data Science:',i)
    i-=1
```

Data Science: 5
Data Science: 4
Data Science: 3
Data Science: 2
Data Science: 1

```
In [37]: i=1
while i<=5:
    print('Data Science')
    j=1
    while j<=5:
        print('Technolog')
        j+=1
    i+=1
    print()
```

Data Science
Technolog
Technolog
Technolog
Technolog
Technolog

Data Science
Technolog
Technolog
Technolog
Technolog
Technolog

Data Science
Technolog
Technolog
Technolog
Technolog
Technolog

Data Science
Technolog
Technolog
Technolog
Technolog
Technolog

Data Science
Technolog
Technolog
Technolog
Technolog
Technolog

For Loop

```
In [39]: Name='Naresh'  
for i in Name:  
    print(i)
```

N
a
r
e
s
h

```
In [40]: name=[2,3.5,True,'Hello']  
for i in name:  
    print(i)
```

2
3.5
True
Hello

```
In [41]: range(8)
```

```
Out[41]: range(0, 8)
```

```
In [46]: for i in range(8):  
         print(i)
```

```
0  
1  
2  
3  
4  
5  
6  
7
```

```
In [48]: for i in range(1,10,3):  
         print(i)
```

```
1  
4  
7
```

```
In [50]: for i in range(1,21):  
         print(i)
```

```
1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20
```

```
In [52]: for i in range(1,51):  
         if i %3==0 or i%5==0:  
             print(i)
```

3
5
6
9
10
12
15
18
20
21
24
25
27
30
33
35
36
39
40
42
45
48
50

```
In [54]: for i in range(1,51):  
         if i%3==0 and i%5!=0:  
             print(i)
```

3
6
9
12
18
21
24
27
33
36
39
42
48

```
In [ ]: x=int(input('Enter the Numer:'))  
  
i=1  
while i<=x:  
    print('Chocolate')  
    i+=1
```

```
In [34]: available_chocolate=5  
x=int(input('How Many Chocolate You Want:'))  
i=1  
while i<=x:  
    print('Chocolate')  
    i+=1
```

Chocolate
Chocolate
Chocolate
Chocolate
Chocolate
Chocolate

```
In [40]: available_chocolate=5
x=int(input('How Many Chocolate You Want:'))
i=1
while i<=x:
    if i > available_chocolate:
        print('Out of stock')
        break
    print('Dispatching Chocolate')
    i+=1
```

Dispatching Chocolate
Dispatching Chocolate

```
In [50]: limit=15
x=int(input('How Many Monety You Want to Withdraw:'))
i=10
while i<=x:
    if i > limit:
        print('Insufficient Balance')
        break
    i+=1
    print('Collect Your money')
print('You can withdraw utto 15K only at a time')
print('Thank you and visit Again')
```

You can withdraw utto 15K only at a time
Thank you and visit Again

```
In [58]: for i in range(1,11):
        if i==6:
            continue
        print(i)
```

1
2
3
4
5
7
8
9
10

```
In [60]: for i in range(1,11):
        if i==6:
            continue
        print(i)
```

1
2
3
4
5
7
8
9
10

```
In [62]: for i in range(1,11):
```

Cell In[62], line 2

^

SyntaxError: incomplete input

you need to print the number from 1 to 50 but
dont print the nummber which is divisible by 3 or
5

```
In [67]: for i in range(1,51):  
         print(i,end=' ')
```

1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30
31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50

```
In [75]: for i in range(1,51):  
         if i% 3==0 or i%5 ==0:  
             continue  
         print(i)
```


1
2
4
7
8
11
13
14
16
17
19
22
23
26
28
29
31
32
34
37
38
41
43
44
46
47
49

```
In [77]: for i in range(1,51):  
         if i%3==0 and i%5==0:  
             continue  
         print(i)  
         print('End')
```

1
2
3
4
5
6
7
8
9
10
11
12
13
14
16
17
18
19
20
21
22
23
24
25
26
27
28
29
31
32
33
34
35
36
37
38
39
40
41
42
43
44
46
47
48
49
50
End

Write a python code to print the values are even numbers that means print only odd number

```
In [84]: for i in range(1,51):  
         if i%2==0:  
             continue  
         print(i)  
         print('Displayed odd number list')
```

```
1
3
5
7
9
11
13
15
17
19
21
23
25
27
29
31
33
35
37
39
41
43
45
47
49
Displayed odd number list
```

Printing Patterns in Python

```
In [89]: for i in range(4):
          print('# # # #')
```

```
# # # #
# # # #
# # # #
# # # #
```

```
In [97]: for i in range(1,5):
          i+=1
          print('# # # #')
```

```
# # # #
# # # #
# # # #
# # # #
```

```
In [99]: for i in range(4):
          print('#')
```

```
#
#
#
#
```

```
In [101]: for i in range(4):
           print('#',end=' ')
```

```
# # # #
```

```
In [103... for i in range(4):
              print('#',end=' ')
            for i in range(4):
              print('#',end=' ')
```

```
# # # # # # # #
```

```
In [105... for i in range(4):
              print('#',end=' ')
            print()
            for i in range(4):
              print('#',end=' ')
```

```
# # # #
# # # #
```

```
In [109... for i in range(4):
              print('#',end=' ')
            print()
            for i in range(4):
              print('#',end=' ')
            print()
            for i in range(4):
              print('#',end=' ')
            print()
            for i in range(4):
              print('#',end=' ')
```

```
# # # #
# # # #
# # # #
# # # #
```

```
In [113... for i in range(4):
            for j in range(4):
              print('#',end=' ')
            print()
```

```
# # # #
# # # #
# # # #
# # # #
```

```
In [118... for i in range(4):
            for j in range(i+1):
              print('#',end=' ')
            print()
```

```
#
# #
# # #
# # # #
```

```
In [134... for i in range(1,5):
            print('# '*i)
```

```
#
# #
# # #
# # # #
```

```
In [150... for i in range(4):
    for j in range(4-i):
        print('#',end=' ')
    print()
```

```
# # # #
# # #
# #
#
```

for|Else Loop

```
In [153... num=[12,15,18,21,26]

for i in num:
    if i%5==0:
        print(i)
```

15

```
In [157... num=[12,15,18,21,26]

for i in num:
    if i %5==0:
        print(i)
        break
```

15

```
In [165... num=[12,18,21,26,28,99,67]
for i in num:
    if i%5==0:
        print(i)
        break
    else:
        print('Number not found')
```

```
Number not found
Number not found
Number not found
Number not found
Number not found
Number not found
Number not found
```

```
In [167... num=[12,18,21,26,55,28,99,67]
for i in num:
    if i%5==0:
        print(i)
        break
    else:
        print('Number not found')
```

```
Number not found
Number not found
Number not found
Number not found
55
```

```
In [ ]: num=29
        for i in range(2,num):
            if num%i==0:
                print(f'{num} is not prime')
            else:
                print(f'{num} is prime')
```

```
In [ ]:
```

```
In [ ]:
```