ERRORS IN PYTHON:-

1.syntax error:- syntax errors are occured when we fotgot :,;,"",''.
2.value error or name error or attribute error:- we are given a,b,c values and
enter d value then this type of errors are occured.
3.indentation error or space error:- these are occured in(loops,conditional statements)

PRINT FUNCTION():-

print is used for displaying information/text
it is two types1.value print
2.message with value print

In [1]:
```
a=12
print(a) ------->value
```

```
12
```

In [3]:
```
a =12
print('value of a=',a) -------->message with value
```

```
value of a= 12
```

```
/* if we want to know the type of the string */
```

In [13]:
```
st="1 2 3"
print(type(st))
```

```
<class 'str'>
```

In [8]:
```
print(st,type(st),id(st))
```

```
1 2 3 <class 'str'> 2309053313456
```

/* if we want to convert string to integer */

In [17]:
```
st = "1 2 3"
print(int(st))
```

```
---------------------------------------------------------------------------
ValueError                                Traceback (most recent call last)
<ipython-input-17-11727d25434a> in <module>
      1 st = "1 2 3"
----> 2 print(int(st))

ValueError: invalid literal for int() with base 10: '1 2 3'
```

VARIABLE:-

variable is a condition is used to store the data/value.

In [18]:
```
a=10
print(a)
```

```
10
```

In [19]:
```
print(a,type(a),id(a))
```

```
10 <class 'int'> 140721965840448
```

In [20]:
```
b=10
a==b
print(a,type(a),id(a))
print(b,type(b),id(b))
```

```
10 <class 'int'> 140721965840448
10 <class 'int'> 140721965840448
```

```
= .....> assignment
== .....>comparision
```

variables assignment are two types

1.multi value assignment
2.multi variable assignment

In [21]:
```
a=10          * multi value assignment *
b=10
a=b=10
print(a,type(a),id(a))
print(b,type(b),id(b))
```

```
10 <class 'int'> 140721965840448
10 <class 'int'> 140721965840448
```

In [22]:
```
num1=30       * multi variable assignment *
num2=40
print(num1,type(num1),id(num1))
print(num2,type(num2),id(num2))
```

```
30 <class 'int'> 140721965841088
40 <class 'int'> 140721965841408
```

DYNAMIC READING:-

1.input():- is used to read the string values.
2.int(input()):-is used to read the integer values.
3.float(input()):- is used to read the float values.

TYPE CASTING:-

converting one type of data into another type of data.

```
1.int to float
2.float to int
3.int to string
4.string to int
```

In [24]:
```
n=10
print(float(n),type(n),id(n))
```

```
10.0 <class 'int'> 140721965840448
```

In [25]:
```
f=10.3
print(int(f),type(f),id(f))
```

```
10 <class 'float'> 2309052491760
```

In [27]:
```
s='123'
print(s,type(s),id(s))
```

```
123 <class 'str'> 2309053396912
```

In [28]:
```
name='king'
print(int(name))
```

```
---------------------------------------------------------------------------
ValueError                                Traceback (most recent call last)
<ipython-input-28-b4cd6d090170> in <module>
      1 name='king'
----> 2 print(int(name))

ValueError: invalid literal for int() with base 10: 'king'
```

```
write a program to perform an airthematic operatos
m=4
n=5
```

In [29]:
```
m=4
n=5
print("add of two values is",m+n)
print("sub of two values is",m-n)
print("mul of two vales is",m*n)
print("div of two values is",m/n)
```

```
add of two values is 9
sub of two values is -1
mul of two vales is 20
div of two values is 0.8
```

*3*8=24 read these two numbers*
multiplication of 3 and 8 is 24

In [30]:
```
m=int(input())
n=int(input())
print('multiplication of','m','and','n','=',m*n)
```

```
3
8
multiplication of m and n = 24
```

In [ ]:
```

```