

# Variables

- Variables are used to store the data
- The Data can be change
- These Variables can be use to manipulate python code

```
In [1]: number=100
        # 100 is stored in a variable called as number
        number
```

Out[1]: 100

```
In [2]: NUMBER=200
        NUMBER
```

Out[2]: 200

```
In [3]: number,NUMBER
```

Out[3]: (100, 200)

```
In [4]: NUMber=300
        NUMber
```

Out[4]: 300

```
In [5]: number,NUMBER,NUMber
```

Out[5]: (100, 200, 300)

```
In [6]: number123=400
        number123
```

Out[6]: 400

```
In [7]: 123number=500
        123number
```

```
Cell In[7], line 1
    123number=500
    ^
SyntaxError: invalid decimal literal
```

```
In [9]: # type first two letter enter tab
        number
        number123
```

Out[9]: 400

**Note:**

- Variables generally in black color
- Green color should not be a variables
- numbers as suffix can work
- numbers as prefix fail

```
In [10]: number$=600
number$
```

```
Cell In[10], line 1
  number$=600
    ^
SyntaxError: invalid syntax
```

- spl charcaters does not allowed

```
In [11]: number one=200
number one
```

```
Cell In[11], line 1
  number one=200
    ^
SyntaxError: invalid syntax
```

```
In [12]: number_one=300
number_one
```

```
Out[12]: 300
```

- underscore can use as variable

```
In [ ]: numberone
number_one
```

```
In [13]: _=1000
_
```

```
Out[13]: 1000
```

```
In [ ]: number=100 # w
NUMBER=200 # w
NUMber=300 # w
number123=400 # w
123number=500 # f
number%=600 # f
number one=700 # f
number_one=800 # w
_=900# w
```

```
In [14]: if=1000
```

```
Cell In[14], line 1
    if=1000
      ^
SyntaxError: invalid syntax
```

```
In [ ]: for
        while
        True
        False
```

**keywords can not use as Varibales**

```
In [ ]:
```