File I/O

In [ ]: FILE I/O referes to the process of reading data **from** files(input) **and** writing th

In [ ]:
```
File :


file path

file mode method - r,rw,r+,ra, wr,w+,wa,

File Buffering - size

encoding method-utf-8, utf-16,ASCII, ISO-LATIN1
```

In [10]:
```python
# basic file create
f = open('demo.txt','w+')
f.read()
f.close() # always close the files.


where -->
##  Mode Methods
r -- read
w --> write
w+---> create/write
rw+--->read,create/write
w+r -->
a--> append
r+ --> read/write
b --binary files
rb - read binary
wb - write binary
ab -- append binary
```

In [11]:
```python
# 2



with open('example.txt','w+') as file:
    file.write("Hi, This is the python lecture class")
```

In [ ]:
```
with -- > context manager

1- automatically close the file
2 - memory management is good compare to basic file opening
```

In [ ]:
```python
# File Objects method

1- file.read()
2- file.write()
3- file.readlines()
```

```
4- file.close()
5- file.flush()
```

File Write

In [13]:
```python
f1  = open('C:\\Users\\jitud\\21-July\\python\\demo.txt','w')
f1.write("Hello, Python")
f1.close()
```

In [15]:
```python
# Or

with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','w') as f2:
    f2.write("Hello, worlds")
```

FILE READ

In [23]:
```python
with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','r') as f3:
    print(f3.read())
```

```
Hello, worlds
New Lines added
New Lines added
New Lines added
```

FILE Append

In [22]:
```python
with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','a') as f3:
    f3.write("\nNew Lines added")
```

File readlines

In [24]:
```python
with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','r') as f3:
    print(f3.readlines())
```

```
['Hello, worlds\n', 'New Lines added\n', 'New Lines added\n', 'New Lines added']
```

FIle specific no of characters

In [26]:
```python
with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','r') as f3:
    print(f3.read(7))
```

```
Hello,
```

File Positioning

In [ ]:
```python
File.tell
File.seek
```

In [31]:
```python
with open('C:\\Users\\jitud\\21-July\\python\\demo.txt','r+') as f3:
    print(f3.tell()) # current cursor position
    c = f3.read(5)
    print(f3.tell())
    f3.seek(0) # set the cursor postion
    print(f3.tell())
```

```
0
5
0
```

In [ ]:
```python
#

with open('file.txt', 'w+') as f:
    f.write()
    f.read()
    f.append()
```

In [ ]:
```python
try:

    with open('file.txt', 'w+') as f:
        f.write()
        f.read()
        f.append()
except Exception as e:
    print(e)
```