Python Pickling And Unpickling

The pickle module implements binary protocols for serializing and de-serializing a python object structure. 'Pickling'is the process whereby a python object heirarchy is converted into a byte stream and 'unpickling' is the inverse operation, whereby a byte stream (from a binary file or bytes-likes object) is converted back into an object heirarchy. pickling (and unpickling) is alternatively known as "serialization","marshalling", 1 or "flattening": however, to avoid confusion, the terms used here are "pickling" and "unpickling"

Pickle in python is primarily used in serializing and deserializing a python object structure.In other words. Its the process of converting a Python object into byte stream to store it in a file/database. maintain program state across session, or transport data over the network

In [1]:
```
import seaborn as sns
```

In [5]:
```
import pandas as pd
```

In [6]:
```
df=pd.read_csv('tips.csv')
```

In [7]:
```
df.head()
```

Out[7]:

	total_bill	tip	sex	smoker	day	time	size
0	16.99	1.01	Female	No	Sun	Dinner	2
1	10.34	1.66	Male	No	Sun	Dinner	3
2	21.01	3.50	Male	No	Sun	Dinner	3
3	23.68	3.31	Male	No	Sun	Dinner	2
4	24.59	3.61	Female	No	Sun	Dinner	4

In [8]:
```
import pickle
```

In [9]:
```
filename='file.pkl'
```

In [11]:
```
## serialize process
pickle.dump(df,open(filename,'wb'))
```

In [13]:
```
## unserialize
df=pickle.load(open(filename,'rb'))
```

In [14]:
```
df.head()
```

Out[14]:

	total_bill	tip	sex	smoker	day	time	size
0	16.99	1.01	Female	No	Sun	Dinner	2
1	10.34	1.66	Male	No	Sun	Dinner	3
2	21.01	3.50	Male	No	Sun	Dinner	3
3	23.68	3.31	Male	No	Sun	Dinner	2
4	24.59	3.61	Female	No	Sun	Dinner	4

In [17]:
```
dic_example={'first_name':'desh','last_name':'deepak'}
```

In [19]:
```
pickle.dump(dic_example,open('test.pkl','wb'))
```

In [21]:
```
pickle.load(open('test.pkl','rb'))
```

Out[21]:
```
{'first_name': 'desh', 'last_name': 'deepak'}
```

In [ ]:
```

```