Creating series from list

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

In [10]:
```
list_1 = [1, 2, -3, 4.5, 'indian']
print(list_1)
```

```
[1, 2, -3, 4.5, 'indian']
```

In [11]:
```
series1 = pd.Series(list_1)
print(series1)
```

```
0         1
1         2
2        -3
3       4.5
4    indian
dtype: object
```

In [14]:
```
#Creating Series using a different method
#List inside the series
series2 = pd.Series([1,2,3,4,5,6])
print(series2)
```

```
0    1
1    2
2    3
3    4
4    5
5    6
dtype: int64
```

In [20]:
```
# We can change index to any numbers, alphabates, names etc.
series2 = pd.Series([1,2,3,4,5], index = ['a', 'b', 'c', 'd', 'e'])
print(series2)
```

```
a    1
b    2
c    3
d    4
e    5
dtype: int64
```

In [19]:
```
#Index length should have equal to the number of data values, otherwise, it shows error
series2 = pd.Series([1,2,3,4,5], index = ['a', 'b', 'c'])
print(series2)
```

```
---------------------------------------------------------------------------
ValueError                                Traceback (most recent call last)
<ipython-input-19-4fd53dc5beb8> in <module>
      1 #Index length should have equal to the number of data values, otherwise, it shows error
----> 2 series2 = pd.Series([1,2,3,4,5], index = ['a', 'b', 'c'])
      3 print(series2)

~\AppData\Local\Continuum\anaconda3\lib\site-packages\pandas\core\series.py in __init__(self, data, index, dtype, name, copy,
fastpath)
    247                             'Length of passed values is {val}, '
    248                             'index implies {ind}'
--> 249                             .format(val=len(data), ind=len(index)))
    250                 except TypeError:
    251                     pass

ValueError: Length of passed values is 5, index implies 3
```

In [21]:
```
#Empy Series Object
empty_s = pd.Series([])
print(empty_s)
```

```
Series([], dtype: float64)
```

In [12]:
```
kulfi_list = ['Choclate','Bnana','cherry','strawberry']
seriesObj = pd.Series(kulfi_list)
print(seriesObj)
```

```
0      Choclate
1         Bnana
2        cherry
3    strawberry
dtype: object
```

In [15]:
```
lottery = [10,20,30,40,50,60,40]
lot_s = pd.Series(lottery)
print(lot_s)
```

```
0    10
1    20
2    30
3    40
4    50
5    60
6    40
dtype: int64
```

In [16]:
```
reg = [True,False,True,True,False,True]
reg_s = pd.Series(reg)
print(reg_s)
```

```
0     True
1    False
2     True
3     True
4    False
5     True
dtype: bool
```

In [9]:
```
pd.__version__
```

Out[9]: '0.24.2'

In [22]:
```
# Changing data type of series
series2 = pd.Series([1,2,3,4,5], index = ['a', 'b', 'c', 'd', 'e'], dtype = float)
print(series2)
```

```
a    1.0
b    2.0
c    3.0
d    4.0
e    5.0
dtype: float64
```

In [24]:
```
#  Creating series from scalar values
# scalar values means single value
s3_scalar = pd.Series(2)
print(s3_scalar)
```

```
0    2
dtype: int64
```

In [ ]:
```
# more data values index should be needed.
s3_scalar = pd.Series(2, index = [1,2,3,4,5])
print(s3_scalar)
```