In [1]:
```
import pandas as pd
```

q1

In [5]:
```
list=[4,8,12,14,36,42]
```

In [6]:
```
pd.Series(list)
```

Out[6]:
```
0     4
1     8
2    12
3    14
4    36
5    42
dtype: int64
```

q2

In [7]:
```
x=pd.Series(["she","is","good","girl"])
```

In [8]:
```
x
```

Out[8]:
```
0     she
1      is
2    good
3    girl
dtype: object
```

q3

In [9]:
```
data={"name":["alice","bob","claire"],"age":[25,30,27],"gender":["female","mal
```

In [10]:
```
df=pd.DataFrame(data)
```

In [11]:
```
df
```

Out[11]:

	name	age	gender
0	alice	25	female
1	bob	30	male
2	claire	27	female

q4

In [13]:
```
#DataFrame in pandas is a 2d data structure like 2d array or we can say that a
```

In [ ]:
```
#series is a 1d data structure that consist of key value pAIR.it provide a  fr
```

In [15]:
```
data=[1000,5677,5678]
s=pd.Series(data)
s
```

Out[15]:
```
0    1000
1    5677
2    5678
dtype: int64
```

In [16]:
```
data=[1000,5677,5678]
s=pd.DataFrame(data)
s
```

Out[16]:

	0
0	1000
1	5677
2	5678

q5

In [19]:
```
df=pd.read_csv("data.csv")
```

In [20]:
```
df
```

Out[20]:

	name	rollno	phone_no
0	kriti	678	987655
1	lalit	567	87543
2	palak	345	908543
3	kirtika	678	4678993
4	kevin	562	6754290
5	khushi	234	78123456
6	pinky	512	79873456

In [21]:
```
df.head()
```

Out[21]:

	name	rollno	phone_no
0	kriti	678	987655
1	lalit	567	87543
2	palak	345	908543
3	kirtika	678	4678993
4	kevin	562	6754290

In [23]:
```
df.head(2)
```

Out[23]:

	name	rollno	phone_no
0	kriti	678	987655
1	lalit	567	87543

In [24]:
```
df.tail(3)
```

Out[24]:

	name	rollno	phone_no
4	kevin	562	6754290
5	khushi	234	78123456
6	pinky	512	79873456

In [27]:
```
type(df)
```

Out[27]:
```
pandas.core.frame.DataFrame
```

In [28]:
```
df.dtypes
```

Out[28]:
```
name        object
rollno       int64
phone_no     int64
dtype: object
```

In [29]:
```
df.columns
```

Out[29]:
```
Index(['name', 'rollno', 'phone_no'], dtype='object')
```

In [30]:
```
df["name"]
```

Out[30]:
```
0      kriti
1      lalit
2      palak
3    kirtika
4      kevin
5     khushi
6      pinky
Name: name, dtype: object
```

q6

In [ ]:
```
series are mutable means we can chnage any value in series but the size of ser
```

q7

In [32]:
```
name=pd.Series(["atul","rani","kajal"])
```

In [33]:
```
course=pd.Series(["data science","java","web app"])
```

In [34]:
```
fees=pd.Series([30000,8900,5600])
```

In [37]:
```
df=pd.concat([name,course,fees],axis=1)
```

In [38]:
```
df
```

Out[38]:

	0	1	2
0	atul	data science	30000
1	rani	java	8900
2	kajal	web app	5600

In [ ]:
```

```