Create a dataframe as follows using Pandas

	Chemistry	Physics	Mathematics	English
Subodh	67	45	50	19
Ram	90	92	87	90
Abdul	66	72	81	72
John	32	40	12	68

In [8]:
```
import pandas as pd
import numpy as np
marks = {'Chemistry': [67,90,66,32],
        'Physics': [45,92,72,40],
        'Mathematics': [50,87,81,12],
        'English': [19,90,72,68]}
marks_df = pd.DataFrame(marks, index = ['Subodh', 'Ram', 'Abdul', 'John'])
marks_df
```

Out[8]:

	Chemistry	Physics	Mathematics	English
Subodh	67	45	50	19
Ram	90	92	87	90
Abdul	66	72	81	72
John	32	40	12	68

The teacher wants to create a new column called total and the value of each row in total column should be the sum of all marks of each student

In [21]:
```
marks_df['Total'] = marks_df['Chemistry'] + marks_df['Physics'] + marks_df['Mathematics'] + marks_df['English']
marks_df
```

Out[21]:

	Chemistry	Physics	Mathematics	English	Total
Subodh	67	45	50	19	181
Ram	90	92	87	90	359
Abdul	66	72	81	72	291
John	32	40	12	68	152

Drop the Total column

In [10]:
```
marks_df.drop(columns = 'Total', inplace = True)
marks_df
```

Out[10]:

	Chemistry	Physics	Mathematics	English
Subodh	67	45	50	19
Ram	90	92	87	90
Abdul	66	72	81	72
John	32	40	12	68

The teacher wants to award five bonus marks to all the students.

In [11]:
```
new_marks = marks_df + 5
new_marks
```

Out[11]:

	Chemistry	Physics	Mathematics	English
Subodh	72	50	55	24
Ram	95	97	92	95
Abdul	71	77	86	77
John	37	45	17	73

The teacher wants to increase the marks of all the students as follows-

- Chemistry: + 5
- Physics: + 10
- Mathematics: +10
- English: + 2

In [12]:
```
new_marks = marks_df + [5,10,10,2]
new_marks
```

Out[12]:

	Chemistry	Physics	Mathematics	English
Subodh	72	55	60	21
Ram	95	102	97	92
Abdul	71	82	91	74
John	37	50	22	70

The teacher wants to get the total marks scored in each subject

In [13]:
```
marks_df.apply(np.sum, axis = 0)
```

Out[13]:
```
Chemistry      255
Physics        249
Mathematics    230
English        249
dtype: int64
```

The teacher wants to get the total marks scored by each student.

In [14]:
```
marks_df.apply(np.sum, axis = 1)
```

Out[14]:
```
Subodh    181
Ram       359
Abdul     291
John      152
dtype: int64
```

The teacher wants to hide the marks of the students who scored less than 35 marks and display Fail in place of those marks

In [19]:
```
f = marks_df < 35
marks_df.mask(f, 'Fail')
```

Out[19]:

	Chemistry	Physics	Mathematics	English
Subodh	67	45	50	Fail
Ram	90	92	87	90
Abdul	66	72	81	72
John	Fail	40	Fail	68