## Pokemon

✓ Introduction:

This time you will create the data.

## Step 1. Import the necessary libraries

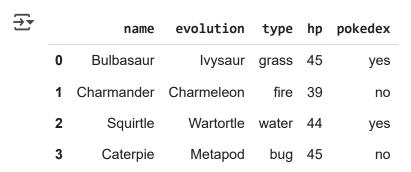
```
import pandas as pd
```

Step 2. Create a data dictionary that looks like the DataFrame below

```
data = {
    'name': ['Bulbasaur', 'Charmander', 'Squirtle', 'Caterpie'],
    'evolution': ['Ivysaur', 'Charmeleon', 'Wartortle', 'Metapod'],
    'type': ['grass', 'fire', 'water', 'bug'],
    'hp': [45, 39, 44, 45],
    'pokedex': ['yes', 'no', 'yes', 'no']
}
```

Step 3. Assign it to a variable called pokemon

```
pokemon = pd.DataFrame(data)
pokemon
```



Step 4. Ops...it seems the DataFrame columns are in alphabetical order.

Place the order of the columns as name, type, hp, evolution, pokedex

 $\rightarrow$ 

pokemon = pokemon[['name', 'type', 'hp', 'evolution', 'pokedex']]
pokemon

	name	type	hp	evolution	pokedex
0	Bulbasaur	grass	45	lvysaur	yes
1	Charmander	fire	39	Charmeleon	no
2	Squirtle	water	44	Wartortle	yes
3	Caterpie	bug	45	Metapod	no

Step 5. Add another column called place, and insert what you have in mind.

pokemon['place'] = ['Viridian Forest', 'Mt. Ember', 'Cerulean City', 'Route 2']
pokemon

<ipython-input-17-f6ac8f96d737>:1: SettingWithCopyWarning:
 A value is trying to be set on a copy of a slice from a DataFrame.
 Try using .loc[row\_indexer,col\_indexer] = value instead

See the caveats in the documentation: <a href="https://pandas.pydata.org/pandas-docs/stable/user">https://pandas.pydata.org/pandas-docs/stable/user</a> pokemon['place'] = ['Viridian Forest', 'Mt. Ember', 'Cerulean City', 'Route 2']

	name	type	hp	evolution	pokedex	place
0	Bulbasaur	grass	45	lvysaur	yes	Viridian Forest
1	Charmander	fire	39	Charmeleon	no	Mt. Ember
2	Squirtle	water	44	Wartortle	yes	Cerulean City
3	Caterpie	bug	45	Metapod	no	Route 2

## Step 6. Present the type of each column

pokemon.dtypes

BONUSiy Great @ jy our own question and answer it.

**hp** int64

bomuช่างpokiemon > 40hp trong pokedex

pokedex object

filtered\_pokemon = pokemon[(pokemon['hp'] > 40) & (pokemon['pokedex'] == 'yes')]
filtered\_pokemon

atype: object

**→** 

•		name	type	hp	evolution	pokedex	place
	0	Bulbasaur	grass	45	Ivysaur	yes	Viridian Forest
	2	Squirtle	water	44	Wartortle	yes	Cerulean City