

```
import pandas as pd
import numpy as np
```

```
from google.colab import files
uploaded=files.upload()
```

No file chosen Upload widget is only available when the cell has been executed in the current browser session. Please rerun this cell to enable.
Saving pd1.csv to pd1.csv

```
uploaded
```

```
{'pd1.csv': b'Sunny,Warm,Normal ,Strong,Warm,Same ,Yes\r\nSunny,Warm,High,Strc
```

```
import io
data = io.BytesIO(uploaded['pd1.csv'])
```

```
data = pd.read_csv(data)
data
```

```
↗
```

	Sunny	Warm	Normal	Strong	Warm.1	Same	Yes
0	Sunny	Warm	High	Strong	Warm	Same	Yes
1	Rainy	Cold	High	Strong	Warm	Change	No
2	Sunny	Warm	High	Strong	Cool	Change	Yes

```
d = np.array(data)[:,-1]
```

```
d
```

```
array(['Sunny', 'Warm', 'High', 'Strong', 'Warm', 'Same'],
      ['Rainy', 'Cold', 'High', 'Strong', 'Warm', 'Change'],
      ['Sunny', 'Warm', 'High', 'Strong', 'Cool', 'Change']],
      dtype=object)
```

```
target = np.array(data)[:,-1]
target
```

```
array(['Yes', 'No', 'Yes'], dtype=object)
```

```
def train(c,t):
    for i,val in enumerate(t):
        if val=="Yes":
            specific_hypo=c[i].copy()
            break;
    for i,val in enumerate(c):
        if(t[i]=="Yes"):
            for x in range(len(specific_hypo)):
```

```
        if(val[x]!=specific_hypo[x]):  
            specific_hypo[x] = '?'  
        else:  
            pass  
    return specific_hypo;
```

```
s=train(d,target)
```

```
print("The final hypothesis is:",s)
```

```
The final hypothesis is: ['Sunny' 'Warm' 'High' 'Strong' '?' '?']
```