

```
In [13]: import pandas as pd
import matplotlib.pyplot as plt

fifa_data = pd.read_csv("C:\\Users\\GOKUL\\Downloads\\fifa_data.csv")
fifa_data.head()
```

```
Out[13]:
```

	Unnamed: 0	ID	Name	Age	Photo	Nationality	Flag	Overall	Potential	Club	...	Cor
0	0	158023	L. Messi	31	https://cdn.sofifa.org/players/4/19/158023.png	Argentina	https://cdn.sofifa.org/flags/52.png	94	94	FC Barcelona	...	
1	1	20801	Cristiano Ronaldo	33	https://cdn.sofifa.org/players/4/19/20801.png	Portugal	https://cdn.sofifa.org/flags/38.png	94	94	Juventus	...	
2	2	190871	Neymar Jr	26	https://cdn.sofifa.org/players/4/19/190871.png	Brazil	https://cdn.sofifa.org/flags/54.png	92	93	Paris Saint-Germain	...	
3	3	193080	De Gea	27	https://cdn.sofifa.org/players/4/19/193080.png	Spain	https://cdn.sofifa.org/flags/45.png	91	93	Manchester United	...	
4	4	192985	K. De Bruyne	27	https://cdn.sofifa.org/players/4/19/192985.png	Belgium	https://cdn.sofifa.org/flags/7.png	91	92	Manchester City	...	

5 rows x 89 columns

Which country has the most number of players

```
In [15]: # Counting players by country and finding the country with the most players
most_players_country = fifa_data['Nationality'].value_counts().idxmax()
print("Country with the most players:", most_players_country)
```

Country with the most players: England

```
In [ ]: Insight:The country with the most number of player is England in FIFA World cup 2020.
```

Which player has the highest salary?

```
In [35]: highest_salary_player = fifa_data.loc[fifa_data['Wage'].idxmax()]['Name']
print(f"The player with the highest salary is: {highest_salary_player}")
```

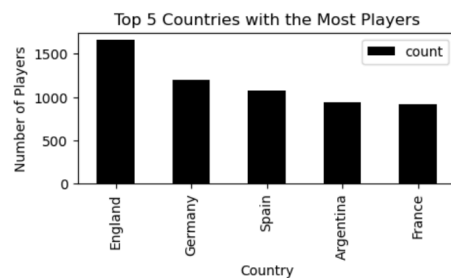
The player with the highest salary is: L. Messi

```
In [ ]: Insight:The player with th highest salary is Lionel Messi in FIFA World cup 2020
```

Plot a bar chart of 5 top countries with the most number of players

```
In [30]: # Getting the top 5 countries with the most players
top_countries = fifa_data['Nationality'].value_counts().head()

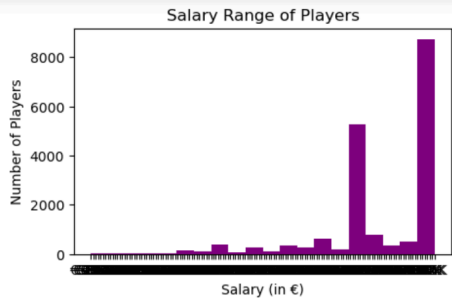
# Plotting the bar chart
plt.figure(figsize=(5,2))
top_countries.plot(kind='bar', color='black')
plt.title('Top 5 Countries with the Most Players')
plt.xlabel('Country')
plt.ylabel('Number of Players')
plt.legend()
plt.show()
```



```
In [ ]: Insight:The bar chart shows that the top 5 countries with the most number of players are England,Germany,Spain,Argentina,France.
```

Plot a histogram to get the salary range of the players

```
In [18]: # Plotting the histogram
plt.figure(figsize=(5,3))
plt.hist(fifa_data['Wage'], bins=20, color='purple')
plt.title('Salary Range of Players')
plt.xlabel('Salary (in €)')
plt.ylabel('Number of Players')
plt.show()
```



In [] : Insight:The histogram shows that most players have a salary in lower range,with a few players having extremely high salaries.

Who is the tallest player in the FIFA

```
In [8]: import pandas as pd

# Load the dataset
fifa_data1 = pd.read_csv("C:\\Users\\GOKUL\\Downloads\\fifa_data.csv")
fifa_data1.head(5)
```

Out[8]:

	Unnamed: 0	ID	Name	Age	Photo	Nationality	Flag	Overall	Potential	Club	...	Cor
0	0	158023	L. Messi	31	https://cdn.sofifa.org/players/4/19/158023.png	Argentina	https://cdn.sofifa.org/flags/52.png	94	94	FC Barcelona	...	
1	1	20801	Cristiano Ronaldo	33	https://cdn.sofifa.org/players/4/19/20801.png	Portugal	https://cdn.sofifa.org/flags/38.png	94	94	Juventus	...	
2	2	190871	Neymar Jr	26	https://cdn.sofifa.org/players/4/19/190871.png	Brazil	https://cdn.sofifa.org/flags/54.png	92	93	Paris Saint-Germain	...	
3	3	193080	De Gea	27	https://cdn.sofifa.org/players/4/19/193080.png	Spain	https://cdn.sofifa.org/flags/45.png	91	93	Manchester United	...	

```
In [5]: fifa_data1.tail(5)
```

Out[5]:

	Unnamed: 0	ID	Name	Age	Photo	Nationality	Flag	Overall	Potential	Club
18202	18202	238813	J. Lundstram	19	https://cdn.sofifa.org/players/4/19/238813.png	England	https://cdn.sofifa.org/flags/14.png	47	65	Crewe Alexandra
18203	18203	243165	N. Christofferson	19	https://cdn.sofifa.org/players/4/19/243165.png	Sweden	https://cdn.sofifa.org/flags/46.png	47	63	Trelleborgs FF
18204	18204	241638	B. Worman	16	https://cdn.sofifa.org/players/4/19/241638.png	England	https://cdn.sofifa.org/flags/14.png	47	67	Cambridge United
18205	18205	246268	D. Walker-Rice	17	https://cdn.sofifa.org/players/4/19/246268.png	England	https://cdn.sofifa.org/flags/14.png	47	66	Tranmere Rovers
18206	18206	246269	G. Nugent	16	https://cdn.sofifa.org/players/4/19/246269.png	England	https://cdn.sofifa.org/flags/14.png	46	66	Tranmere Rovers

5 rows x 89 columns

```
In [10]: fifa_data1.sort_values(by='Height',ascending=False)[['Name','Height']].head(3)
```

```
Out[10]:
```

	Name	Height
11614	T. Holy	6'9
17927	D. Hodzic	6'9
11903	K. Scherpen	6'8

```
In [ ]: Insight: The tallest player as per the data is T.Holy
```

Which club has the most number of players

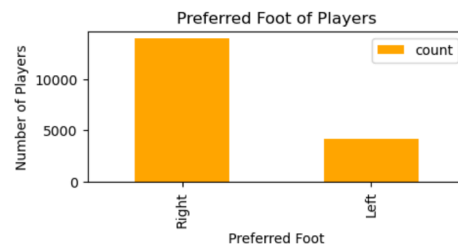
```
In [34]: club_most_players = fifa_data['Club'].value_counts().idxmax()  
print(f"The club with the most number of players is: {club_most_players}")
```

The club with the most number of players is: FC Barcelona

```
In [ ]: Insight: The club with the most numbers of players is Fc Barcelona as per the data.
```

Which foot is most preferred by the players

```
In [31]: # Counting preferred foot  
preferred_foot_counts = fifa_data['Preferred Foot'].value_counts()  
  
# Plotting the bar chart  
plt.figure(figsize=(5,2))  
preferred_foot_counts.plot(kind='bar', color='orange')  
plt.title('Preferred Foot of Players')  
plt.xlabel('Preferred Foot')  
plt.ylabel('Number of Players')  
plt.legend()  
plt.show()
```



```
In [ ]: Insight: The bar chart shows that the most preferred foot among the players is Right.
```