Assignment 02 Solution

June 23, 2020

1 Assignment 02: Evaluate the Summer Olympics, London 2012 dataset

The comments/sections provided are your cues to perform the assignment. You don't need to limit yourself to the number of rows/cells provided. You can add additional rows in each section to add more lines of code.

If at any point in time you need help on solving this assignment, view our demo video to understand the different steps of the code.

Happy coding!

1: View and add the dataset

```
[3]: #Import the necessary library import numpy as np
```

```
[16]: #Manually add the Summer Olympics, London 2012 dataset as arrays
np_olympics_country = np.array(['GBR','CHN','RUS','US','KOR','JPN','GER'])
np_olympics_country_Gold = np.array([29,38,24,46,13,7,11])
np_olympics_country_Silver = np.array([17,28,25,28,8,14,11])
np_olympics_country_Bronze = np.array([19,22,32,29,7,17,14])
```

Find the country with maximum gold medals

```
[6]: #Use the argmax() method to find the highest number of gold medals
max_gold_index = np_olympics_country_Gold.argmax()
```

```
[10]: #Print the name of the country
    country_with_max_gold = np_olympics_country[max_gold_index]
    country_with_max_gold
```

[10]: 'US'

Find the countries with more than 20 gold medals

```
[11]: #Use Boolean indexing technique to find the required output print(np_olympics_country[np_olympics_country_Gold>20])

['GBR' 'CHN' 'RUS' 'US']
```

Evaluate the dataset and print the name of each country with its gold medals and total number of medals

```
[17]: #Use a for loop to create the required output
      for i in range(len(np_olympics_country)):
          gold_medal = np_olympics_country_Gold[i]
          country = np_olympics_country[i]
          total_medal =_
       →np_olympics_country_Gold[i]+np_olympics_country_Silver[i]+np_olympics_country_Bronze[i]
          print('{}, Gold medal {}, Total medal {}'.
       →format(country,gold_medal,total_medal))
     GBR, Gold medal 29, Total medal 65
     CHN, Gold medal 38, Total medal 88
     RUS, Gold medal 24, Total medal 81
     US, Gold medal 46, Total medal 103
     KOR, Gold medal 13, Total medal 28
     JPN, Gold medal 7, Total medal 38
     GER, Gold medal 11, Total medal 36
 []:
```