

```
In [1]: import sys
        !{sys.executable} -m pip install pytrends
```

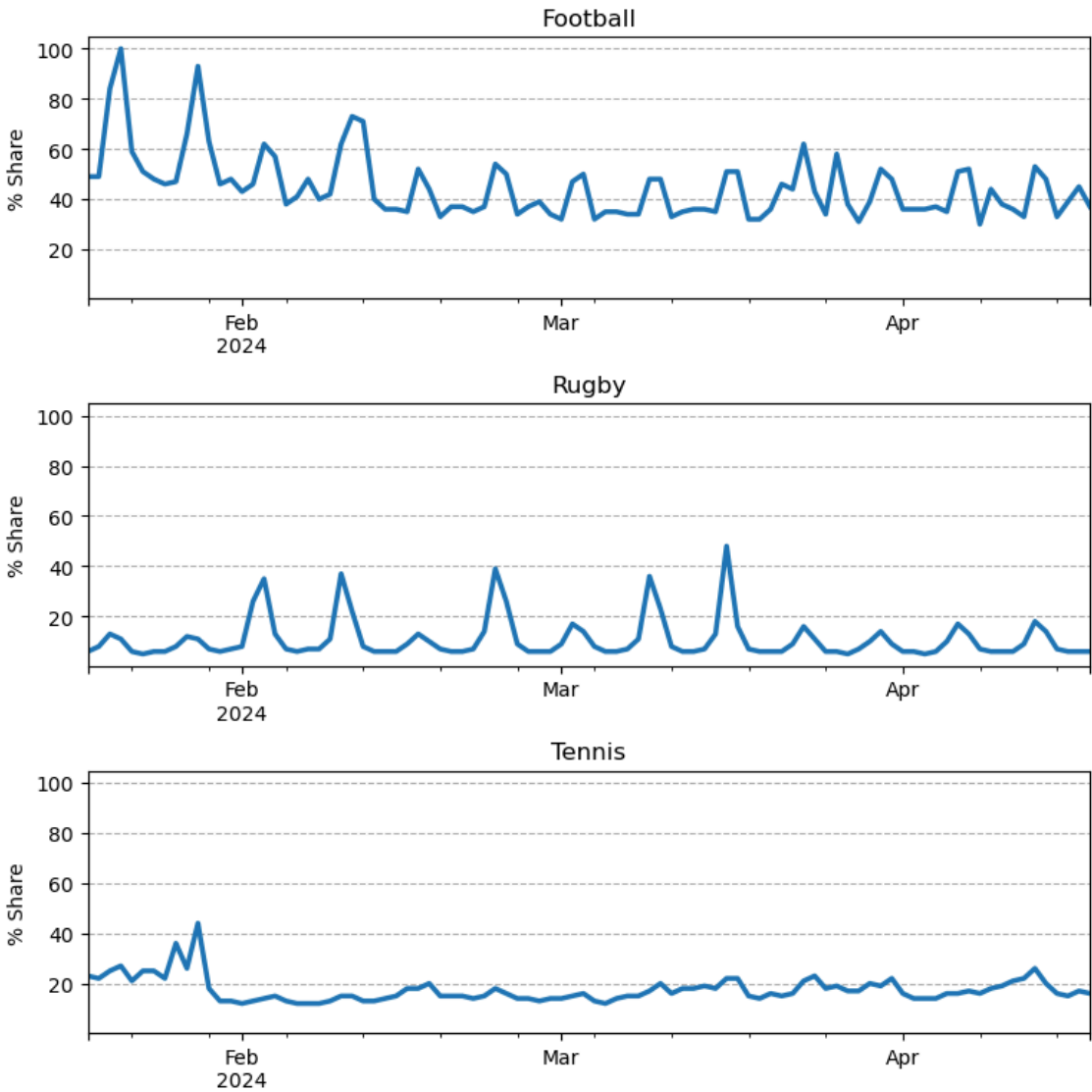
```
Requirement already satisfied: pytrends in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (4.9.2)
Requirement already satisfied: requests>=2.0 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pytrends) (2.31.0)
Requirement already satisfied: pandas>=0.25 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pytrends) (2.0.3)
Requirement already satisfied: lxml in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pytrends) (4.9.3)
Requirement already satisfied: python-dateutil>=2.8.2 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pandas>=0.25->pytrends) (2.8.2)
Requirement already satisfied: pytz>=2020.1 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pandas>=0.25->pytrends) (2023.3.post1)
Requirement already satisfied: tzdata>=2022.1 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pandas>=0.25->pytrends) (2023.3)
Requirement already satisfied: numpy>=1.21.0 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from pandas>=0.25->pytrends) (1.24.3)
Requirement already satisfied: charset-normalizer<4,>=2 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from requests>=2.0->pytrends) (2.0.4)
Requirement already satisfied: idna<4,>=2.5 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from requests>=2.0->pytrends) (3.4)
Requirement already satisfied: urllib3<3,>=1.21.1 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from requests>=2.0->pytrends) (1.26.16)
Requirement already satisfied: certifi>=2017.4.17 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from requests>=2.0->pytrends) (2024.2.2)
Requirement already satisfied: six>=1.5 in c:\users\thomasf\appdata\local\anaconda3\lib\site-packages (from python-dateutil>=2.8.2->pandas>=0.25->pytrends) (1.16.0)
```

```
In [2]: import pandas as pd
        import matplotlib.pyplot as plt
        import pytrends as pt
        from pytrends.request import TrendReq
```

```
In [3]: def pytrendshare(seach_language, time_zone_value, time_frame, key_word_list):
        # Create pytrends object
        pytrends = TrendReq(hl = seach_language, tz = time_zone_value)
        # Payload for the keyword
        pytrends.build_payload(kw_list = key_word_list, timeframe = time_frame)
        # Create Dataframe
        df = pytrends.interest_over_time()
        # drop unnessessary column
        df = df.drop(columns='isPartial')
        # graph the data
        fig, ax = plt.subplots(len(key_word_list), 1, figsize=(9, 9), sharey = True)
        fig.suptitle('Percentage Share over the period \'' + str(time_frame) + '\' of Google')
        fig.subplots_adjust(hspace=0.4)
        for i in range(0, len(key_word_list)):
            df.plot(y=key_word_list[i], ax=ax[i], linewidth = '2.5')
            ax[i].set_title(key_word_list[i])
            ax[i].set_ylabel('% Share')
            ax[i].set_xlabel=None
            ax[i].get_legend().remove()
            ax[i].grid(axis = 'y', linestyle = '--')
            i+=1
```

```
In [4]: pytrendshare('en-UK', '60', 'today 3-m', ['Football', 'Rugby', 'Tennis'])
```

Percentage Share over the period "today 3-m" of Google Trend Keyword Searches



In [ ]: