

# Analyzing Tiktok Users

One of the main objectives of this project, apart from achieving the crawling, was to analyse the data obtained from the scraped, specifically, data about users from Spain, France and Germany.

First, we were able to find the top ten users with most followers and analyse them.

Tagname	-	Followers	-	User Region	-	Category
1. jordi.koalitic	→	15.9M Followers	-	Spain	-	Creative photograpy
2. skyandtami	→	14.1M Followers	-	Spain	-	Funny videos
3. twinmelody	→	13.4M Followers	-	Spain	-	Funny videos
4. juliamenugarcia	→	11.3M Followers	-	Spain	-	Funny videos
5. benjikrol	→	8.8M Followers	-	Spain	-	Funny videos
6. falcopunch	→	8.5M Followers	-	Germany	-	Magic
7. naimdarrechi	→	8M Followers	-	Spain	-	Funny videos
8. rapidsongs	→	7.5M Followers	-	Spain	-	Audio & video edits
9. martineztwins	→	7.3M Followers	-	Spain	-	Dance
10. dannapaola	→	6.5M Followers	-	Spain	-	Funny videos

The user with most followers, Jordi.koalitic, is a creative photographer, but the rest of the user have, basically, humorous content, topic most extended probably in whole TikTok.

Nine of the ten users are Spanish, only one is from Germany and make videos about magic.

[We obtained this information using this script that returns a dataframe: `top_10_european_most_followed.py`]

Then, we applied the same method but, in this case, we obtained the top ten for each country to make comparison between them:

## SPAIN

- | Tagname            | Followers         | User Region | Category               |
|--------------------|-------------------|-------------|------------------------|
| 1. jordi.koalitic  | → 15.4M Followers | - Spain     | - Creative photography |
| 2. skyandtami      | → 14M Followers   | - Spain     | - Funny videos         |
| 3. twinmelody      | → 13M Followers   | - Spain     | - Funny videos         |
| 4. juliamenugarcia | → 10.8M Followers | - Spain     | - Funny videos         |
| 5. benjikrol       | → 8.3M Followers  | - Spain     | - Funny videos         |
| 6. rapidsongs      | → 7.1M Followers  | - Spain     | - Audio & video edits  |
| 7. martineztwins   | → 7.2M Followers  | - Spain     | - Dance                |
| 8. naimdarrechi    | → 6.4M Followers  | - Spain     | - Funny videos         |
| 9. dannapaola      | → 5.7M Followers  | - Spain     | - Funny videos         |
| 10. sunrisemusic   | → 5.4M Followers  | - Spain     | - Funny videos         |

## GERMANY

- | Tagname           | Followers        | User Region | Category       |
|-------------------|------------------|-------------|----------------|
| 1. falcopunch     | → 8.4M Followers | - Germany   | - Magic        |
| 2. annacatify     | → 4.8M Followers | - Germany   | - Funny videos |
| 3. dalia          | → 4.6M Followers | - Germany   | - Funny videos |
| 4. enyadres       | → 4.3M Followers | - Germany   | - Dance        |
| 5. feel.super     | → 3.9M Followers | - Germany   | - Funny videos |
| 6. patroxofficial | → 3.6M Followers | - Germany   | - Dance        |
| 7. lukasrieger    | → 3.4M Followers | - Germany   | - Funny videos |
| 8. leomahalo      | → 3.3M Followers | - Germany   | - Art          |
| 9. mayapolarbear  | → 3.2M Followers | - Germany   | - Pets         |
| 10. mingweirocks  | → 2.5M Followers | - Germany   | - Funny videos |

## FRANCE

Tagname - Followers - User Region - Category

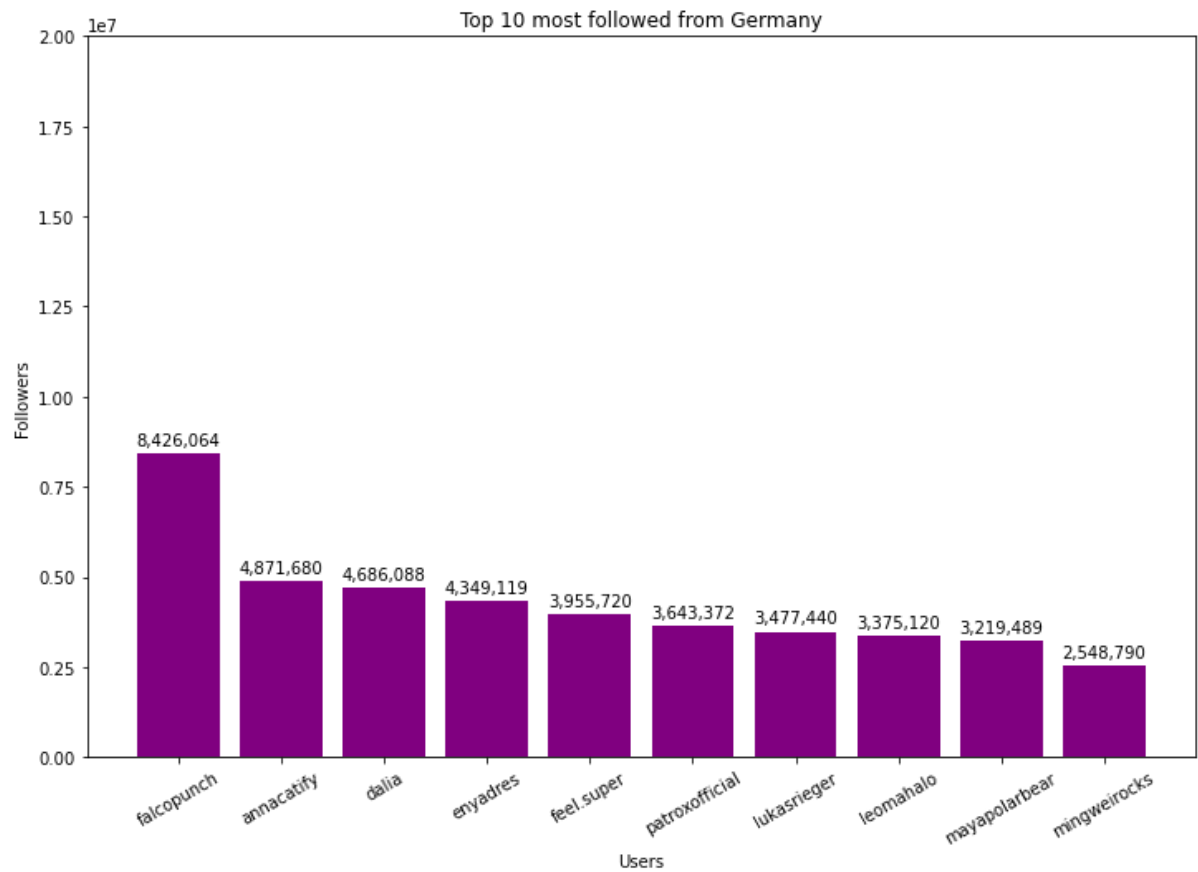
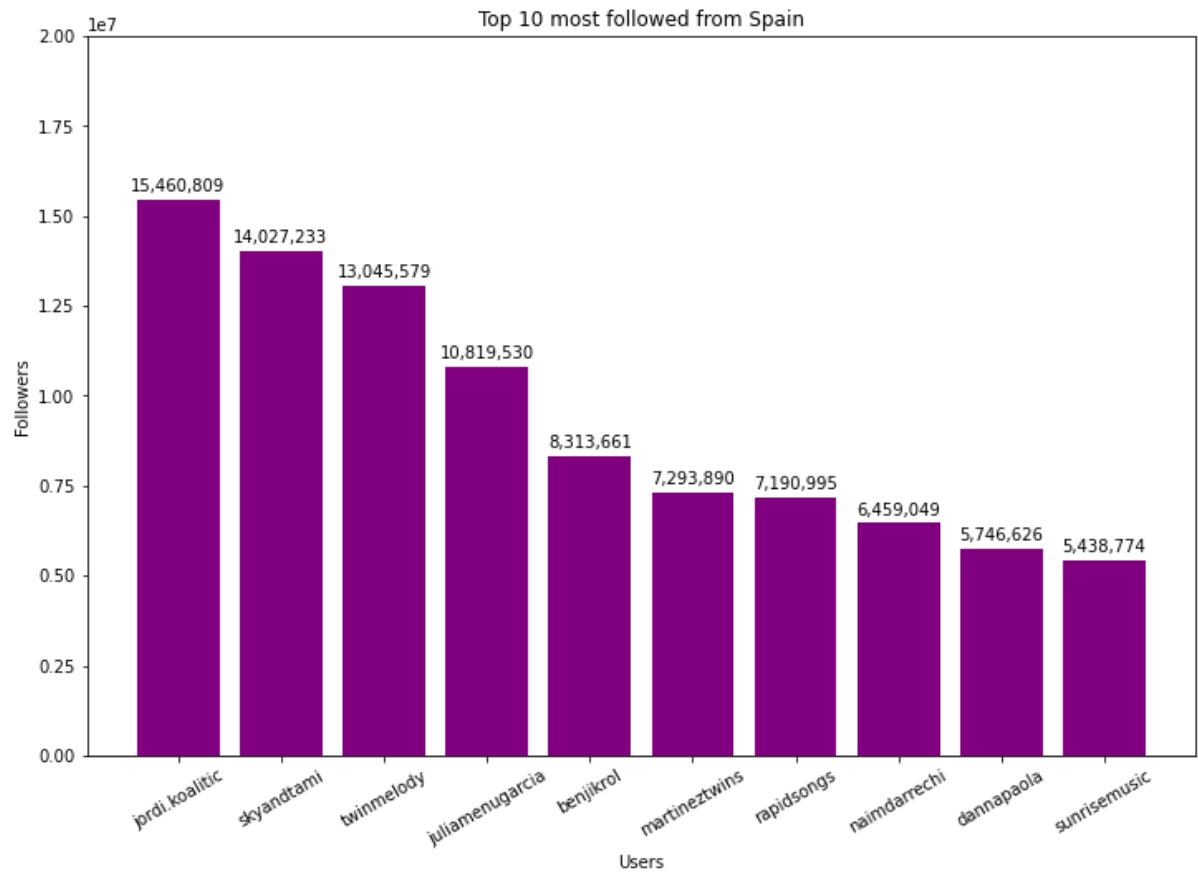
1. simon.nogueira → 3.3M Followers - France - Parkour
2. rose.thr → 3.2M Followers - France - Funny videos
3. cyrilschr → 3.1M Followers - France - Funny videos
4. tiboinshape → 2.9M Followers - France - Funny videos
5. bekybaw777 → 2.7M Followers - France - Funny videos
6. akamztwenty20 → 2.5M Followers - France - Dance
7. lenna.vivas → 2.4M Followers - France - Funny videos
8. enzotaistoi → 2.4M Followers - France - Funny videos
9. sundyjules → 2.3M Followers - France - Funny videos
10. benoit\_chevalier → 2.2M Followers - France - Funny videos

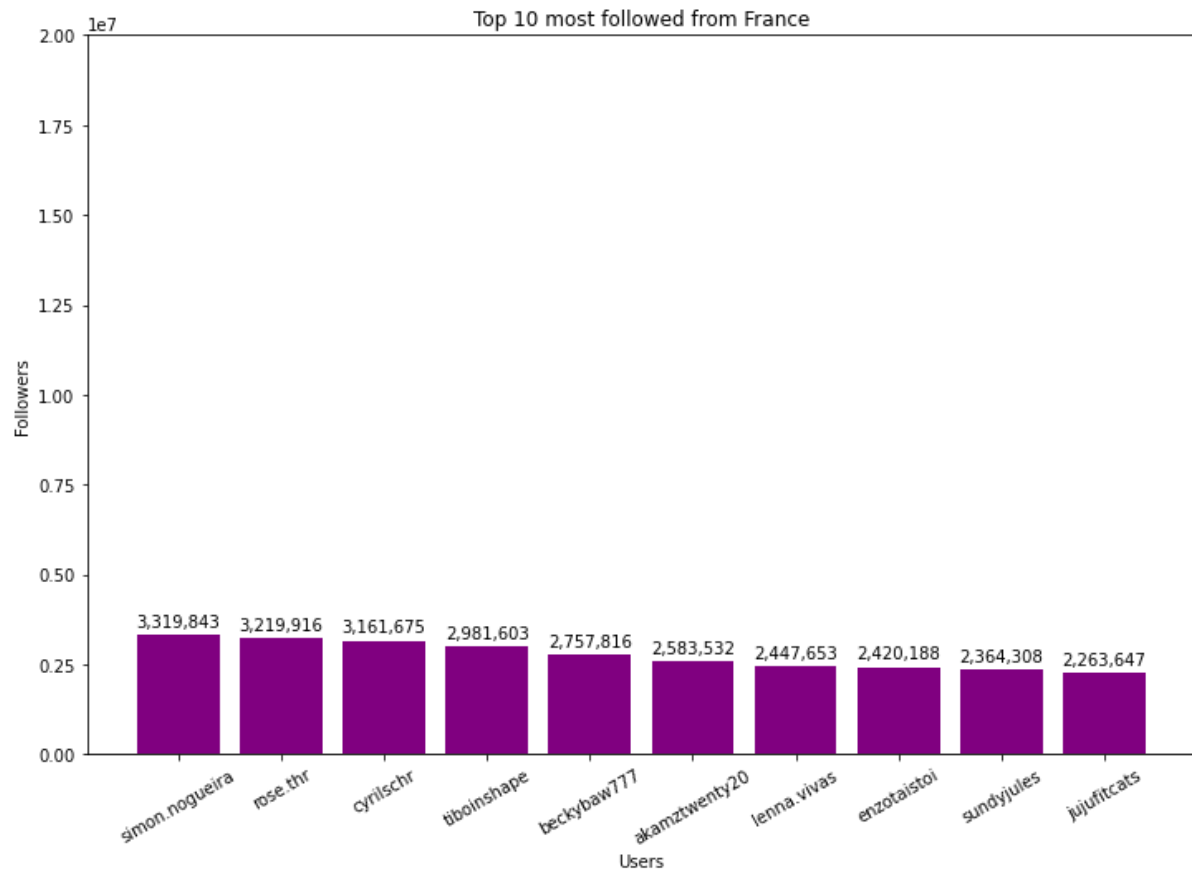
In line with the previous analysis, we can observe that Spanish users have more followers than the other two countries, followed by Germany and then France.

German users make content with several kinds of topics, pets, music, dance, magic, fun, etc., instead, Spanish and French users make videos about humorous.

[We obtained this information using this script that returns a dataframe: `top10_most_followed_by_country.py`]

Furthermore, we created some bar chart about the number of followers of each top ten user by countries:

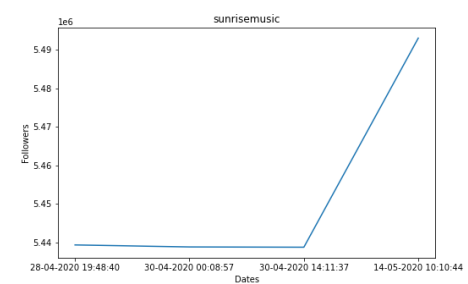
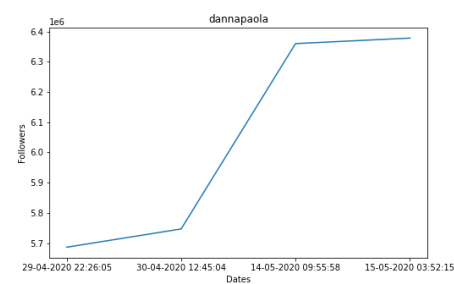
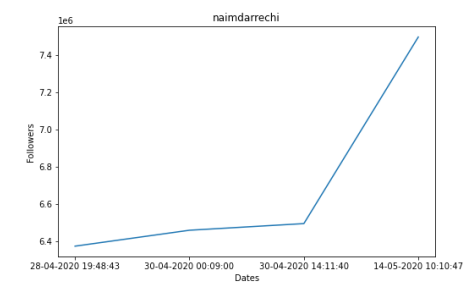
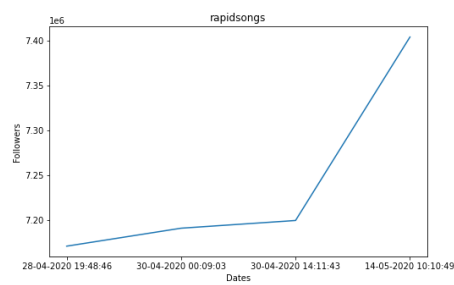
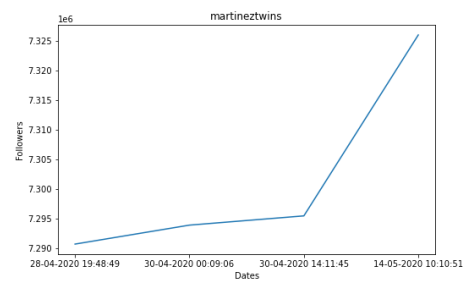
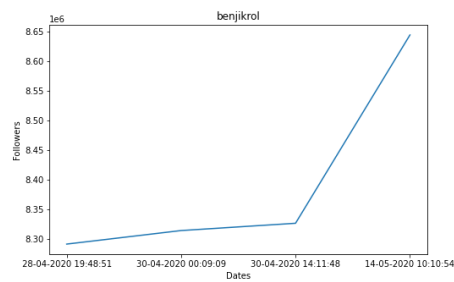
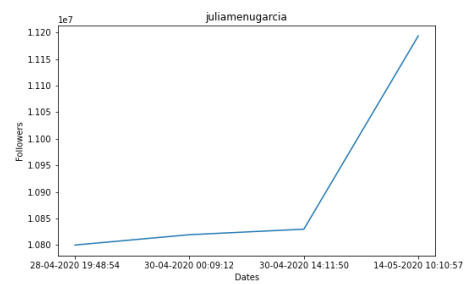
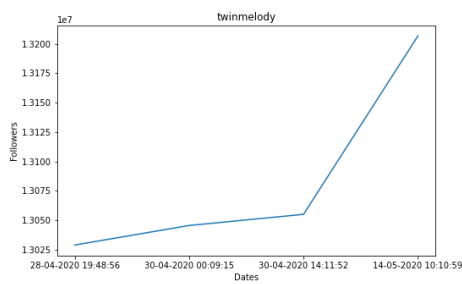
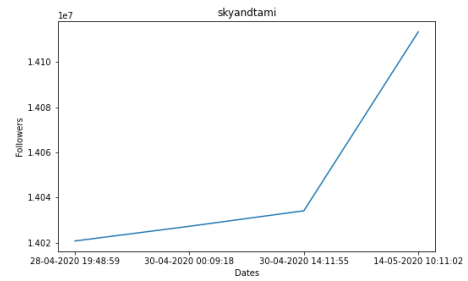
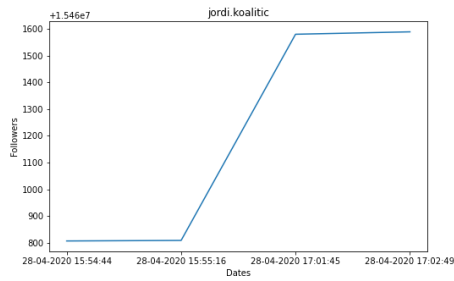




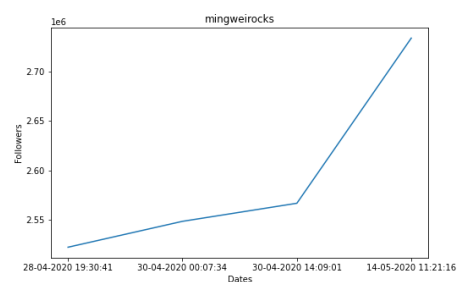
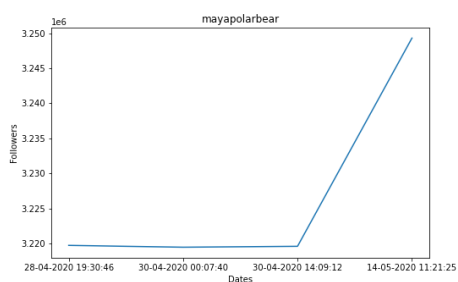
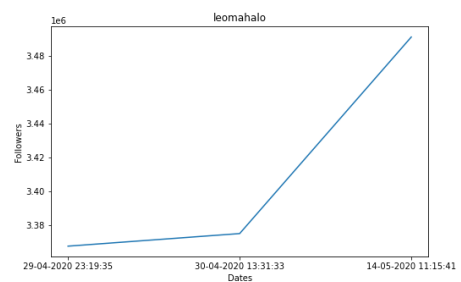
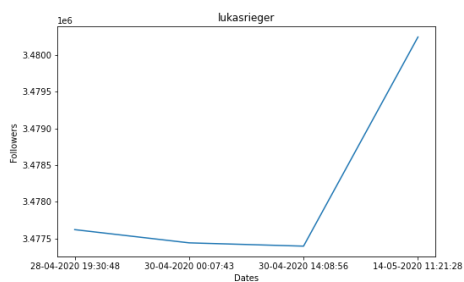
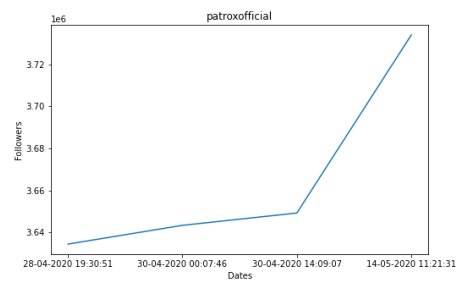
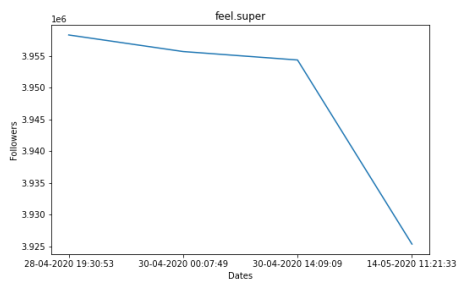
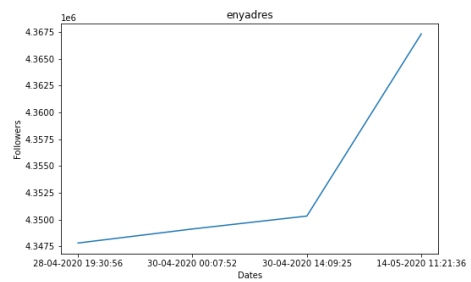
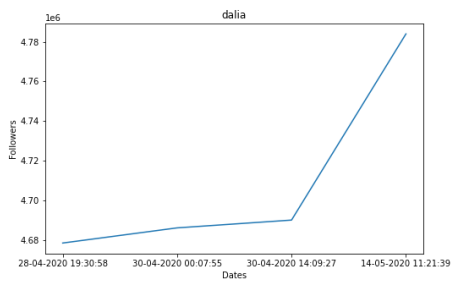
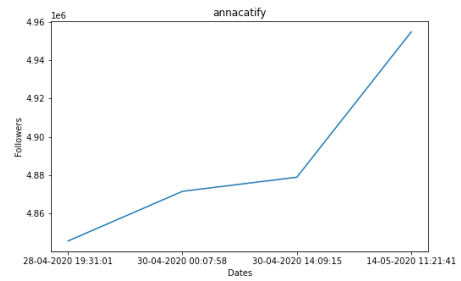
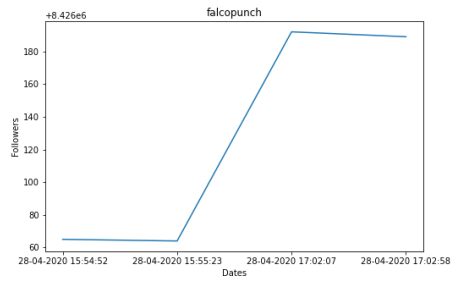
[We obtained these bar charts using this script:  
bar\_graph\_top10\_most\_followed\_by\_country.py]

We also wanted to see how the number of followers has changed over time for each of these users, so we have created some individual plots.

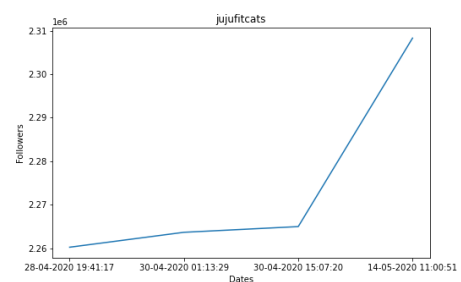
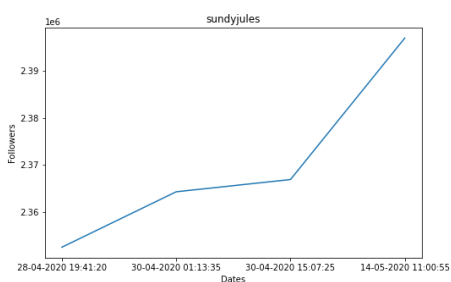
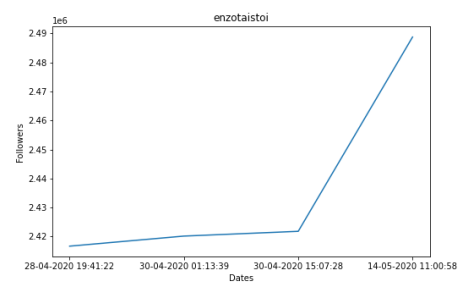
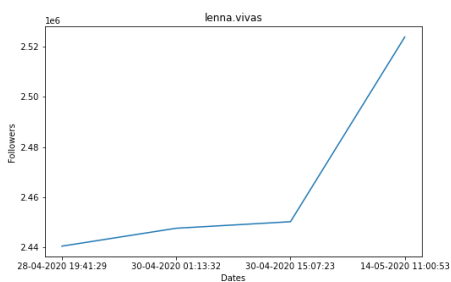
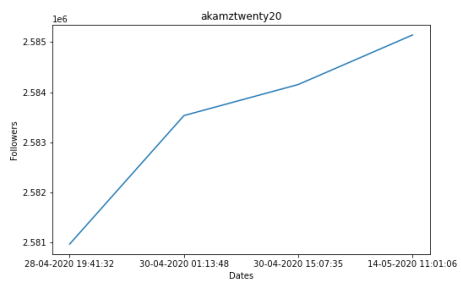
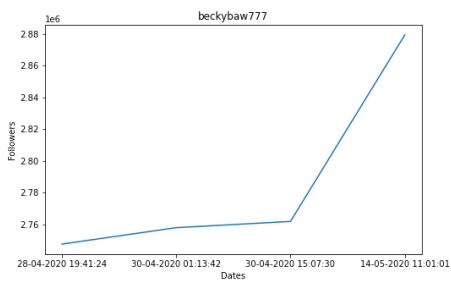
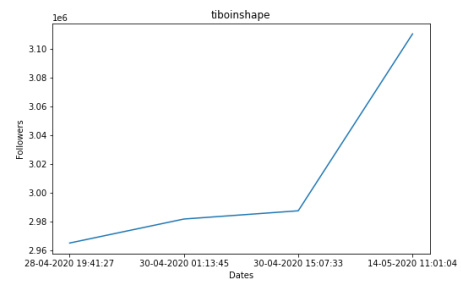
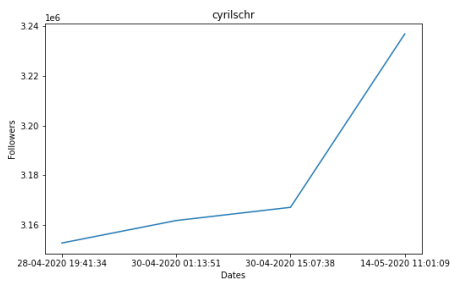
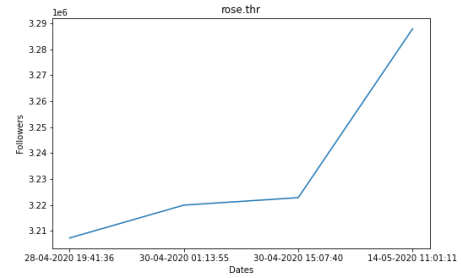
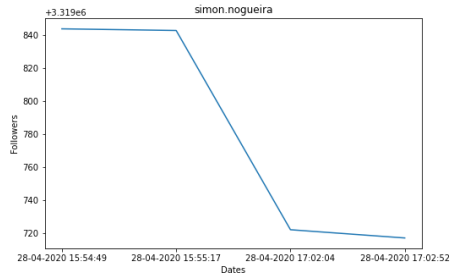
Gain of followers of the four most followed influencers in Spain



Gain of followers of the four most followed influencers in Germany



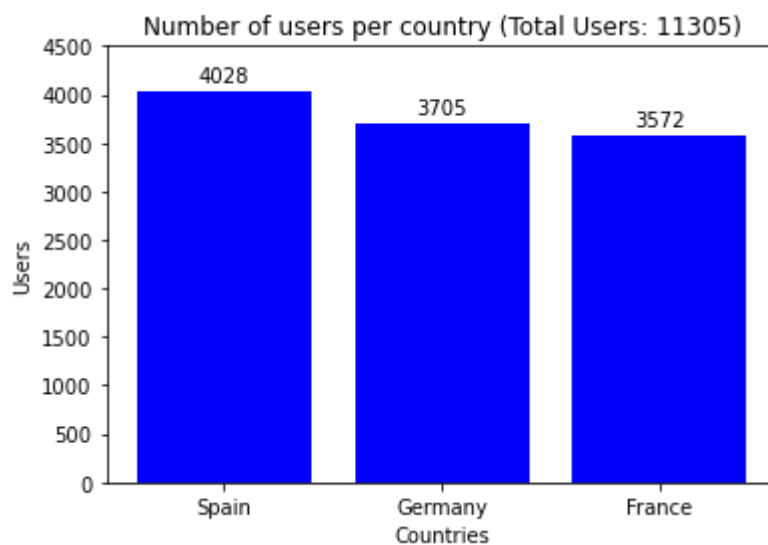
Gain of followers of the four most followed influencers in France



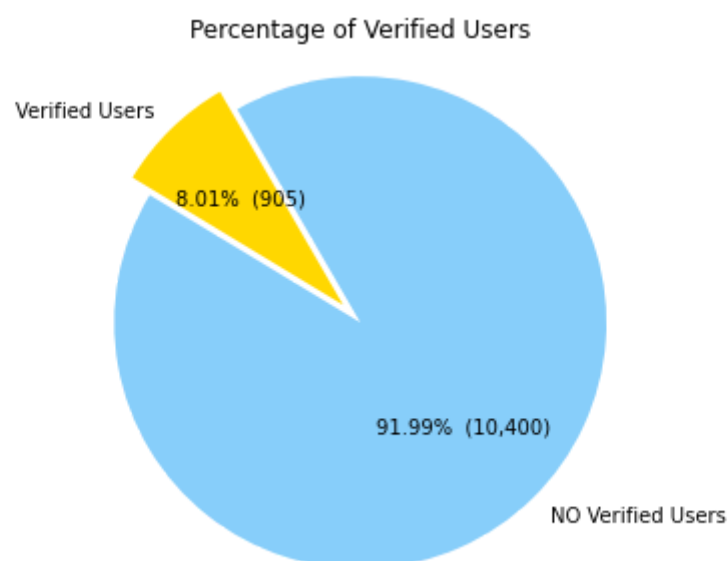


[We obtained these plots using this script:  
plot\_graph\_top10\_most\_followed\_by\_country.py]

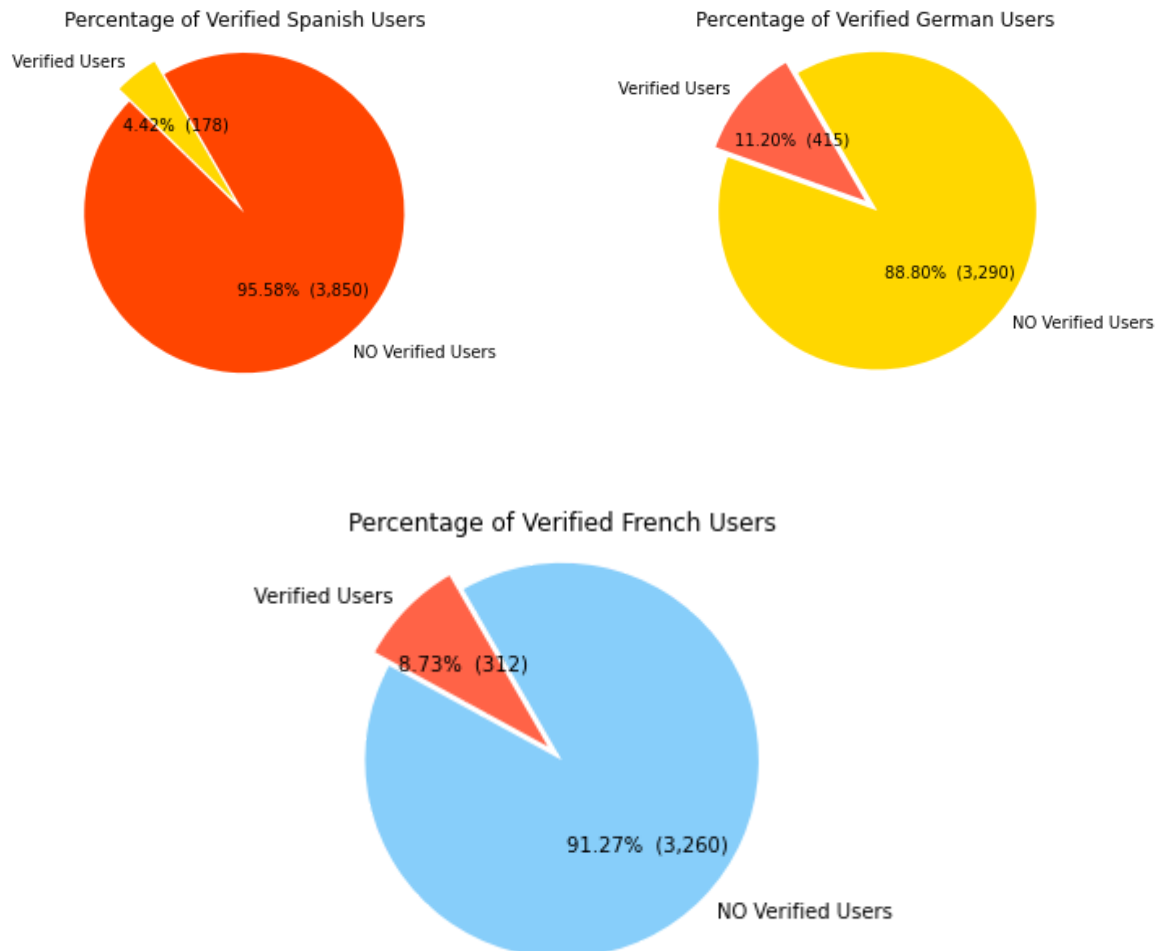
We continue the analysis by showing the number of users we have scraped and belong to the regions of Spain, Germany and France. To represent this we have created the following bar chart:



Furthermore, we analysed the number of verified users and we represented in the following pie chart:



Only the 8% (905) of 11.305 users have been verified by TikTok. That is the graphs of them:

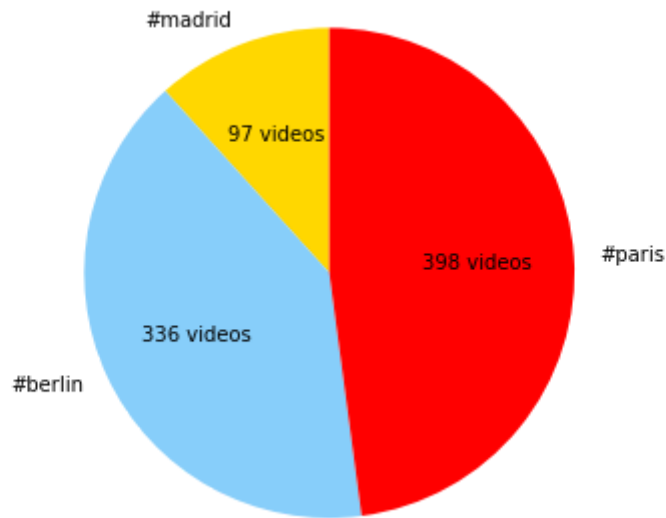


Germany is the country with more verified users (11.20%), the next one is French (8.73%) and the last is Spain (4.42%). It is worth noting that Spain is the country with more followers and less verified users.

[We use the next script to create this pie charts:  
pie\_percentage\_verified\_users.py]

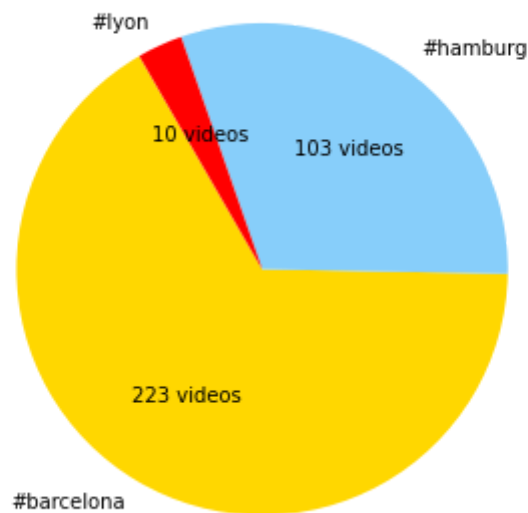
Now we are going to analyse different hashtags related to the European Union. The first graph is the number of videos that use the name of the capital of the countries used in the last graphs, it means Berlin, Madrid and Paris.

Number of videos using the hashtags:

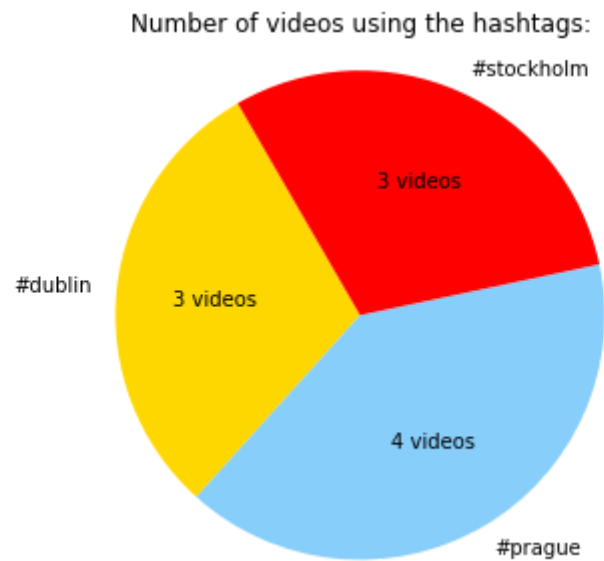


The hashtag #paris has the highest number of videos (398), the next one is #berlin (336) and the last #madrid (97).

Number of videos using the hashtags:



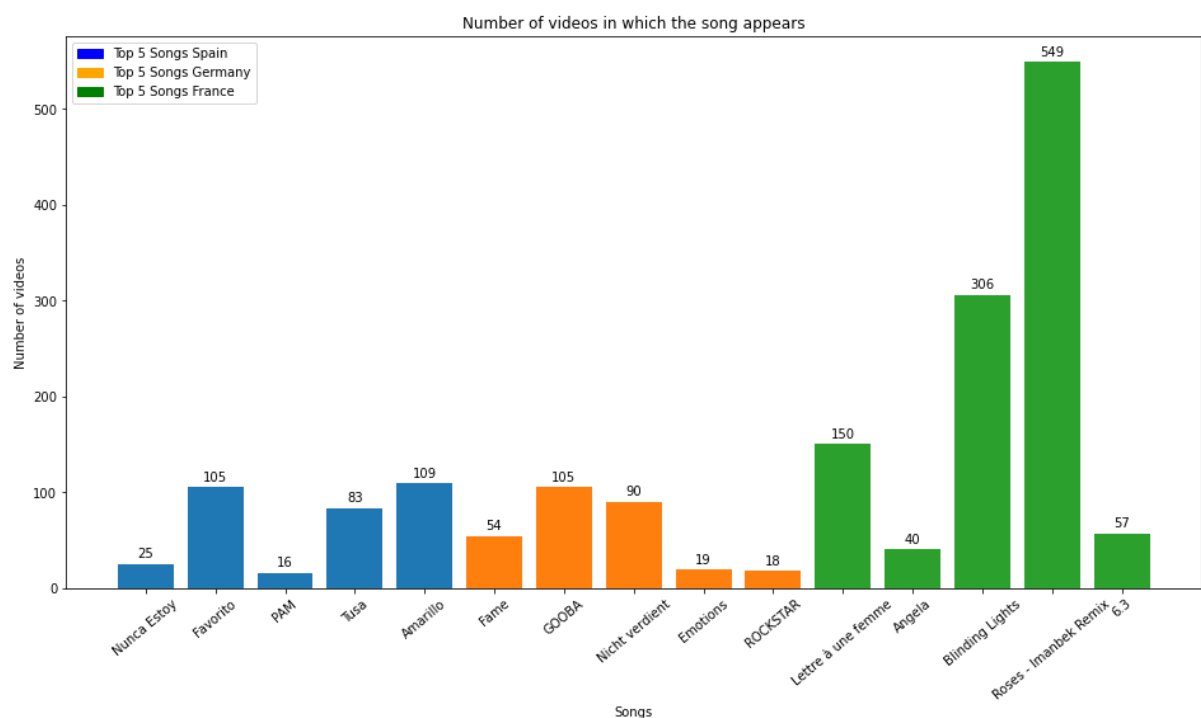
About the second most popular city of these countries, it means Barcelona, Lyon and Hamburgo, #barcelona is the hashtag with more videos (223) followed by #hamburgo (103) and #lyon (10).



The capitals of European countries that participated in Pacman Project, #prague, #dublin and #stockholm are hardly used with 3 or 4 videos.

[We use the next script to create this pie charts:  
pie\_numer\_of\_videos\_using\_city\_hashtags.py]

Finally, we want to analyse if the most listened songs on Spotify in each country are used in TikTok's videos.



The most popular songs are in the top of French. The most used song is Roses-Imanbek Remix, top 4 in the French's list with 549 videos.