Potential Audiences:

1. **Music Enthusiasts and Spotify Users** – People who love discovering trends and exploring new music.
2. **Music Industry Professionals** – Artists, producers, and marketers who want to understand what makes a song popular.
3. **Data Analysts and Researchers** – People interested in music data for academic research or analytics.

Target Audience Selection: Music Industry Professionals

- **What do they know?**
    - They have a solid understanding of music production and market trends but may not be familiar with advanced data visualization or statistical methods.
- **What are their interests?**
    - Identifying what makes a song popular, understanding listener preferences, and predicting future music trends.
- **What visualization literacy do they have?**
    - Basic to moderate understanding of visualizations such as bar charts, line charts, and scatter plots, but prefer clear and intuitive dashboards over complex statistical graphs.
- **At what level of detail will you present information to them?**
    - Provide a high-level summary with the option to dive deeper into specific trends and song features, keeping technical jargon minimal.

Interesting Questions for Your Audience (At least 10 Questions)

1. Which platform provides the highest reach for top-ranked songs?
2. What is the relationship between TikTok views and Spotify streams?
3. Do songs with high Shazam counts have better streaming performance?
4. How does a song's playlist count affect its overall popularity?
5. Which artists consistently appear in the top ranks across all platforms?
6. Are songs released in specific months more successful?
7. What is the average track score for the top 50 songs?
8. How does YouTube engagement (likes and views) relate to Spotify playlist reach?
9. Do explicit tracks perform better or worse on different platforms?
10. What is the distribution of all-time rank among the top 100 songs?

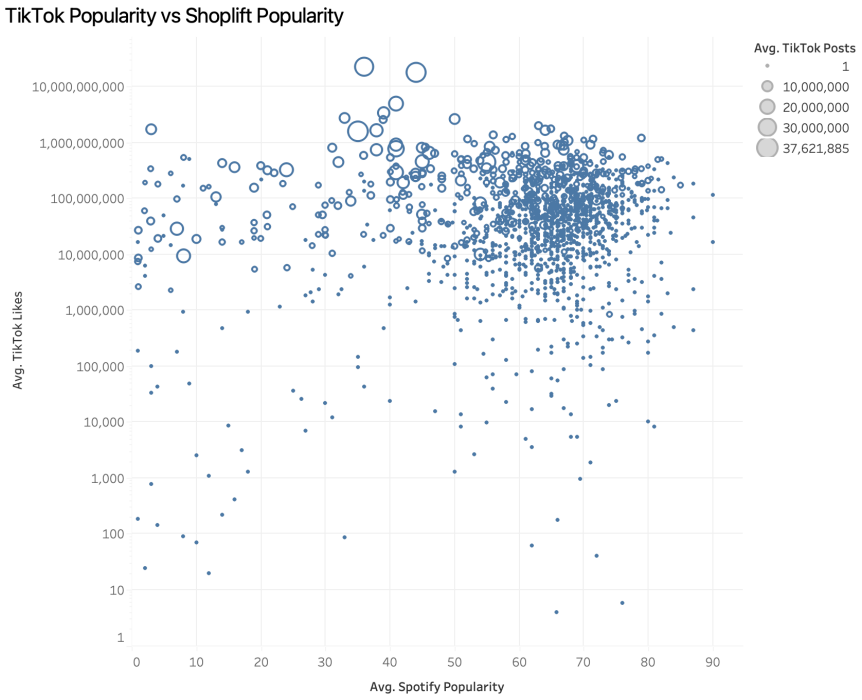
Dataset Attribute Breakdown and Data Types

Attribute	Description	Data Type
Track Name	Name of the song	Categorical
Album Name	Name of the album the song belongs to	Categorical
Artist	Name of the artist(s) of the song	Categorical
Release Date	Date when the song was released	Ordinal (Date)
ISRC	International Standard Recording Code	Categorical
All Time Rank	Ranking of the song based on all-time popularity	Ordinal
Track Score	Score assigned to the track based on various factors	Quantitative
Spotify Streams	Total number of streams on Spotify	Quantitative
Spotify Playlist Count	Number of Spotify playlists the song is included in	Quantitative
Spotify Playlist Reach	Reach of the song across Spotify playlists	Quantitative
Spotify Popularity	Popularity score of the song on Spotify	Quantitative
YouTube Views	Total views of the song's official video on YouTube	Quantitative
YouTube Likes	Total likes on the song's official video on YouTube	Quantitative
TikTok Posts	Number of TikTok posts featuring the song	Quantitative
TikTok Likes	Total likes on TikTok posts featuring the song	Quantitative
TikTok Views	Total views on TikTok posts featuring the song	Quantitative
YouTube Playlist Reach	Reach of the song across YouTube playlists	Quantitative
Apple Music Playlist Count	Number of Apple Music playlists the song is included in	Quantitative

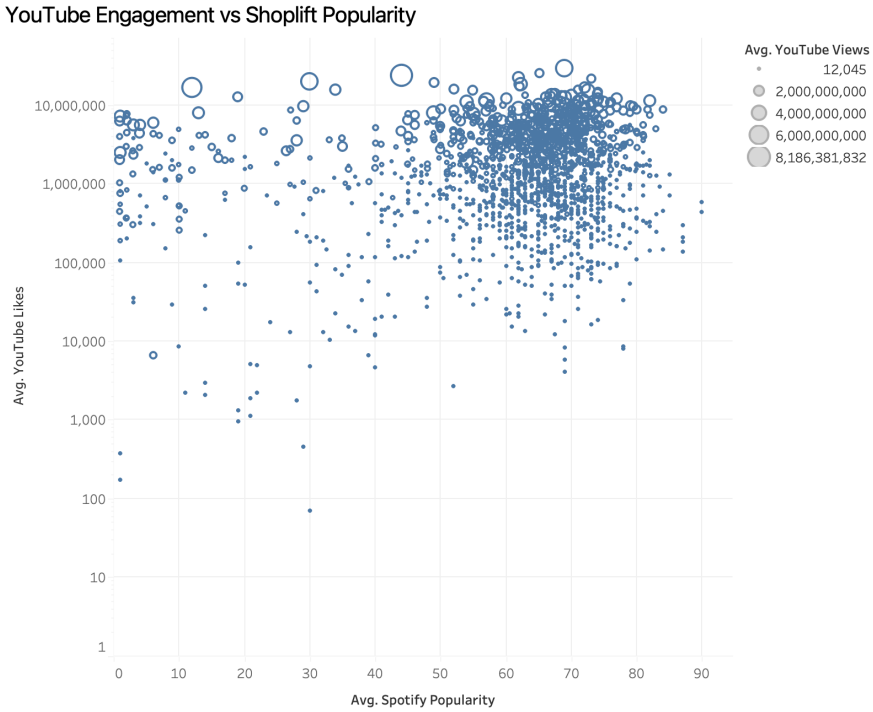
AirPlay Spins	Number of times the song has been played on radio stations	Quantitative
SiriusXM Spins	Number of times the song has been played on SiriusXM	Quantitative
Deezer Playlist Count	Number of Deezer playlists the song is included in	Quantitative
Deezer Playlist Reach	Reach of the song across Deezer playlists	Quantitative
Amazon Playlist Count	Number of Amazon Music playlists the song is included in	Quantitative
Pandora Streams	Total number of streams on Pandora	Quantitative
Pandora Track Stations	Number of Pandora stations featuring the song	Quantitative
Soundcloud Streams	Total number of streams on Soundcloud	Quantitative
Shazam Counts	Total number of times the song has been Shazamed	Quantitative
TIDAL Popularity	Popularity score of the song on TIDAL	Quantitative
Explicit Track	Indicates whether the song contains explicit content	Categorical (Boolean)

Tableaus

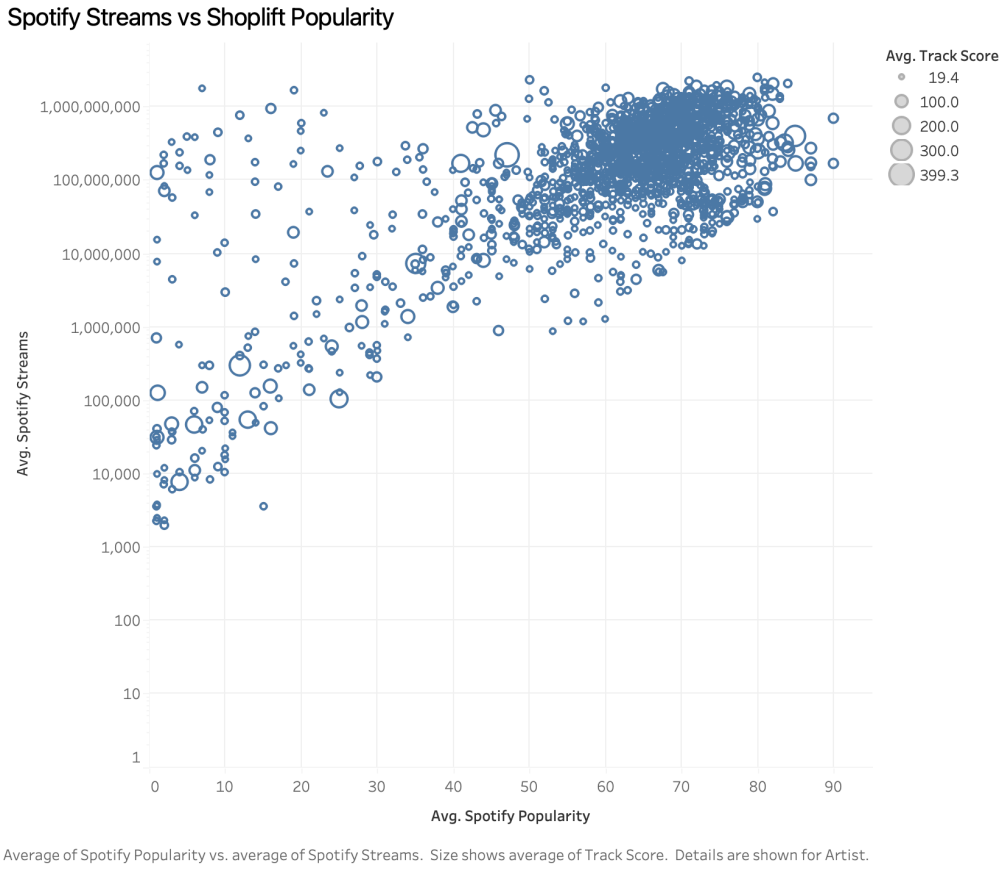
Xinyue Li



Average of Spotify Popularity vs. average of TikTok Likes. Size shows average of TikTok Posts. Details are shown for Artist.



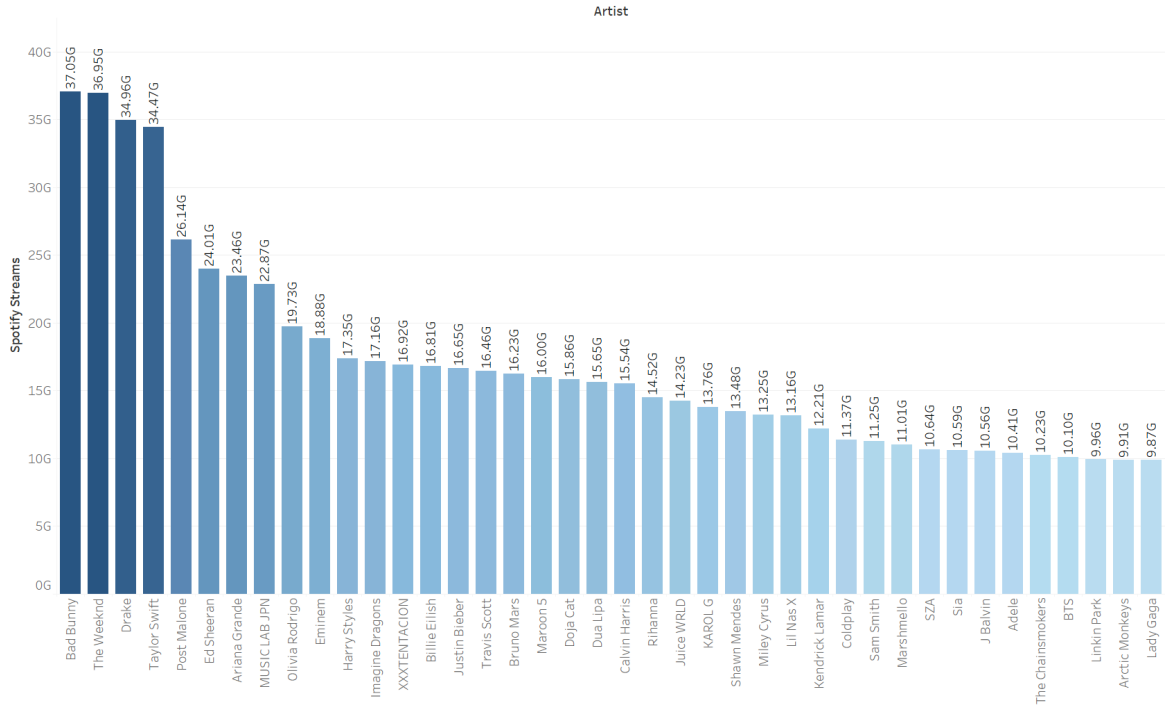
Average of Spotify Popularity vs. average of YouTube Likes. Size shows average of YouTube Views. Details are shown for Artist.



The questions answered in Tableau focused more on platform-specific engagement metrics, such as comparing TikTok likes, YouTube views, and Spotify streams in relation to Shoplift popularity. While these questions offered valuable insights into the relationship between platform engagement and overall popularity, they differed from some of the broader, trend-based questions the team initially proposed, such as analyzing patterns across genres, release dates, or explicit content. The shift occurred because platform-based metrics were more measurable and visually impactful in Tableau. These questions also provided clearer, more actionable insights for the target audience—music industry professionals. While broader questions remain valuable for identifying long-term trends, the Tableau visualizations helped answer specific, data-driven questions more effectively. Thus, the selected questions were a better fit for the available dataset and visualization capabilities.

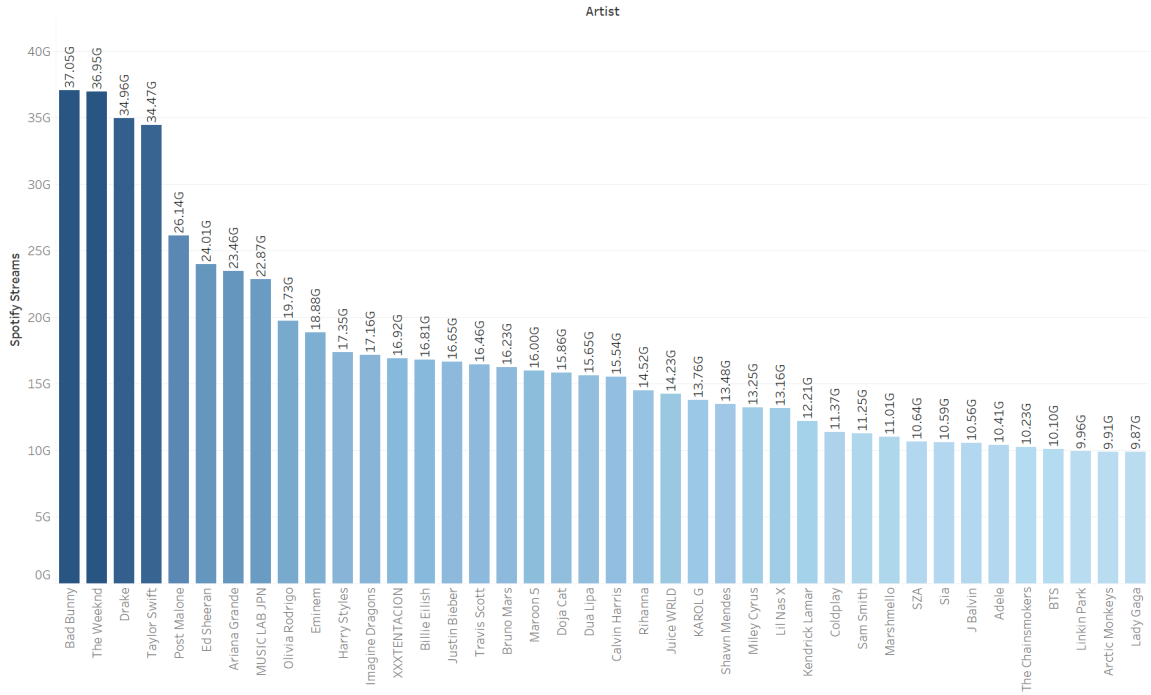
Haochen Ding:

Top 40 Total Spotify Streams Artist

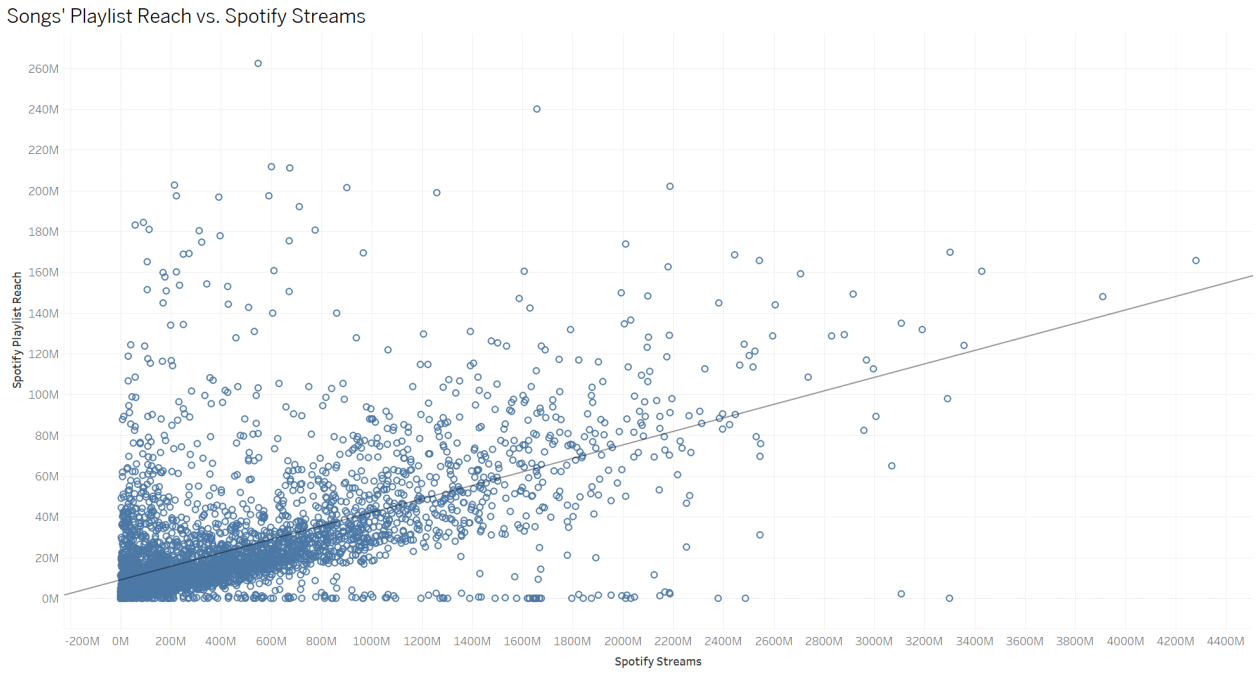


Sum of Spotify Streams for each Artist. Color shows sum of Spotify Streams. The marks are labeled by sum of Spotify Streams. The view is filtered on Artist, which keeps 40 of 2,000 members.

Top 40 Total Spotify Streams Artist



Sum of Spotify Streams for each Artist. Color shows sum of Spotify Streams. The marks are labeled by sum of Spotify Streams. The view is filtered on Artist, which keeps 40 of 2,000 members.

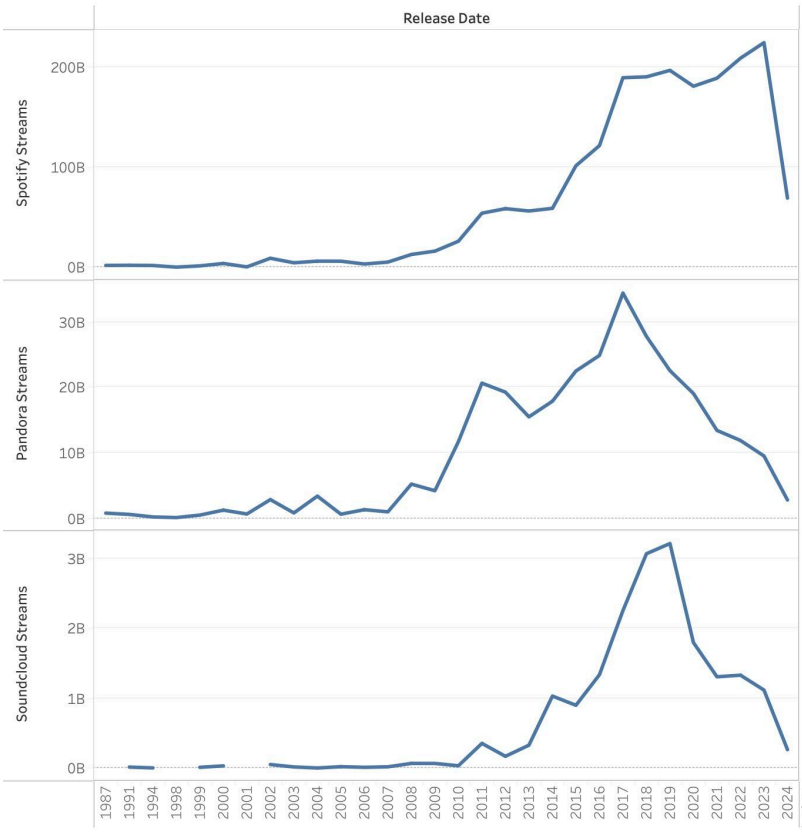


Spotify Streams vs. Spotify Playlist Reach.

The questions we answered in Tableau were different from our team's original questions because of the data we had, the types of charts we could make, and what would be most useful for our audience. At first, we wanted to compare multiple streaming and social media platforms, look at how TikTok views affect streams, and see if explicit songs perform better. But in my Tableau visualizations, I focused on simpler trends that we could actually analyze, like the most-streamed artists and tracks and the connection between playlist reach and Spotify streams. We decided to create clear and useful visualizations that music industry professionals could easily understand. Even though we didn't answer all of our original questions, some of them are still important and could be explored in the future with more data.

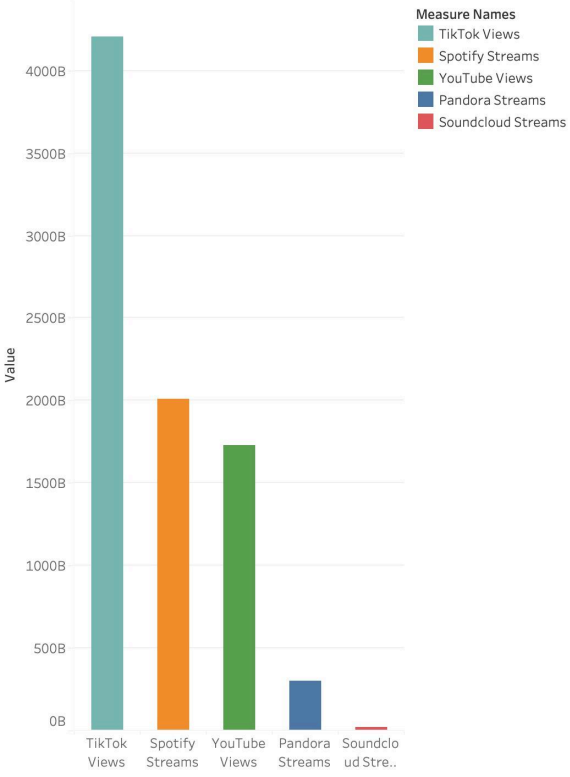
Yinuo Yang:

Sheet 1



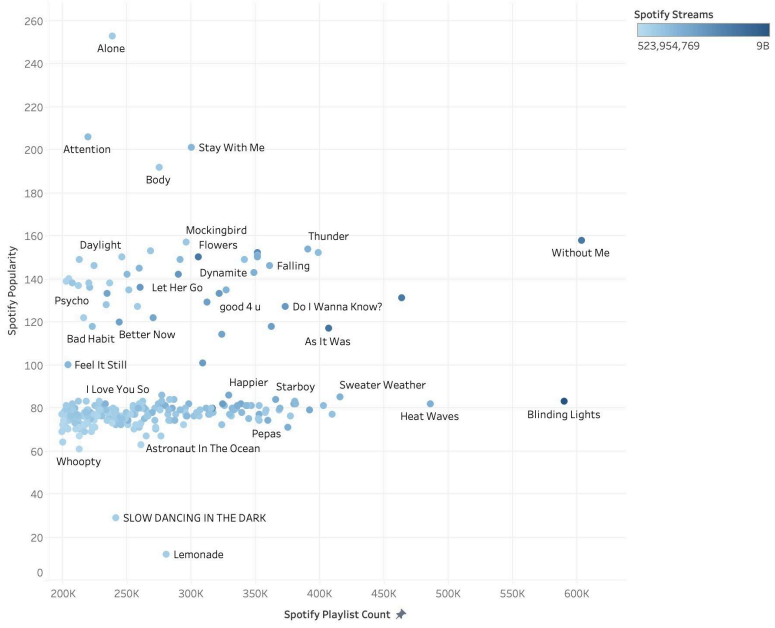
The trends of sum of Spotify Streams, sum of Pandora Streams and sum of Soundcloud Streams for Release Date Year.

Sheet 2



Pandora Streams, Soundcloud Streams, Spotify Streams, TikTok Views and YouTube Views. Color shows details about Pandora Streams, Soundcloud Streams, Spotify Streams, TikTok Views and YouTube Views. Details are shown for Split Words.

Sheet 3



Sum of Spotify Playlist Count vs. sum of Spotify Popularity. Color shows sum of Spotify Streams. The marks are labeled by Track. The view is filtered on sum of Spotify Playlist Count and sum of Spotify Popularity. The sum of Spotify Playlist Count filter includes values greater than or equal to 200,000. The sum of Spotify Popularity filter keeps non-Null values only.

The questions answered in Tableau focused on platform-based engagement metrics, such as comparing TikTok views, YouTube views, and Spotify streams in relation to Spotify popularity. These insights helped illustrate the relationship between playlist exposure, platform reach, and overall song success. However, some of the broader trend-based questions the team initially proposed—such as analyzing explicit content performance, seasonal trends in releases, or artist consistency across platforms—were not directly addressed. This shift occurred because platform-driven metrics were more quantifiable and visually impactful in Tableau, making them more suitable for immediate insights. Additionally, these questions aligned better with our target audience of music industry professionals, offering clear, data-driven takeaways. While the broader questions remain useful for long-term industry analysis, the Tableau visualizations provided more specific, actionable insights, making them a better fit for our dataset and visualization capabilities.