

1. Topic

Studying the consumption of music over time by creating lyrics related features such as topics and emotions.

2. Research Questions

- *Can we extract common topics of song lyrics and use them as meaningful features?*
- *Is it possible to relate it to emotions a song might convey.*
- *We can include both features in the analysis of the music consumption over time.*
- *Can we see patterns of emotional state that generalizes over all users.*
- *Creation of a psychological profile based on the songs users listen to.*

3. Proposed dataset

- Last.fm Dataset - 1K users
- Spotify API: To find the mood of a song we can use the spotify API
- Lyrics from different web pages

4. Methods

- Requests or existing data set to associate the lyrics to the different songs.
- Cluster the songs by lyrics for topics or emotions (e.g spectral clustering, topic modeling implementations)
- Analyse how this clusters are distributed over the time for different groups of user