Quantifying Influence

The Beatles vs. The Rolling Stones

DS4
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Influence, not popularity

- Generations of musicians and fans have asked a question, so oft asked it has been reduced to “Beatles or Stones”. Perhaps you are not a fan of either, simply don’t care, or you wonder “who”. (Ask your parents…)
- Regardless, the influence of both artists is undeniable, as is their enduring popularity over the years. And that popularity has been demonstrated via sales of their music and countless top N lists. And this is represented in the work of subsequent artist’s recordings
- Can the data say which artist is “*better*” (more impactful)?

Demonstrating Influence with Data

- The MusicBrainz database represents a comprehensive pool of information about recorded music. The two bands I have chosen represent a relatively small subset of this data yet between them exists large catalog of songs and recordings, with decades of history generating a significant data trail that may provide hidden insights demonstrating their impact on artists for over 5 decades.

By pulling key metrics from the source, can this influence be measured?

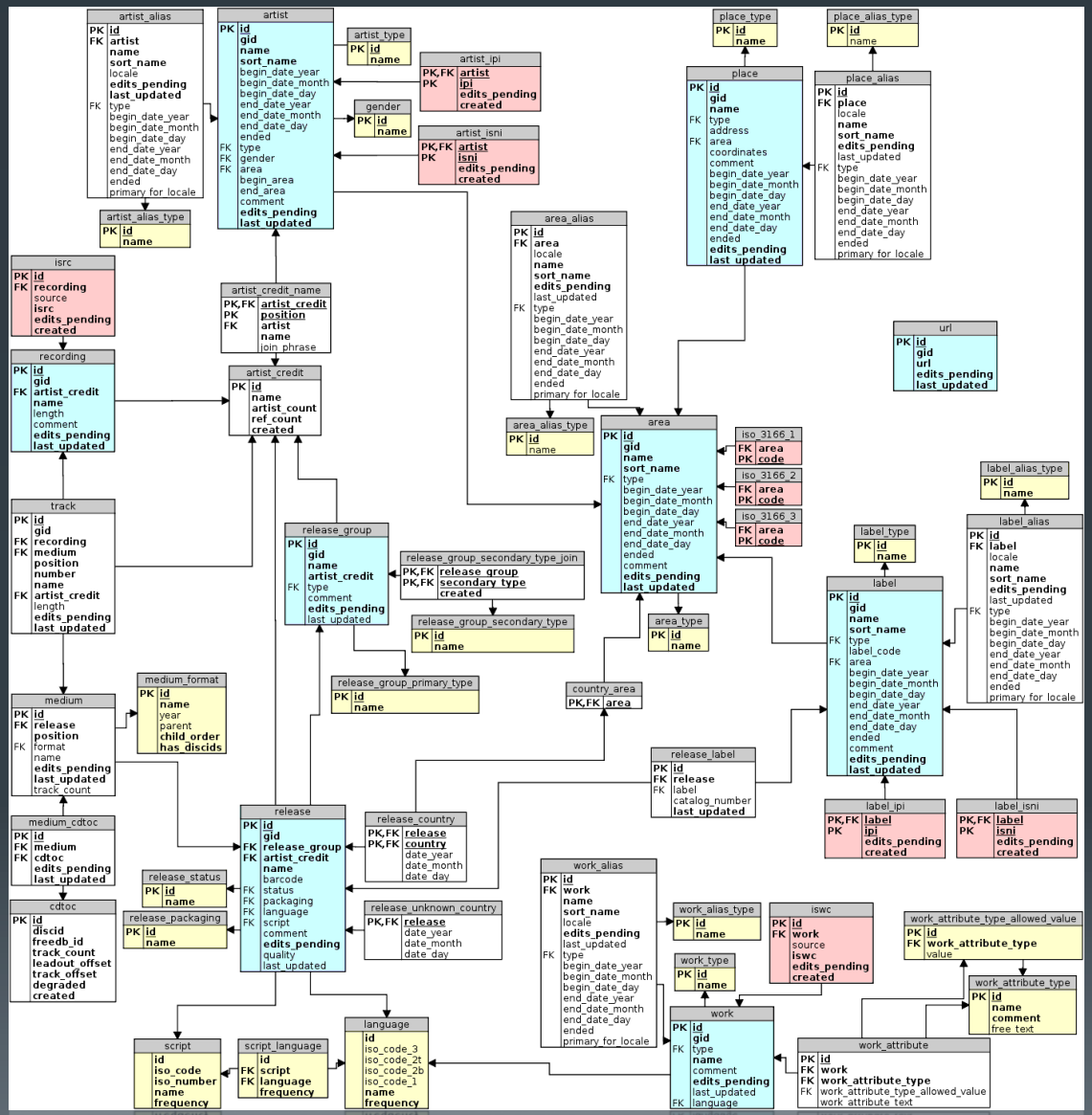
About the Data

- **MusicBrainz is a community-maintained open source encyclopedia of music information. Sim. Wikipedia**
- https://musicbrainz.org/
- Schema Info

- Developers/Users are encouraged to build applications on top of the platform.

Key Data Issues

- Initial exploration of the Musicbrainz API proved challenging to parse the specific relationships I want to explore.
- The entire database is open-source and can be run from a downloadable virtual server.
- SQL queries against the server have been more successful, allowing me to pull a raw dataset with the desired data points for the two artists in question.
- Generally there is too much data which, while clean requires continuing aggregation to reduce to a useful set of features and responses.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ended
primary_for_locale
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gid
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end_area
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last_updated
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place
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end_date_month
end_date_day
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freedb_id
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track_offset
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name
release_unknown_country
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date_month
date_day
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name
comment
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name
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iso_number
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frequency
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FK language
frequency
language
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iso_code_2t
iso_code_2b
iso_code_1
name
frequency

Metrics to Explore

- # of works (songs) released
- # of times released worldwide
- # *of cover* recordings of each artist's respective catalog
- # of times a given work is covered.
- User ratings original and cover releases.
- Time-based representation of the works and covers.

- *The goal is to build a relationship between the original work and the use by subsequent artists to show and quantify the influence.*