

SPOTIFY RECOMMENDATION SYSTEM

Springboard Capstone #2
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BUSINESS PROBLEM

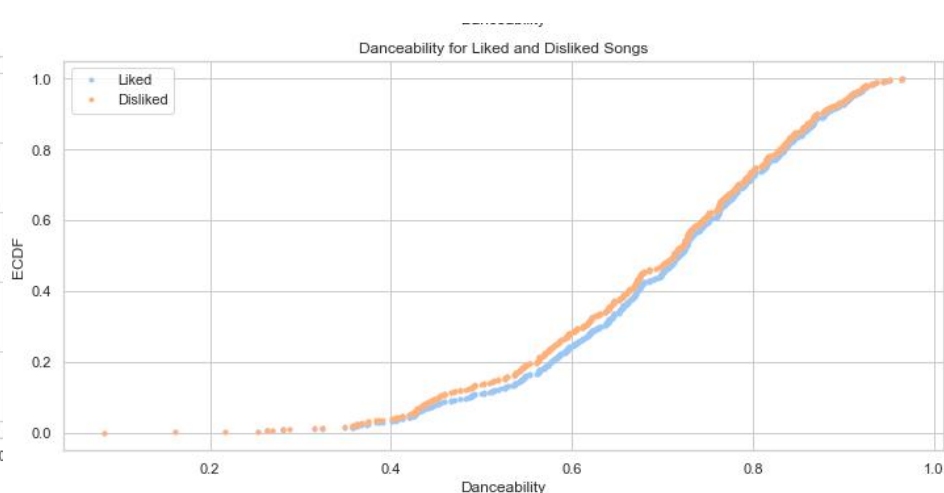
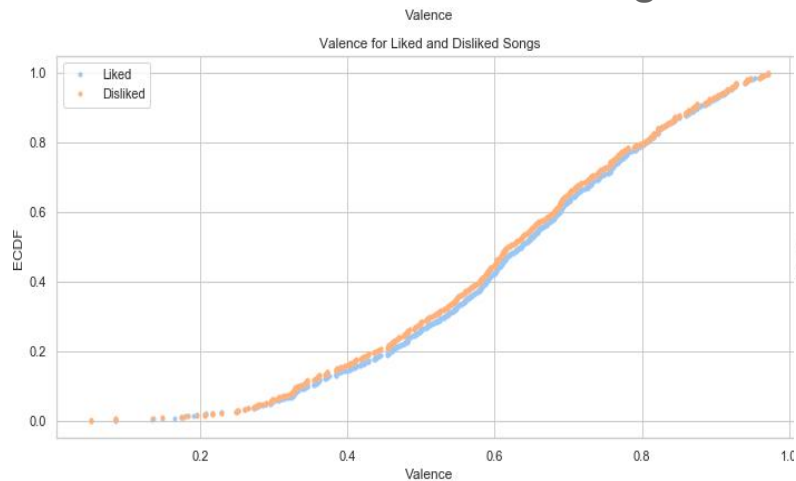
- The act of listening to music is not without its inconveniences
- Finding new, enjoyable songs can be difficult
- Spotify's current recommendation system - Discover Weekly

DATA WRANGLING

- API to create two playlists
 - Liked songs
 - Disliked songs
- Utilized Python package Spotipy

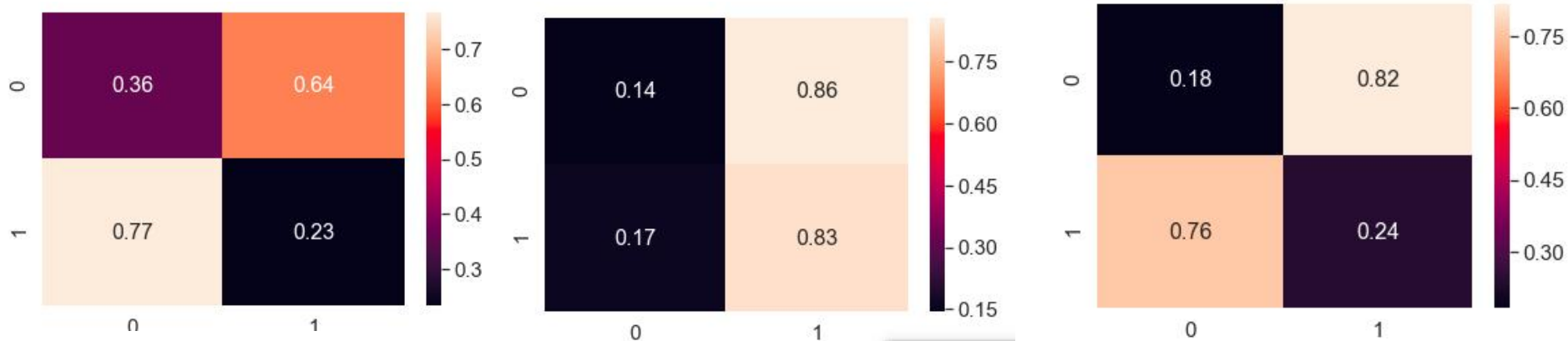
HYPOTHESIS TESTING

- Hypotheses involved whether there were mean differences in following features:
 - Valence, Tempo, Danceability
- No evidence of statistical significance



MACHINE LEARNING

- Decision Tree, Logistic Regression, K Nearest Neighbors
- Confusion matrices of models before tuning:



- After tuning the models, the accuracy scores were as follows:
 - Decision Tree: 45.2%
 - Logistic Regression: 49.2%
 - K-Nearest Neighbors: 31%