Tweeter Sentiment Analysis

Joe Mendoza

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Overview

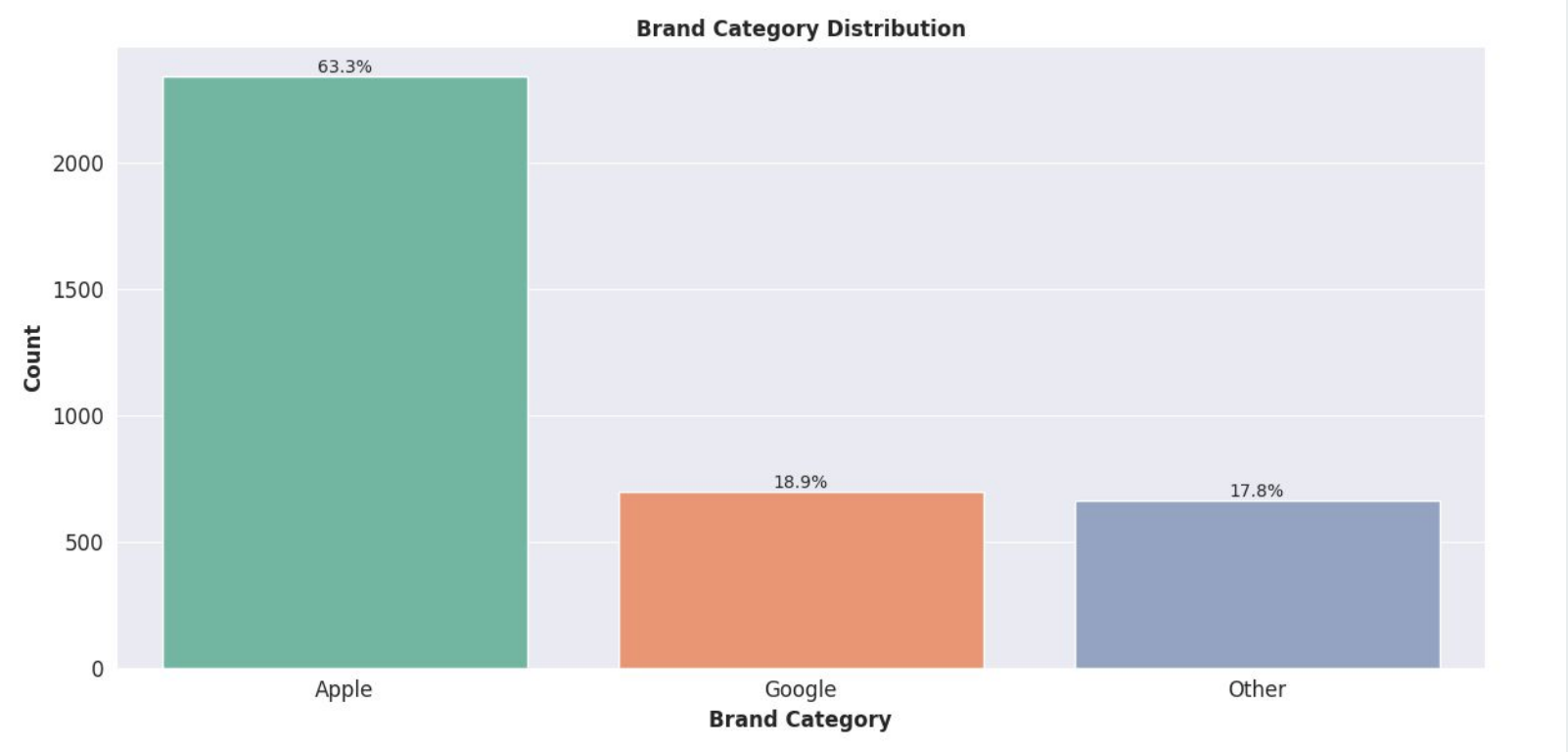
For this analysis we are going to provide insight into public perception of Google versus Apple products through sentiment.

We will be using multiple Machine Learning models for analysis

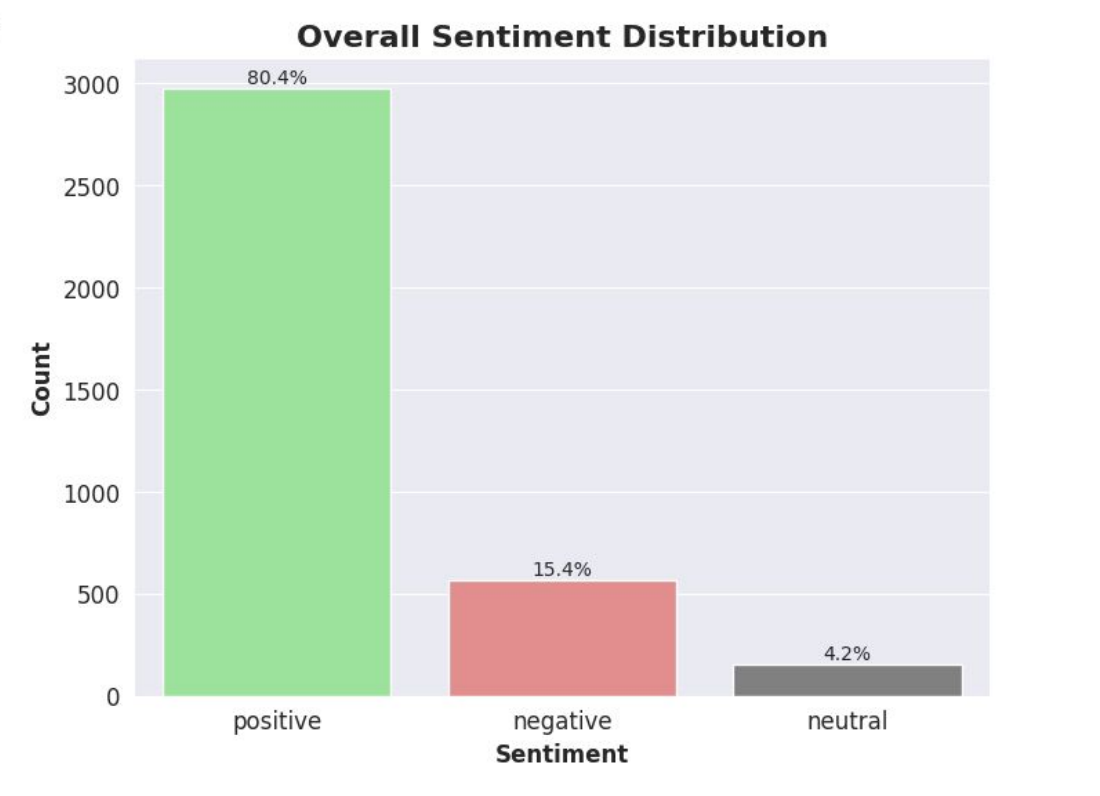
Data & Methods

- Importing the ‘tweet.csv’ for our analysis needs
- Cleaning and preprocessing data prior to analysis

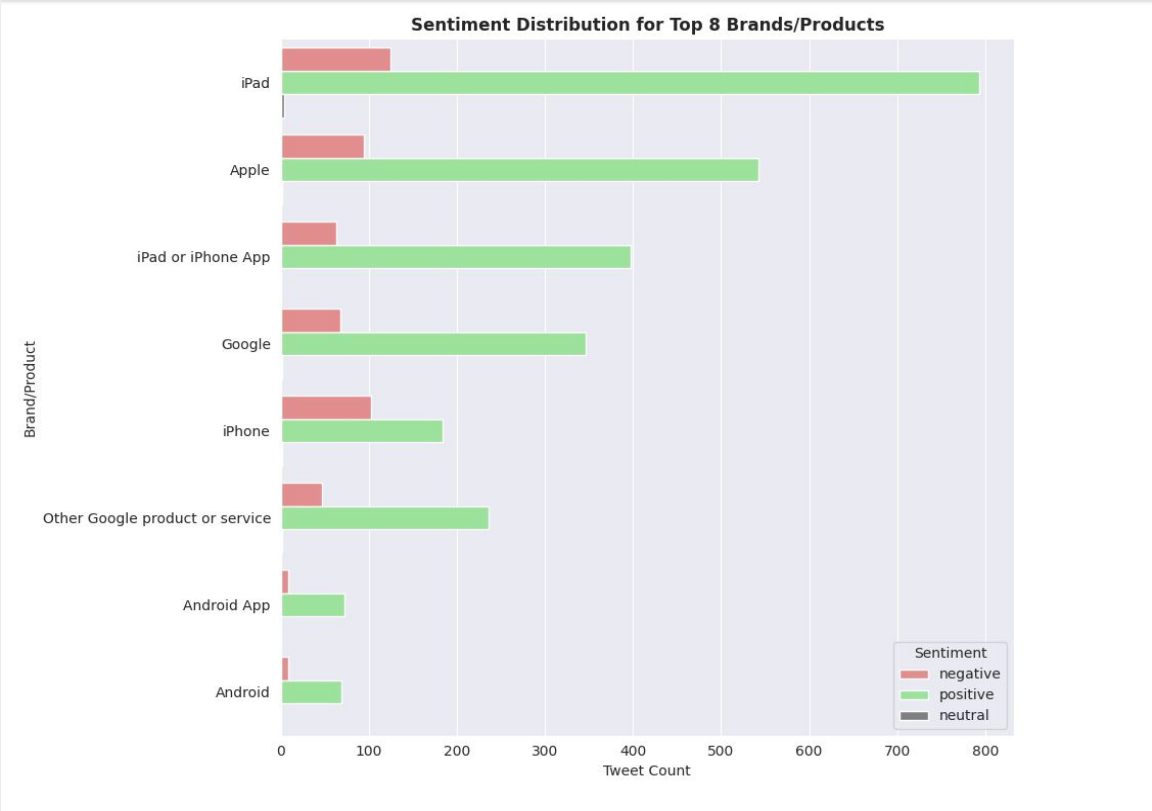
Brand Analysis



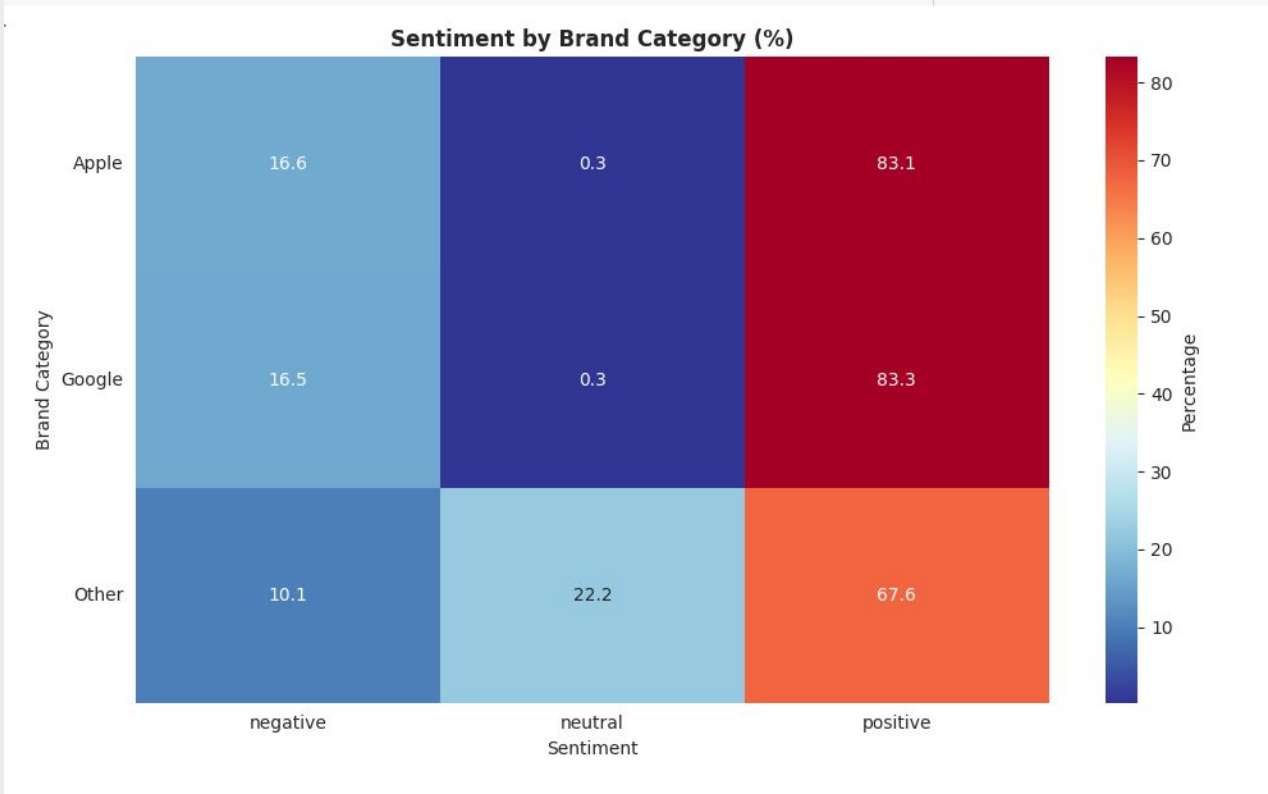
Sentiment Analysis

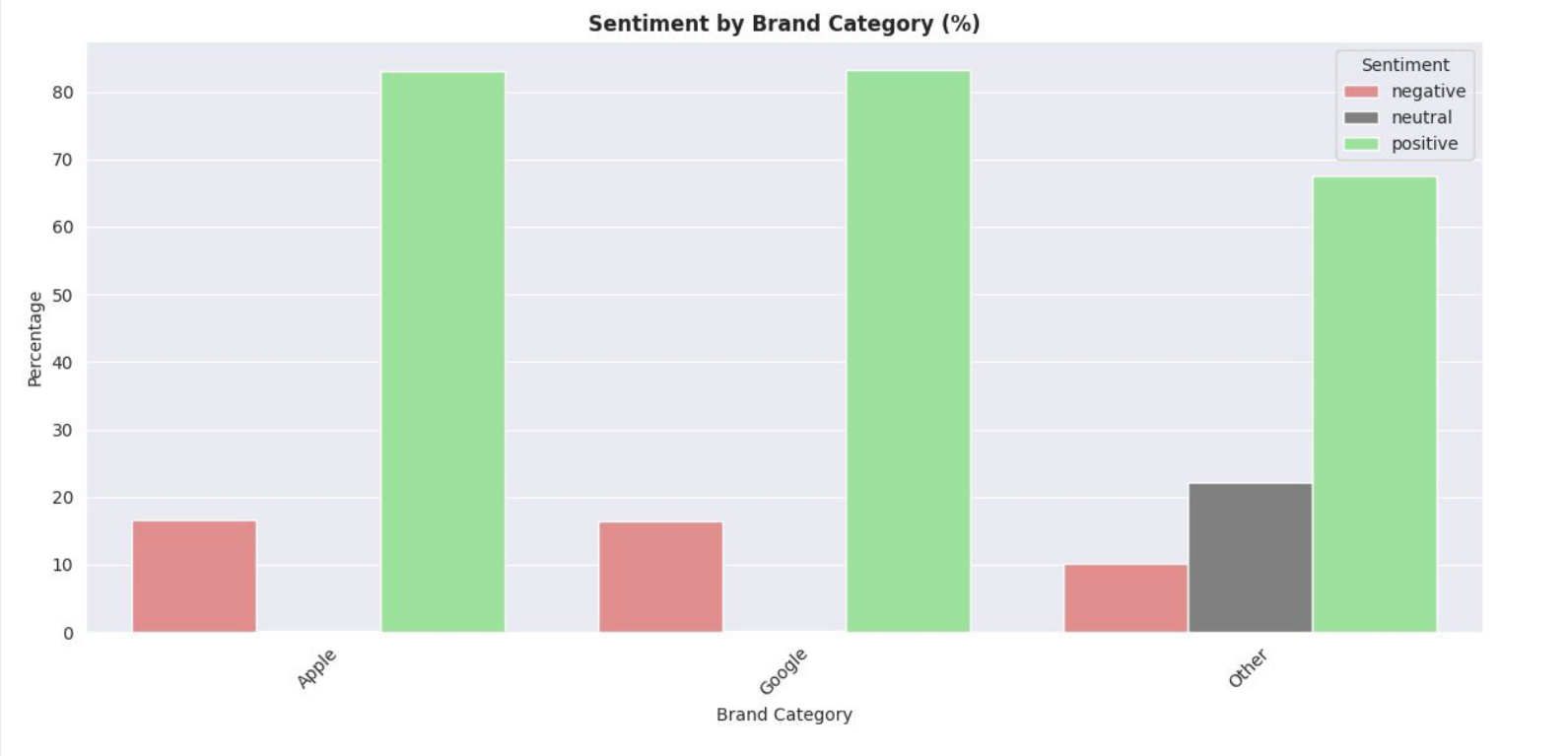


Tweet counts

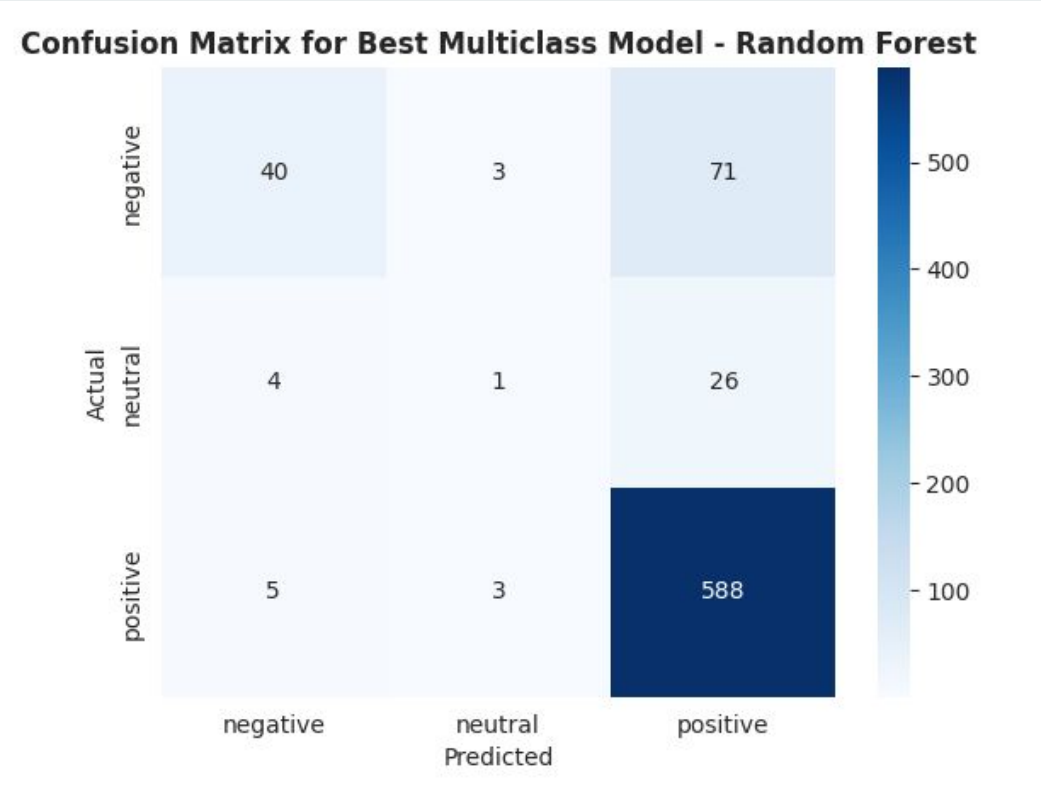


Brand Analysis

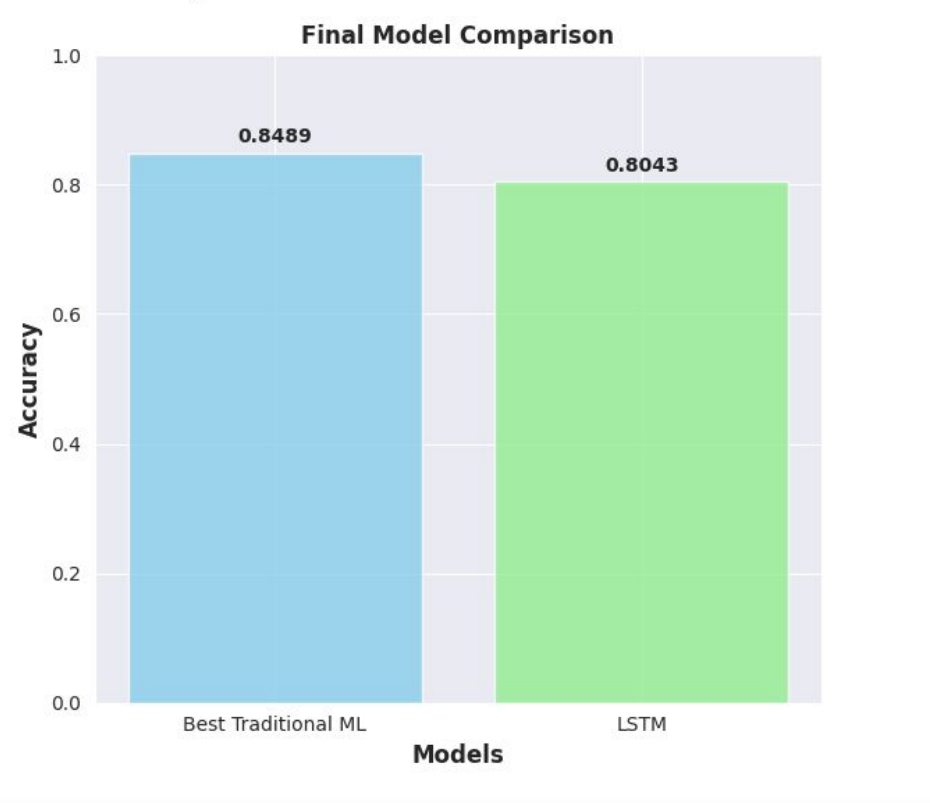



Sentiment by Brand Category (%)
Sentiment
negative
neutral
positive
Percentage
0
10
20
30
40
50
60
70
80
Apple
Google
Other
Brand Category

ML prediction



ML Comparison



Conclusions

- Apple dominated the dataset (63.3%) of tweets compared to Google (18.9%)
- Both brands achieving approximately 83% positive sentiment, 16 to 17% negative sentiment and minimal neutral responses
- Almost Identical sentiment distribution
- 84% accuracy for in classifying tweet sentiment

Limitations

- Relying on tweets only in English
- Issues protecting sarcasm and irony
- Dataset size constraints
- Traditional model learning approach, not capturing complex linguistic patterns

Recommendations

- Expand data collection to other social media outlets and review platforms
- Implement multi language capabilities

Next Steps

- Set up model maintenance for monthly performance
- Quarterly training for models

Thanks!

Email:
joe_mendoza@icloud.com

Github: @dbvimpec