TWEET SENTIMENT MAP

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Problem

- Sentiment analysis is a very valuable marketing tool as it allows users to gather information about how consumers feel about a certain product, service, or concept.
- As of now, there is a lack of tools that allow users to gather real-time sentiment data.

Solution

Twitter Sentiment Analysis Map

- Application Flow
 - User selects a rectangular location on the map and inputs search term(s)
 - App issues request to Node.js server which in turn makes use of the Twitter Streaming API to gather tweets in real-time with user parameters.
 - Server issues tweet text to Python script which uses an NLP library to perform sentiment analysis on the tweet text and returns the polarity of the tweet.
 - Tweet and sentiment detail sent back to app.
 - Real-time point is plotted on map using d3. The color of this point reflects the sentiment. Pervading sentiment in sub-area also colored (e.g. If the selected area was San Francisco, neighborhoods would be colored in according to sentiment)
 - Hovering over point displays the tweet and sentiment information.



Previous Work

Sentiment Viz from NC State



Previous Work

http://onemilliontweetmap.com/



Questions for you

- Real-time for all topics vs. accumulated data for specific topic
- Point plotting design
 - Probably too few real-time points for heat map
 - Show overall sentiment in selected area or break down into smaller areas? Both?
- Other filters/features?