

PLAGIARISM SCAN REPORT

Words 994 Date April 30,2021

Characters 6680 Excluded URL

9% Plagiarism 91% Unique 5 Plagiarized Sentences

51 Unique Sentences

Content Checked For Plagiarism

Sentiment Analysis is deep mining of text which extracts subjective information in source material and it also helps business to build product or service while monitoring online conversations.

In the age of artificial intelligence and machine learning, competition is between best and best. So, inorder to gain control over market, it is essential to understand market condition especially during covid-19 situation. For that sentiment of market is very important and sentiment of market is what consumer think of certain product.

- Apply the following Machine Learning algorithms to arrive at the best result:
- K-Means Clustering
- Support Vector Machine
- Logistic Regression
- K Nearest Neighbours

There is a need of proper and formal comparisons between these results arrived through features and classification in order to select the best features and most efficient classification techniques for particular applications.

The scope of the project is to provide a simple web app which helps to extracts people's sentiment feelings toward certain services, products, organizations, political or non-political topics and any influential people on social media.

The project aims to:

Provide an accurate sentiment analysis results. fast and easy to use web-based tool.

Providing a good entertainment visualization capabilities. Having options in term of filtering and viewing information according to user's needs. Technology Review

Frontend Technology: HTML, CSS, Javascript Backend Technology: Python, Flask, PHP

Libraries: Numpy, Pandas, Scikit-learn, Matplotlib, Seaborn, Scipy

Tools: VScode editor, Jupyter Notebook, Google Colab

Python offers concise and readable code. Moreover there are many built-in predefined in python which can be very useful in sentiment analysis. It allows programmers to focus on business logic rather than on focusing on memory management and all that lower level stuff. Python code is readable by humans, which makes it easier to build models for Artificial Intelligence.

Flask is a light weight framework which uses python. It is used to connect jupyter notebook to frontend. Flask is used as it uses the same language as jupyter notebook.

NumPy is a very popular python library for large multi-dimensional array and, with the help of a large collection of complex mathematical functions. It is very useful for scientific computations in Machine Learning. High-end libraries like TensorFlow uses NumPy internally for manipulation of Tensors.Pandas is a popular Python library for data analysis. Pandas was developed specifically for data extraction and machine learning

VScode is the most configurable and powerful editor with debugger. It is backed by Microsoft and moreover it is open source. Frontend is developed on this editor.

It helps a data scientist to document the process while developing the analysis process. One can also capture the result as the part of the notebook. With the help of jupyter notebooks, we can share our work with a Internet also. Google Colab is Jupyter Notebook running on more powerful server of google. It provides powerful GPU and CPU for high resource taking programs. It can be very useful if PC performance is not sufficient to run the code. Both jupyter

notebook and google colab are browser-based application.

Limitation of Existing System:

- The size of our data will allow us to perform cross validation experiments and check variance in performance of model Usability of project:
- It can be useful to business for analysing how to market product and what is the sentiment of people, how they will respond to product. It can be useful for predicting the tweets for a certain group of people.
- It can provide a competitive advantage for business opportunities and product possibilities.

Innovative ideas incorporated in system:

- Tweet Sentiments: Returns the Sentiments of tweets.
- Text Processing: Performs sentiment analysis, parts of speech tagging and chunking, phrase extraction and named entity recognition.
- ML Analyzer: Preforms text classification, article summarization, sentiment analysis, extracts stock symbol, extracts person names, language detection, and extracts locations.
- It can be useful to business for analysing how to market product and what is the sentiment of people, how they will respond to product. It can be useful for predicting the tweets for a certain group of people.
- It can provide a competitive advantage for business opportunities and product possibilities

It is supported in all web browsers viz google chrome, Microsoft edge, apple safari, mozilla firefox. It is written in Python3, HTML5, CSS3 and flask framework.

Non-functional Requirements

we will keep on detecting if our system hanged or an operating system error occurred. Also detecting the performance of the system in terms of the efficiency of integration of the different components

Safety Requirements: For the safety requirements nothing but an operation of weekly backups for the data base should take place.

Security and Privacy Requirements: There are no specific security requirements, anyone can access and use the portal but only authorized persons who are allowed to use and access the database, web pages and the product engine. Software Quality Attributes:

The solution is to reach the level of accuracy. But also keeping in mind that this prototype version is for proving the concept of the project

The system we designed is used to find the opinion of the people based on twitter data.

We have used Tweepy to extract tweet from twitter. This API is useful to track live tweets and make live twitter sentiment analysis.

We have used Streamlit for web App as it is very popular among machine learning projects. In streamlit, we can focus on Algorithm and all the html, css itools are provided by streamlit.

For hosting, we have used Heroku, it is very easy to understand for us and hosting from github is very easy. We have used github repository for storing the project.

Sometimes algorithm fails to identify hate speech and violent tweets. Neutral tweets can sometimes become positive or negative based on the number of likes.

Live Twitter Sentiment Analysis is not possible with static dataset.

Future Enhancement

- Potential improvement can be made to our data collection and analysis method.
- Integrate APIs for live twitter tracking.

Sources	Similarity
Jupyter Notebooks Machine Learning - 02/2021 One can also capture the result as the part of the notebook. With the help of jupyter notebooks, we can share our work with https://www.coursef.com/jupyter-notebooks-machine-learning	5%
Assignment 01.docx - Shaheed Zulfikar Ali Bhutto Institute of Also detecting the performance of the system in terms of the efficiency of integration of the different components Software Engineering BSCS 5 SZABIST-ISB Shaheed Zulfikar Ali Bhutto Institute of Science & Technology COMPUTER SCIENCE DEPARTMENT o Reliability The solution should provide reliability to the user that the product will run with all https://www.coursehero.com/file/86037423/Assignment-01docx/	3%
For the data gathering twitter is the only source and using Streaming Safety Requirements For the safety requirements nothing but an operation of weekly backups for the data base should take place. 5.3. Security and Privacy	5%

https://www.coursehero.com/file/p6rbgoj/Expected-Outcome-What-are-the-suitable-types-of-n-grams-model-to-use-in/	Page 3
Stock Market Analysis and Prediction - SlideShare • Future scope ofimprovement Potential improvement can be made to our data collection and analysis method. Future research can be done with possible improvement such as more refined data and more accurate algorithm. Implementation of discussion forums and economic news portal including other sector apart from hydropower and going in national level.	2%
https://www.slideshare.net/anilsth91/stock-market-analysis-and-prediction	