

Analyzing User Behavior of Social Media

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Abstract:- In recent time, analysis the user behavior from social media sites and applications plays a important role in current scenario. The users are people who are using social media sites and applications. To analyzing the behavior researcher deals with collecting data by opinions, identifying them. Classifying data according to the orientation of opinions and presenting their behavior from data. Analysis of behavior is an interesting job but it is also a very challenging procedure. Most of social media provides huge opinions on a particular product. The response/opinions by user play a significant role in deciding the product's future. These responses create positive or negative impact which plays a vital role in the field of e-commerce. It provides the useful result about product which have demands in the market or not, which is very useful for both customers as well as supplier of that product. In this paper researcher purposed some steps to analyze and express their views how social media data analyze market behavior for both company and customer.

Keywords: Social Media, Buying behavior, Online sites, shopping

1. Introduction:

In the recent time, trends of internet bring a revaluation in the field of e-commerce. That changed the focus of advertising of product from supplier to consumer perspective. In the current developments, the market has been changed from seller's market to the consumers market. Now customers share their reviews regarding products on social media. Behaviors analysis shows the Behaviors of a user while posting a social media message. This is important information if we know that the behavior of users can persuade other user nearby him/her. Users may influence the behavior of their network on social media by posting their messages on those social networking sites. Behavior analysis has become very important, especially for commerce that are looking to influenced data. There are a lot of companies that are paying money on getting reviews for behavior analysis so that they can find out what consumers needs, which ultimately helps them to builds their own status and improve the products and services.

Using Social media in business to influence the users even got its own name; Social Media Marketing (SMM). The big difference between social media and face-to-face communication is that with social media, people have more possibility to influence many people of their network, all at once. "Word-of-mouth (WOM) marketing communication strategies have always been around [1] to us but traditional WOM, which was the oral form of communication" [2], has involved in a new form of communication, which is known as electronic Word-Of-Mouth (e-WOM) communication.

Behaviors analysis is becoming increasingly important as organizations rush to know what actually customers need at the exact moment it's being shared via social media, digital media review forum or post sharing. Trading companies can use social media, such as Twitter, Facebook, LinkedIn whatsapp and many more, to extract what the peoples likes and dislikes so they can change their policies and supply .

The purpose of this research is "to analyze the user behavior, emotions and opinions shared by peoples from different region of the world social media. This research paper purposed a model for applying classification on data collected from social media to classify as positive, negative and neutral statements.

2. Problem formulation

There is a large amount of data available on internet but 'entire data is not constructive for user behavior analysis because this data is a raw data.' This data have 'grammatical errors and language errors which make data analysis more difficult.' Users give their 'opinions about any product in the form of text reviews on social media. One customer may no longer used to read individual review, so he would like summarize solution. In this research paper, we are performing analysis on the user behavior of data from different social media domains can be use full for business purpose.

Emotions:

Emotions are "our subjective feelings and thoughts. Emotions have been studied in multiple fields, e.g., psychology, philosophy, and sociology. The studies are very

broad, from emotional responses of physiological reactions (e.g., heart rate changes, blood pressure, sweating and so on), facial expressions, gestures and postures to different types of subjective experiences of an individual's state of mind. Scientists have categorized people's emotions into some categories.

3. RELATED WORK

Social media and blogs have become very fashionable communication tools among online users. Twitter and Facebook have become most popular social media. People share their views, activities, news, opinions, by posting on social media. Social media has become the most prominent communication service available on web today with more than millions monthly active users. Social media supports around 50+ languages and 80% of social media users are active on mobile devices.

“User behavior analysis, also called opinion mining, in this field we study that analyzes people's opinions, behavior, evaluations, appraisals, attitudes, and emotions towards products, services, organizations, individuals, issues, events, topics, and their attributes”.

The term “behavior analysis” perhaps first appeared in, Nasukawa et al., [4], and the term “opinion mining” first appeared in Dave et al., [5]. However, the research on “behavior and opinions” appeared earlier, Das et al., [6]; Morinaga et al., [7]; Pang et al., [8]; Tong et al., [9]; Turney et al., [10]; Wiebe et al., [11]. Studies on “sentiment analysis” mainly focus on ‘framework and lexicon construction, feature extraction, and polarity determination.’

Behavior analysis refers “to the use of natural language processing, text analysis, and computational linguistics to identify and extract subjective information in source material.”

4. Proposed Method for analyzing user behaviour:

1. Collect tweets from Social Media API
2. Text preprocessing for extracting stop word from Social Media
3. Find the user behavior according organization requirements

Steps in Implementation:

There are some following steps in implementing proposed framework:

- Step1: Collect data from Social Media
- Step2: Classify the data of Social Media:
 1. Positive post
 2. Negative post
 3. Neutral post

Step3: Train the classifier

Step4: Testing the accuracy of classifier

Step5: Generating the result with appropriate classifier

5. Challenges in Implementation:

While implementing the proposed model we faced a lot of challenges. First challenge was ‘to collect the data from social media API’. This was not an easy task to collect data from social media. Because there is no social media API which stored all the posts/ tweets of a particular object as we can take form different social media domains.

Second challenge was ‘to classify post or tweets behavior into positive, negative and neutral behavior. There are many social media post and tweets which gives positive as well as negative sentiment. So it's difficult to classify those tweets which had multiple meanings. And most important and difficult part of the implementation is to train the classifier.’ Like this, many challenges occurred during the implementation of proposed framework.

The message expressed in social media posts can be related to the human behavior, sentiments, nature, personality and attitude. Users always express their experience towards to product either positive or negative. When social media users express their behavior by posting positive statement, it is positive sentiment. When users express their behavior through negative post, it is negative sentiment. If behavior is neither positive nor negative then it is neutral.

6. Conclusion

In this research work we will developed a system that provides inferences on the product reviews, political statements reviews, social issues, employment reviews etc. on user behaviors analysis. Data may process using Natural Language Processing to enable the system to analyze the user's behavior on different kind of issues. We deal with feature mining, behavior analysis, attitude analysis, and opinion words classification, sentiment judgments and dependency of the users behaviors words and to understand the association between facial appearance and opinion terms of feature in a sentence.

7. Future Works:

There are large scopes for enhancement for future work in this area. Researcher may work for different social issues for human behavior analysis. Classification of Social Media data for positive behavior, negative behavior or neutral behavior that deal with the opinions of user. There are many regions and cultures for research. So that people of different regions express their opinion on different issues as per their choice.

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