

NETWORK-BASED MODELING AND INSIGHTFULL DATA MINIG OF SOCIAL MEDIA FOR IMPROVING GUIDANCE

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ABSTRACT: A Data offers many services to the end users such as software, infrastructure and platform go on. In this paper, we study about the intelligently extracting knowledge of social media has recently attracted great interest from the Biomedical and Health Informatics community to simultaneously improve healthcare outcomes and reduce costs using consumer-generated opinion. We propose a two-step analysis framework that focuses on positive and negative sentiment, as well as the side effects of treatment, in users' forum posts, and identifies user communities and influential users for the purpose of ascertaining user opinion of cancer treatment. We used a self-organizing map to analyze word frequency data derived from user forum posts. We then introduced a novel network-based approach for modeling user forum interactions and employed a network partitioning method based on optimizing a stability quality measure. This allowed us to determine consumer opinion and identify influential users within the retrieved modules using information derived from both word-frequency data and network-based properties. Our approach can expand research into intelligently mining social media data for consumer opinion of various treatments to provide rapid, up-to-date information for the pharmaceutical industry, hospitals, and medical staff, on the effectiveness of future treatments.

Keywords: Network based Model, Datamining, Social Media, Biomedical and Health Informatics

1. INTRODUCTION:

Social media is providing limitless opportunities for patients to discuss their experiences with drugs and devices, and for companies to receive feedback on their products and services. Pharmaceutical companies are prioritizing social network monitoring within their IT departments, creating an opportunity for rapid dissemination and feedback of products and services to optimize and enhance delivery, increase turnover and profit, and reduce costs. Social media data harvesting for bio-surveillance have also been reported. Social media enables a virtual networking environment. Modeling social media using available network modeling and computational tools are one way of extracting knowledge and trends from the

information 'cloud:' a social network is a structure made of nodes and edges that connect nodes in various relationships. Graphical representation is the most common method to visually represent the information. Network modeling could also be used for studying the simulation of network properties and its internal dynamics. A sociomatrix can be used to construct representations of a social network structure. Node degree, network density, and other large-scale parameters can derive information about the importance of certain entities within the network. Such communities are clustered or modules. Specific algorithms can perform network-clustering, one of the fundamental tasks in network analysis. Detecting particular user communities requires identifying specific, networked nodes that will allow information extraction. Healthcare providers could use

patient opinion to improve their services. Physicians could collect feedback from other doctors and patients to improve their treatment recommendations and results. Patients could use other consumers' knowledge in making better-informed healthcare decisions. The nature of social networks makes data collection difficult. Several methods have been employed, such as link mining, classification through links, predictions based on objects, links, existence, estimation, object, group, and subgroup detection, and mining the data. Link prediction, viral marketing, online discussion groups (and rankings) allow for the development of solutions based on user feedback.

To improve results in artificial societies and social simulation using various concepts such as reputation argumentation, and negotiation The process of reasoning systematically in support of an idea, action or theory. They collective surveillance will be characterized by Bees algorithm, Swarm intelligence, ant colony, these implementing various models or agents for simulating a social behavior [1]. Social media provides extracting the intelligent information for health care that guide each and everybody. Data mining is the computational process of discovering patterns in large **data** sets [3]. **Social media mining** is the process of representing, analyzing, and extracting actionable patterns from **social media** data[10].

2. LITERATURE SURVEY:

A triad census succinctly summarizes the local structure of a network using the frequencies of sixteen isomorphism classes of triads. The empirical base for this study is a collection of 51 social networks measuring different relational contents among a variety of species. Results show that, in aggregate,

similarities among triad censuses of these empirical networks are largely explained by nodal and dyadic properties – the density of the network and distributions of mutual, asymmetric, and null dyads. These results remind us that the range of possible network-level properties is highly constrained by the size and density of the network and caution should be taken in interpreting higher order structural properties when they are largely explained by local network features[2]. Five distinct classifier algorithms coupled by a voting scheme are found to perform well against human and statistical benchmarks. Time series and cross-sectional aggregation of message information improves the quality of the resultant sentiment index. Empirical applications evidence a relationship with stock returns – visually, using phase-lag analysis, pattern recognition and statistical methods. Sentiment has an idiosyncratic component, and aggregation of sentiment across stocks tracks index returns more strongly than with individual stocks. Preliminary evidence suggests that market activity influences small investor sentiment. Thus, the algorithms developed in this paper may be used to assess the impact on investor opinion of management announcements, press releases, third-party news, and regulatory changes [4]. Most information retrieval systems use stop word lists and stemming algorithms. However, we have found that recognizing singular and plural nouns, verb forms, negation, and the prepositions can produce dramatically different text classification results. We present results from text classification experiments that compare relevancy signatures, which use local linguistic context, with corresponding indexing terms that do not. In two different domains, relevancy signatures produced better results than the simple indexing terms. These experiments suggest that stopword lists and

stemming algorithms may remove or conflate many words that could be used to create more effective indexing terms [5].

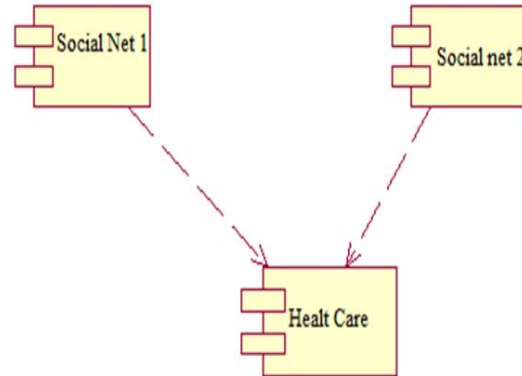
3. METHODOLOGY:

The test process is initiated by developing a comprehensive plan to test the general functionality and special features on a variety of platform combinations. Strict quality control procedures are used.

The process verifies that the application meets the requirements specified in the system requirements document and is bug free. The following are the considerations used to develop the framework for developing the testing methodologies.

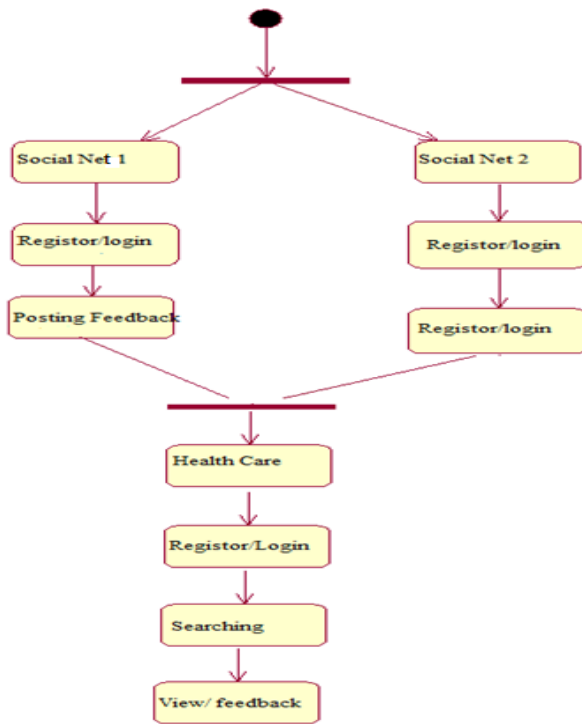
3.1. Algorithm:

Cultural algorithms: Algorithms can perform network-clustering, one of the fundamental tasks in network analysis. Detecting particular user communities requires identifying specific, networked nodes that will allow information extraction. Healthcare providers could use patient opinion to improve their services perform network-clustering, one of the fundamental tasks in network analysis. Detecting particular user communities requires identifying specific, networked nodes that will allow information extraction. Healthcare providers could use patient opinion to improve their services.



4. CONCLUSION & FEATURE ENHANCEMENT :

In this system basically used for Review for the health care related work. All feedback full and fully based on Health care feedback, the admin has avoided duplication and check basic information provided in this , In this process was all work into the work and finally all about Health Care feedback. Feature Enhancement is Avoid Content Duplication, So the admin will take care of all process, he will ignore Any false feedback arrives. If he seems this is wrong information he will not publish so the wrong feedback will be removed. That's my feature enhancement



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