An Online Based Query and Response System

Vidya Shree C, Anusha H R, Krittika Sedhain, Diana Doss V A, Dr. Anitha N

Department of Information Science and Engineering, EPCET, Bangalore, Karnataka, India,
krihikasedgain1113@gmail.com

Abstract: Query and Response (Q&R) systems play an important role in our day to day life for information and knowledge sharing. Users post questions and choose questions to answer in the system. The primary task of our project is to improve the performance of Q&R systems by actively transferring questions to users who are capable and willing to answer the questions.

Keywords: Query, Response, User post, Analysis, Repository

I. INTRODUCTION

The creation and sharing of information and ideas in online communities accessed through mobile and web based technologies. The internet is an important source of information, where the amount of data is comparatively huge and constantly increasing users depend on browsers portal to find particular details in the knowledge base. Search engines such as DuckDuckGo and use Ask.com. uses keywords given by the users to perform searches. The search engines [1] also execute well in indexing web pages and allowing users with similar content to their search. Q&R system stores all the question and answers and operated results. Therefore acts as the repository for information extraction. The structure is important for sharing specialist knowledge, and also it is a source for receiving guidance and resolving once interest about a outspreaded variety of subjects. Existing Q&R systems may not fulfill the fundamental requirement of supplying high quality answer with a short span of time. Even if users wishes to receive desirable answers fast. This is long-established by the research in [5]. Therefore, there is an increasing demand for an advanced Q&R system that can swiftly decrease the number of unanswered questions, improve the answer standard and decrease the response time. To meet this demand, we propose Q&R System an online Q&R system. This scheme relies on two social webbing parameters. First spare companions tend to share similar interest [2].

Second, companions be drawn to be trustworthy and selfless due to the property of "friendship encouragement" [3].Different from the past Question and answer system ,due to the importance of users freedom from interference, we present a security and improved efficiency to protect he users privacy during answering the questions.

II. RELATED WORK

The growing importance of Q&R systems demands an effort to better understand these systems and to upgrade them. Answering new questions with past answers. It is a two stage question answering algorithm that first identifies the resolved past question that is most similar to a target new question, and then applies a statistical classifier in order to determine whether the corresponding past answer meets the new question needs. It provides answers only if past questions are similar questions that are available[4].Interactive Query section. Firstly construct the feature space and calculate the feature vector. When a new question is posted, the semantic pattern of the question is used to identify and weigh the important words of the question. After that, the question is semantically mapped into the constructed feature space to enrich its representation. Finally, the similarity between the question and each category is calculated based on their feature vectors. The category with the highest similarity is assigned to the question. It only categorizes the question but fetching answers is not considered[5]. Authors present a new approach to Question Routing, which aims at routing questions to participants who are likely to provide answers. The problem of question routing as a classification task, and develop a variety of local and global features which capture different aspects of questions, users, and their relations[6]. It does not consider user interest factor in routing the questions. Compared to previous Q&R system works, Q&R System also supports both the common-interest and mutual-trust social network properties to improve sos performance. Q&R System concentrates on how to support social network properties in better identifying potential answers with predefined interests categories and showing its advantage through the analysis on users Q&R activities.

III. PROBLEM STATEMENT

Question and answering is a important part in knowledge gathering. As we study new topics, we like to clarify doubts in those areas by asking questions to expert. Online expert search, question directing to correct expert and getting answers is a problem dealt in the project. For example, the questions like "What is the best time for cultivating tomato in mysore".one way of finding answer is download or browse some documents or by reading some boos till we get the answer. But for some time getting answer for this kind localized question is very difficult.

IV. PROPOSED SOLUTION

The architecture of the proposed solution is given in Figure 1.

We propose Q&R system, An online Q&R system that likely transfers the queries to those users who are or willing answering them with specialized and concentrated in the question's subject.

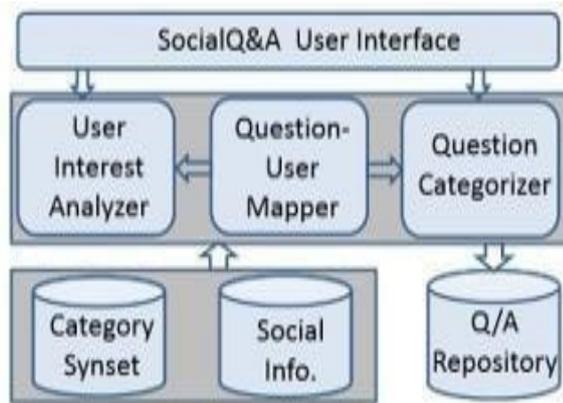Figure 1 shows the high level architecture and the interaction between the core components they are User

Fig 1.   Architecture of Q&R system

Interest Analyzer, Question Categorizer or grouper and Question User Mapper. The analyzer analyzes the information linked with user in social network to find out the user interest into categorize user queries depending on the category database, which is same kind of all groups .The Query User Mapper connects two components for finding out the capable answers and to provide desirable answer.

User Interest Analyzer: This module uses each users profile information, analyzes and finds the interest users based on his or her social activity and group interest. It links each user with a angle of interest categories.

Question Categorizer: The primary work of this module is to group the questions into interest categories depending on subject of the queries. The user is allowed to use his/her own tags associated with queries, using the WordNet it examines tags and text of queries and produce token strings. Then the tokens are compared with the Q&R system database to find the group where the question relate.

Query User Mapper: This module find the best user to who questions must be directed to get the answers. The capable answer providers are selected from the asker's friend in the online network. The changes in the users friends list in the network do not affect the efficiency of Q&R system. Here two parameters are considered 1.The same Interest between the interest vector of friend and query 2.The relationship between the friend and the asker.

V.   PROTECTION AND PRODUCTIVITY

The two methods bloom filter based personal information exchange procedure and onion routing based answer forwarding method has motivated to achieve a certain grade of protection.

A. Bloom filter Procedure:

The question-user mapper performs capable answerer selection which initiates us how about above procedure that requires friends to exchange their personal information including their friend lists and interest vectors. To protect the user's privacy the user's friends shouldn't exchange or transfer any such personal information

directly. The technique that can meet this requirement is counting bloom filter. So this Q&R system uses the counting bloom filter in order to encrypt data. The hash function takes information and user data into integer m. And the array is increased by 1. Then the higher probability of being stored in bloom filter in array is larger then 0 also the results are stored in m. keys initially and the public keys are swap between playfellow. User form an encoded routing path. Also in this procedure decryption of path is done using private key and the routing path is received by encrypted user. In order for protection of its identity and user personal data,an asker chooses several relay nodes for the users to form a path during using direct onion routing based .In a correspondence is established between any of two consecutive relay nodes.

VI.   PERFORMANCE OF SELECTED ANSWER

The Q&R system has higher than the performance three methods. They may choose friends with high interest but lower social closeness. It also generates lower response rate than social. Here we also see the response rate when SOS decreases and number of selected answers increases. As in this process more capable answers are choose. The final time for the search task was self-determined and the participants stopped searching when they felt satisfied with the answer they receive. Participants then complete comparing the results obtained from friends on their own. Later, participants sent an updated screenshot, capturing any further responses Instagram received at the end. Thus, produces has more recollecting scale.

VII.   EFFECTS OFEXPERIMENTAL RESULTS

This section deals with analysis of Q&R system over a duration of time. Hence it is not yet a commercial software the volunteers are called. To compare system performance, we would ask users to compare the questioning and answering actions.

A. Predecessor Execution

When the user registers it is required to provide the essential information such as interest, involvements in terms of predefined categories. When the question is posted the user interface analysis the questions interests by contacting Question Categorizer and passes to User Mapper and then sends the questions to top N answerers.

B. User Activities

The portable answer providers who have more common interests, close packed relationships with the asker, and have interest in the question's grouping, those question receivers are more willing to answer the question are found. Thus, Q&R system is able to achieve an improvement even with a very restricted number of users.

C. Testing of Questions

To find the question kinds, questions are divided into group and sub groups to which the question relate. Later questions are divided depending on References, advices, Genuine and oratorical. After dividing queries are transferred to users with similar interests. accurate queries receive only one answer whereas opinion-kind queries

receive more responses, as there is no last answer. This gives better options for askers.

D. Standard of Answers

The asker can rate the answer on a scale of 1 to 10 depending on the satisfaction for every queries asked. The highest rated answer exemplify the asker was given the desired data. By this way the standard of answer can be found.

E. Answers respond period

When more number of users are available we expect that it reduce wait time because the number of users willing to answer questions increases and experts in the questions subjects also increases. Wait time is minimized because the questions are sent to asker's close friends as they are ready to respond fast due to their closeness in the system.

VIII. RESULTS

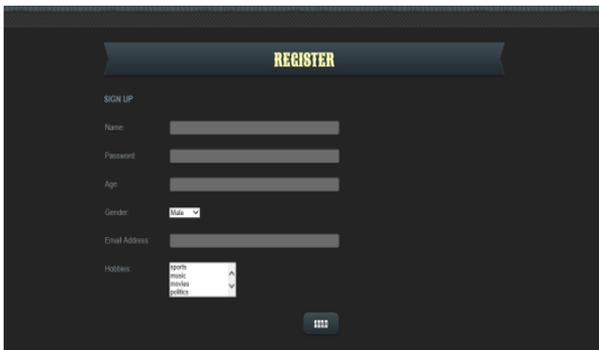The screenshots of all pages are shown in the following figures.
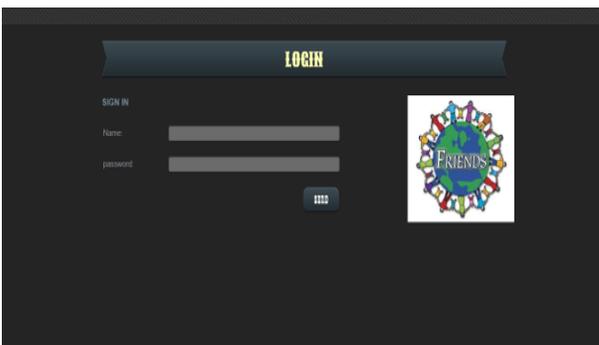

Fig 2.   Registration page

Fig 3.   Login page

IX. CONCLUSION

The system utilizes the parameters of a social network of forwarding question to a potential answer provider, ensuring that a high quality answer is obtained in short period of time .the proposed system can be used by many people for purposes such as collection of data, scholastic help and interaction. Query and response can operate a system learning procedure.
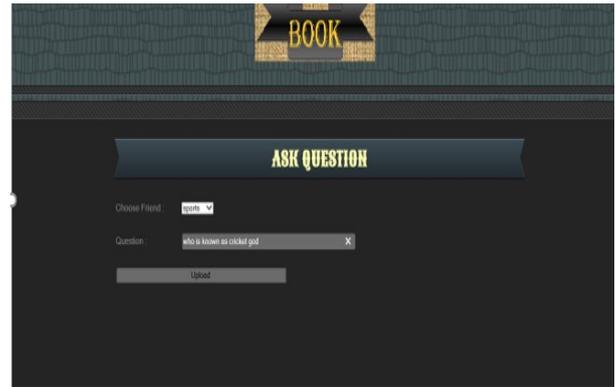

Fig 4.   Ask question page

Fig 5.   Answering page

REFERENCES

[1] M. R. Morris, J. Teevan, and K. Panovich. A Comparison of Information Seeking Using Search Engines and Social Networks. In In Proc. of ICWSM, 2010.

[2] A. Mtibaa, M. May, C. Diot, and M. Ammar. Peoplerank: Social Opportunistic Forwarding. In Proc. of Infocom, 2010.

[3] E. Pennisi. How Did Cooperative Behavior Evolve? Science, 2005.

[4] Shtok, G. Dror, Y. Maarek, and I. Szpektor. Learning From the Past: Answering New Questions With Past Answers. In Proc. of WWW, 2012.

[5] W. Song, W. Liu, N. Gu, X. Quan, and T. Hao. Automatic Categorization of Questions for UserInteractive Question Answering. Information Processing and Management, 2011.

[6] T. C. Zhou, M. R. Lyu, and I. King. A Classification-Based Approach to Question Routing in Community Question Answering. In Proc. of WWW (Companion Volume), 2012

Conference held at Brindavan College of Engineering, Yelahanka, Bagalur Main Rd, Dwarka Nagar, Bengaluru - 560063