**Mining Users Trust From E-Commerce Reviews Based on Sentiment Similarity Analysis**

**Abstract:**

CONSUMERS’ REVIEWS IN E-COMMERCE SYSTEMS ARE USUALLY TREATED AS THE IMPORTANT RESOURCES THAT Reﬂect USER’S EXPERIENCE, FEELINGS, AND WILLINGNESS TO PURCHASE ITEMS. ALL THIS INFORMATION MAY INVOLVE CONSUMERS’VIEWSONTHINGSTHATCANEXPRESSINTEREST,SENTIMENTS,ANDOPINIONS.MANYKINDSOFRESEARCHHAVE SHOWN THAT PEOPLE ARE MORE LIKELY TO TRUST EACH OTHER WITH THE SAME ATTITUDE TOWARD SIMILAR THINGS. IN THIS PAPER, WE CONSIDER SEEKING AND ACCEPTING SENTIMENTS AND SUGGESTIONS IN E-COMMERCE SYSTEMS SOMEWHAT IMPLIES A FORM OF TRUST BETWEEN CONSUMERS DURING SHOPPING. FOLLOWING THIS VIEW OF POINT, AN E-COMMERCE SYSTEM REVIEWS MINING ORIENTED SENTIMENT SIMILARITY ANALYSIS APPROACH IS PUT FORWARD TO EXPLORING USERS’ SIMILARITY AND THEIR TRUST. WE DIVIDE THE TRUST INTO TWO CATEGORIES, NAMELY DIRECT TRUST, AND PROPAGATION OF TRUST, WHICH REPRESENTS A TRUST RELATIONSHIP BETWEEN TWO INDIVIDUALS. THE DIRECT TRUST DEGREE IS OBTAINED FROM SENTIMENT SIMILARITY, AND WE PRESENT AN ENTITY-SENTIMENT WORD PAIR MINING METHOD FOR SIMILARITY FEATURE EXTRACTION. THE PROPAGATION OF TRUST IS CALCULATED ACCORDING TO THE TRANSITIVITY FEATURE. USING THE PROPOSED TRUST REPRESENTATION MODEL, WE USE THE SHORTEST PATH TO DESCRIBE THE TIGHTNESS OF TRUST AND PUT FORWARD AN Improvedshortestpathalgorithmtoﬁgureoutthepropagationtrustrelationshipbetweenusers.ALARGE-SCALE E-COMMERCE WEBSITE REVIEWS DATASET IS COLLECTED TO EXAMINE THE ACCURACY OF THE ALGORITHMS AND FEASIBILITY OF THE MODELS. THE EXPERIMENTAL RESULTS INDICATE THAT THE SENTIMENT SIMILARITY ANALYSIS CAN BE AN Efﬁcient METHOD TO ﬁnd TRUST BETWEEN USERS IN E-COMMERCE SYSTEMS.

**SYSTEM REQUIREMENTS:**

**HARDWARE REQUIREMENTS:**

* System : Pentium Dual Core.
* Hard Disk : 120 GB.
* Monitor : 15’’ LED
* Input Devices : Keyboard, Mouse
* Ram : 1 GB

**SOFTWARE REQUIREMENTS:**

* Operating system : Windows XP/UBUNTU.
* Implementation : NS2
* NS2 Version : 2.28
* Front End : OTCL (Object Oriented Tool Command  Language)
* Tool : Cygwin (To simulate in Windows OS)