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Using a Multi-Criteria Decision Making Approach for Assessing the Factors Affecting Social Network Sites Intention to Use

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Abstract

Since the emergence of the first Social Networking Site (SNS) as a new means of communicating with other people, much research has attempted to identify empirically and theoretically the characteristics, history, and impact on human relationships of both Social Networking Sites and their users. Users' reasons for joining to Social Networking Sites is one of the research gap in the users' behaviour studies that their focus are on users' participations in Social Networking Site . This research aims to explore the factors that affect the intention to use in Social Networking Sites. Thus, our work aims to contribute to the literature by investigating the influential factors that cause the users adopt a SNS. Accordingly, we apply a Multi-Criteria Decision Making (MCDM) approach, fuzzy AHP, to evaluate the influential factors that cause the users adopt a SNS. Our findings show that the important factors influencing SNS users' intention for general purpose are Trust, Security and Performance expectancy.

Keywords: Fuzzy AHP, Social Networking Site, Adoption factors

1. Introduction

Social networking sites (SNS) have becoming a mass phenomenon, positioning as one of the most popular online means of communication. The contributions of SNS are sharing common interest, increasing the number of contacts and development online communities. Having one or more accounts in the SNS makes it one of the most attractive Internet's activities and now hundreds of millions of SNS applications to attract users and this number is growing rapidly.

Boyd and Ellison (2007) define SNS as ''services based on Internet that allow individuals to build a public or semi-public profile within a system, create a list of other users that share a connection, and see and navigate through their list of connections and of those created by others within the system''. Know and Wen (2010) defined SNS as ''websites that allow building relationships online between persons by means of collecting useful information and sharing it with people. Also, they can create groups which allow interacting amongst users with similar interests''. SNS specifically offer the users a space where they can maintain and create new relationships, as well as share information (Kolbitsch and Maurer 2006).

SNSs support the new connection among internet's users and remain previous social ties. For these reasons they have immense importance for both parties (individuals and businesses)(Alarcón-del-Amo, Lorenzo-Romero, & Del Chiappa, 2013). There are numerous SNS build on various technologies, supporting a wide range of interests and practices. There are different kind of users with different cultures, tastes, etc., which emerge around the different kind of SNS; some SNS serve a diverse audience, while others attract people based on common interests, demographics, language, nationality (Boyd and Ellison 2007). Despite extensive research has examined the factors that lead people to adopt and use the SNS, few approaches have focused on the assess the importance of influential factors in this adoption process, since in order to understand SNS user behaviour, an initial review of the existing literature on this topic showed a strong focus on user participation and SNS applications, both of them assuming that users are already registered with the SNS. Our work aims to contribute to the literature by investigating the main motivations that a SNS user has for joining a new SNS. Thus, being interested in finding out what the main factors in joining a new SNS are, a fuzzy AHP model was implemented in order to answer this question.

2. Literature review

2.1 Definition

In the Web 2.0 (or Social Web) users are not just simple consumers of content created by professionals but they are