Understanding Social Media Adoption: The Role Of Perceived Media Needs And Technology Characteristics

Izzal Asnira Zolkepli¹ and Yusniza Kamarulzaman²

Evidence suggests that consumer's needs for traditional media constitutes an essential determinant in consumer media adoption. However, studies on the need for non-traditional media still remain scarce. It continues to be questionable whether consumer media needs would have the same significant impact on social media, since its nature is highly interactive and user controlled. Drawing upon the Uses and Gratification Theory and Diffusion of Innovation Theory, this paper aims to understand the adoption of social media among Internet users. A proposed model is developed by integrating the dimensions of consumer perceived media needs and perceived characteristics of social media technology as the drivers for adoption behaviour. The model will be able to better enhance the understanding of researchers and practitioners of consumer predictive needs and their relationship to the speed of consumer adoption behaviour in social media.

Field of Research: Consumer Behaviour, Social Media, Technology Adoption, Media Uses and Gratifications.

1. Introduction

The existence of social media offers advanced relationships and targets opportunities for marketers in consumer markets (Morris and Ogan, 1996, Drury, 2008, Bhagat et al., 2009, Mangold and Faulds, 2009). Social media has made it possible for businesses to communicate instantaneously and simultaneously with consumers (B to C) and consumers to communicate with other consumers (C to C) regarding products, brands and services continuously. This reciprocal cycle is magnified greatly in the marketplace and has impacted marketers’ and consumers’ usage of this medium (Mangold and Faulds, 2009).

Throughout the last few years, marketers have, to a great extent, been surprised over the dramatic traffic growth in social media, namely, Facebook. Being the premier social media site (Cheung et al., 2010), Facebook was reported in a market survey to have had an exponential increase in the total amount spent online by consumers from 3.1 billion minutes to 205 billion minutes from December 2007 to December 2008 (Nielsen, 2009). It is expected that an increment of 566 percent of the time spent online will increase significantly over time, with billions of consumers and marketers flocking into social media as more and more people adopt online interaction as part of their daily activities (Bhagat et al., 2009). Marketers attribute this change of course to the self-sustaining nature of the social media (Radwanick, 2010).

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Despite this significant increase, existing studies on social media are, to a certain extent limited, for instance, investigation of social media attributes such as sociability and usability as a direct relation to adoption and usage of this medium, and are unable to explain the factors that lead consumers to move into social media (Preece, 2001, Phang et al., 2009). However, there is a need to understand the unexplored areas of social media consumption that would help to justify the substantial increase of time spent on Facebook to 566 per cent (Nielsen, 2009). This is evidenced by Shao (2009) who indicated that although user-generated media (UGM), such as YouTube, MySpace, Facebook and Wikipedia, have become tremendously popular today, in-depth studies on this medium are still relatively lacking.

Empirical findings on consumer behaviour and social media are basically conceptual and anecdotal. In addition, findings on user-generated media (UGM) that reflect similar social media attributes mainly cover consumer adoption behaviour in video sharing sites (i.e. YouTube), picture sharing sites (i.e. Flickr) and other virtual community sites (i.e. support group communities and brand communities). These studies examined the medium attributes as the antecedents of usage and adoption (Muniz and O'Guinn, 2001, Cova and Pace, 2006, Leimeister et al., 2008, Haridakis and Hanson, 2009, Shao, 2009).

Considering that specific studies on social media are lacking, this paper aims to fill the knowledge gap by examining factors that explain consumer adoption of social media. In particular, this study seeks to understand the adoption of social media in light of perceived media needs (PMN) and perceived characteristics of social media technology (PCSMT). Accordingly, the objective of this paper is to analyze consumer PMN and PCSMT in relation to consumer media adoption of social media. In return, this understanding will help marketers to design targeting strategies and enhance their customer relationship management (CRM) with existing and potential consumers via the social media platform.

In analyzing the determinants that drive the uses and adoption of this media, the understanding of the Uses and Gratifications Theory (UGT) by Katz, Blumler and Gurevitch (1974) and Diffusion of Innovations Theory (DIT) by Rogers (2003) are also discussed.

The structure of this paper is organised into three sections. The first section provides a review of the literature on Social Media and consumer media needs, Uses and Gratifications Theory (UGT) and Diffusion of Innovations Theory (DIT). Next, the proposed conceptual framework is presented with hypotheses and, finally, the conclusion and implications are discussed in the last section.

2. Literature Review

2.1 Social Media and Consumer Media Needs

Social media is a group of Internet based applications that were built on the ideological and technological foundations of Web 2.0, which allow for the creation and exchange of user-generated content (Kaplan and Haenlein, 2005). According to Cooke and Buckley (2007), the key understanding of social media is basically derived from the user-generated content itself, which has blurred the distinction
between consumers and marketers. This resulted in social media being utilized by consumers on their own initiative instead of it being promoted and encouraged. It facilitates co-creation of content, context and connection, facilitates multiple communications and is described as a social trend in which consumers use social media technology to acquire information from one another (Bernoff and Li, 2008), which drives its success (Kaplan and Haenlein, 2005). Social media has become a mass media vehicle for consumer-sponsored communication that represents a number one source of media for consumers at work and the number two source of media for consumers at home (Rashtchy et al., 2007).

Consequently, the need of consumers to consume traditional media is on the decline and has gradually gravitated towards online media, which has culminated in the usage of social media that is more personalized and user-controlled (Bhagat et al., 2009). Consumers consistently demand for more media consumption that could support immediate access to information at their own convenience (Rashtchy et al., 2007, Vollmer and Precourt, 2008). Hence, the media control changes in consumer behaviour and their pattern of adoption, as consumers perceive the importance of the technology system offered by this type of media. This has led consumers to adopt social media effortlessly (Mangold and Faulds, 2009).

This phenomena prompts media scholars to reveal that the traditional model of media communication is no longer adequate to represent online media, and merging the traditional media model and online communication model may serve as an increasingly more accurate representation (Perry, 2002). Consumer media consumption is purposive and involves active behaviour in which consumers seek media content based on their internal motivations (Eastin and Daugherty, 2005). These internal motivations are to meet consumer specific needs and serve as the basis of attitude formation (O'Keefe, 2002, Daugherty et al., 2008). According to Eagly and Chaiken (1993), a person’s attitude signifies the individual’s psychological tendency that is expressed through a particular object that serves the consumer’s various motivations (Eagly and Chaiken, 1993). This particular object refers to consumer media selection, which, if met, would satisfy the consumer’s various motivation needs. However, due to an individual’s various needs in media consumption, consumers may choose to consume social media for different reasons, which is the justification for this paper.

### 2.2 Uses and Gratifications Theory

In justifying social media adoption and consumer willingness to choose social media, attitudes towards the selection of media first need to be analyzed (Daugherty et al., 2008, Fischer and Reuber, 2011). According to the Uses and Gratifications Theory (UGT), people by their own choice choose a certain media to gratify their own needs and justify their doing so by asserting that different people use the same mass media for very different purposes (Ruggiero, 2000). UGT is a media that uses the theory of mass communication that focuses on individual use and choice of media (Katz et al., 1973). The main purpose of this theory is to explain why people choose a specific medium over alternative communication media and the underlying needs that motivate people to use that media. This theory states that users are goal-directed in their behaviour and are aware of their needs (Cheung et al., 2010). The
summarization of the application of UGT in various media studies is presented in Table 1.

### Table 1: Review of consumer media needs using UGT from 1983 – 2006

<table>
<thead>
<tr>
<th>Author/s (Year)</th>
<th>Medium</th>
<th>Uses and Gratifications of Media</th>
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<tbody>
<tr>
<td>Ferguson and Perse (2000)</td>
<td>TV Related Web Surfing</td>
<td>Entertainment, Pass Time, Relaxation, Social Information</td>
</tr>
<tr>
<td>Charney and Greenberg (2002)</td>
<td>Internet</td>
<td>Division Entertainment, Peer Identity, Good Feelings, Coolness, Keep Informed, Communication, Sights and Sounds, Career</td>
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</tbody>
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UGT has always provided an advanced theoretical approach in the initial stage of each new mass communications medium when they were first introduced, for instance, newspaper, television, radio and the Internet (Ruggiero, 2000). As social media continues to provide people with a wide range of platforms and content, this theory is one of the most appropriate perspectives for investigating the mediated communication situation through a single or multiple sets of psychological needs, psychological motives, communication channels, communication content and psychological gratifications (Rayburn et al., 1984, Lin, 1996, Cheung et al., 2010, Luo et al., 2010).

In relation to this study, a large body of literature suggests that media needs predict usage and that media usage influences gratification (Palmgreen et al., 1981, Rubin, 1983, Ko et al., 2005). Within the uses and gratification perspective, consumer media consumption is believed to fulfil certain cognitive and affective stages of consumer needs, such as surveillance, information learning, entertainment, personal identity, parasocial interaction, companionship and escape (Katz et al., 1973, Blumler, 1979, Rubin, 1983, Xiang and Gretzel, 2010). Even so, the psychological gratification obtained from media consumption is clearly present, as perceived by the consumer.
Certainly, consumers do make distinct selections across a multitude of media channels and content choices offered to them (Abelman et al., 1997).

### 2.3 Diffusion of Innovation Theory (DIT)

The leading theory for analysing technology characteristics in relation to media consumption is DIT by Rogers (2003). Essentially, this theory suggests that when a concept is perceived as new, an individual utilises communication tactics within their social systems to arrive at a decision point of either adoption or rejection of the innovation (see Figure 1). The innovation characteristics serve as an important influence over an individual’s adoption decision. DIT also predicts that media and other interpersonal contacts provide information and influence consumer behaviour (Peter and Olson, 2010).

In recent years, the vast majority of innovation diffusion studies focus on the adoption of product technologies, for instance, the mobile phone (Roach, 2009), mobile gaming (Kleijnen et al., 2004), Internet as a communication channel (Lin and Yu, 2006) and mobile Internet service (Pedersen, 2005). There are only a few studies that concentrate on the adoption of the new media, i.e. social media (see Fischer 2011; Shin & Shin, 2010; Cheung, Chiu & Lee, 2010). Thus, this paper conceptualises social media to be an innovation, which distinguishes it from other online media communications.

![Figure 1: Diffusion of Innovation Theory (Rogers, 2003)](image)

According to Luo et al. (2010), when needs are studied in relation to adoption, an integration of theories would bring an understanding of the extent to which online media and its qualities correlate with the pursuit of certain gratifications that lead to the acceptance and adoption of online media (Rashtchy et al., 2007, Shin and Shin, 2010). Among other information technology (IT) theories, DIT is distinct in its applicability to communication media of all kinds. DIT’s comprehensive nature enables it to understand electronic communication media where computers have not only become home and business applications, but also for work and play functions (Rashtchy et al., 2007). While it is argued that DIT brings a new perspective to understanding the adoption decision of online media consumer, such arguments...
should only be made with supporting evidence from a fair integration of media and IT theory.

3. Conceptual Model Development

UGT advocates that consumers turn to media to satisfy their own needs rather than allowing the media to control them, and that the media acts as an agent of diversion and entertainment (Katz et al., 1974). It argues that the selection of media, content and the uses are influenced by the role of psychological bias. Viewing the media permits consumers to not only ask how the media gratifies and influences them but also how and why they adapt media into their social institutions. Thus, if consumers select certain media, they gain insight into the attributes of the media and the social and psychological functions that the media offers.

UGT literature provides several ways of classifying consumer needs and gratification. Some researchers report on immediate and deferred gratification (Schramm et al., 1961, Ko et al., 2005) and some report it as informational-educational and fantasist-escapist entertainment (Weiss, 1971, Charney and Greenberg, 2002). Katz et al. (1973) sees the media as a means used by individuals to connect or disconnect themselves with others. Based on largely speculative literature from social and psychology discipline, Katz et al. (1973) classified 35 media needs statements into five categories: (i) cognitive needs, which strengthen information, knowledge and understanding, (ii) affective needs, which strengthen aesthetic, pleasurable and emotional experience, (iii) personal integrative needs, which strengthen credibility, confidence, stability and status and combine cognitive and affective, (iv) social integrative needs, which strengthen contact with family, friends and the world, and (v) tension-release needs, which escape or weaken contact with the self and social role. Katz et al. (1973), apply it in the context of how Israelis perceived media needs through television, radio, newspaper, books and the cinema.

Considering these five types of needs by Katz et al. (1973), and other studies that take the same stance on this approach, this study uses the last three needs, which are assumed to be more accurate and relevant to social media studies – sociability and usability (Preece, 2001, Phang et al., 2009). In addition, previous studies stated that (refer to Table 1) entertainment, pass time, escape, social interaction, information, convenience and coolness are highly related to web-based study, which is presumed to fit into these three categories (Kaye, 1998, Ferguson and Perse, 2000, Papacharissi and Rubin, 2000, Charney and Greenberg, 2002, Ko et al., 2005, Diddi and R.Larose, 2006). This study uses personal integrative needs, social integrative needs and tension release needs as the latent to determine the antecedents of perceived media needs.

In addition, extending the UGT paradigm into DIT, this paper widens consumer media needs to explain the consumer affective, cognitive and conative stage of the consumer adoption decision process (Peter and Olson, 2010). According to Rogers (2003) DIT denotes that before a set of behaviour reaches the adoption stage, it is assumed that the consumers’ prior condition will interfere in the beginning stage of the adoption process (Figure 1). This paper counts prior conditions as felt by media needs in driving consumers to use and gratify media consumption. Hence, it is
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proposed that consumer perceived media needs will have a positive effect on social media perceived characteristics of technology, as below:

\[ H_1: \text{Perceived media needs are positively related to the perceived characteristics of social media technology} \]

Understanding the five characteristics of innovation by definition (Rogers, 2003), (i) relative advantage is described as the degree to which an innovation is perceived as being better than its predecessor, (ii) compatibility is described as the degree to which an innovation is perceived as being consistent, (iii) complexity is described as the degree to which an innovation is perceived as being difficult to use, (iv) observability is described as the degree to which the results of an innovation are observable to others and (v) trialability is described as the degree to which an innovation may be experimented with before adoption. In recent DIT literature, it was suggested that among the five characteristics of innovation attributes, relative advantage was one of the most frequently tested characteristics and most consistent predictors of adoption (Onkvisit and Shaw, 1989, Plouffe et al., 2001, Teo and Pok, 2003). The less strong characteristics of innovation are trialability and observability. Generally, these two characteristics are found to have an insignificant impact on the adoption of certain technology, for instance, mobile service innovation (Teo and Pok, 2003) and electronic payment system (Plouffe et al., 2001). However, since the social media phenomenon is observable and transferable through word of mouth and friend recommendation (Haridakis and Hanson, 2009), and is also able to accept deactivation or withdrawal of participation (Valenzuela et al., 2009), these two less strong characteristics of innovation will still be tested. In the context of this study, it is hypothesised as below:

\[ H_2: \text{Perceived characteristics of social media technology affect consumer adoption of social media} \]

Besides having the technology characteristic as the mediator, it is also applicable to test the direct relationship of perceived media needs towards the adoption behaviour by evading the characteristic of technology. This is in relation to consumer media needs that are sometimes presumed to be overwhelming and irresistible (Cooke and Buckley, 2008). The characteristic of technology may be less important to consumers because the needs subsidises the technology in some circumstances (Parker and Plank, 2000). In addition, the social media attributes of sociability and usability might be more dominant than the technology characteristic. Thus, the direct relationship of this construct could be hypothesised as below:

\[ H_3: \text{The perceived media needs of the consumer have a significant positive effect on social media adoption.} \]

Based on the hypothesis outline, the relationships between each variable described are presented in the proposed research model depicted in Figure 2 below. Figure 2 explains that the perceived integrative needs, social integrative needs and tension release needs are the media needs antecedent of consumer adoption in social media. However, taking into account the social media quality that is technology-based, the technology characteristics of relative advantage, compatibility, complexity,
trialability and observability are tested to observe whether the relationship strengthens the process.

**Figure 2: Conceptual framework for consumer needs for adoption of social media**

4. Conclusion and Implications

From the review of the literature, it shows that the fragmentation and dynamics of postmodern markets create gaps in the literature. It indicates that marketers’ traditional methods of reaching consumer-oriented markets are less likely to produce insights that guide marketers’ future targeting and positioning strategy. Due to the expansion of social media usage, this paper gives the opportunity for researchers and marketers to understand social media as a media outlet for an overwhelming online majority to fulfil their media needs. This paper proposes a framework to enhance researchers’ understanding of consumer predictive needs in technology-based social media and its relation to the speed of consumer adoption behaviour. It suggests that personal integrative needs, social integrative needs and tension-release needs will have a significant influence on adoption behaviour, and that this behaviour will be accelerated due to the five characteristics of technology. However, further research should address some of the limitations and questions that arise from this conceptual paper, for instance, how this model would contribute to strengthening CRM, how to correlate this model with advertising strategy and tactics and how from this model the social media market can be segmented and targeted based on the different types of media need.
Therefore, for future research, further understanding of these model contributions and limitations will greatly benefit the understanding of researchers and marketers concerning the social media role in attracting online consumers and developing a social media marketing strategy. Over time, social media will become a highly personalized place in which consumers will manage their media consumption to fulfil even more specific needs and desires. Thus, from this study researchers and marketers will be able to read and interpret this social phenomenon in which consumers' needs that were once considered private now rest in the public domain.

References


Fischer, E & Reuber, AR 2011, 'Social interaction via new social media: (How) can interactions on Twitter affect effectual thinking and behaviour?', *Journal of Business Venturing*, vol. 26, no. 1. 1-18.


Xiang, Z & Gretzel, U 2010, 'Role of Social Media in Online Travel Information Search', *Tourism Management*, vol. 31, no. 2. 179-188.