

# Friends, Fans, and Followers: Do Ads Work on Social Networks? How Gender and Age Shape Receptivity

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Social-networking sites (SNS) such as Facebook and Twitter are growing in both popularity and number of users. For advertisers and the sites themselves, it is crucial that users accept advertising as a component of the SNS. Anecdotal evidence indicates that social-networking advertising (SNA) can be effective when users accept it, but the perception of excessive commercialization may lead to user abandonment. Empirical support for these propositions, however, is lacking. Based on media uses and gratification theory, the authors propose and empirically test a model of content-related, structural, and socialization factors that affect users' attitudes toward SNA.

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## INTRODUCTION

To generate brand awareness for its Old Spice fragrance line, Procter & Gamble invited Facebook users to "Turn Up Your Man Smell" by becoming "fans" of its products. Within a week, the brand's fan page had more than 120,000 new fans (Morrissey, 2009). Not content merely to draw fans to its Facebook page, the Red Robin restaurant chain enlisted Facebook users as "brand ambassadors," asking them to send pre-written recommendations to online friends. Some 1,500 customers—each with an average of 150 friends—agreed to post recommendations, which the company estimates resulted in approximately 225,000 positive advertising impressions (York, 2009). Faced with declining sales in the wake of safety recalls, Toyota used a combination of YouTube videos and Facebook pages to promote its Sienna minivan. Creating a fictional couple who "believe they are cool despite all evidence to the contrary" (Elliott, 2010), the automobile manufacturer broadcast a series of videos through the YouTube site, then solicited Facebook fans, combining both forms of social media. Within a few weeks, each of the YouTube videos had been sought out and viewed an estimated 12,000 to 15,000 times, with approximately 2,000 Facebook users signing on as fans of the Sienna.

In these and similar cases, social-networking site (SNS) users not only embraced advertising-related

content but actively promoted it. Yet, according to one industry-sponsored study, only 22 percent of consumers had a positive attitude toward social media advertising—and 8 percent of consumers studied had abandoned an SNS because of what they perceived as excessive advertising (AdReaction, 2010). For example, although much of the decline in MySpace usage has been due to users' abandonment of the site in favor of the "next big thing" (i.e., Facebook), many users have suggested that the propensity of unwanted and unsolicited advertising messages contributed significantly to MySpace's woes (Vara, 2006).

These concerns suggest a delicate balancing act for social-networking advertising (SNA). On one hand, advertising provides revenue that enables sites to survive (or, in some instances, to thrive). On the other hand, overt and/or excessive commercialization in the form of advertising can dilute the appeal of SNSs. Thus, the key to successfully integrating advertising into SNSs is consumer acceptance (i.e., positive attitudes toward SNA). Consumers appear to be willing to accept SNA, but sites that do not manage advertising carefully may be perceived as being "populated by pseudo-users who [are] little more than paid corporate shells" (Clemons et al., 2007, p. 275).

To help disentangle the paradox, this study develops and tests a model addressing consumer

acceptance of SNA. Specifically, this study aims to address gaps in current understanding of the facilitators of—and barriers to—consumer acceptance of SNA. The primary research objectives addressed in this study were to identify the following:

- What factors facilitate—or function to stimulate—positive consumer attitudes toward SNA? What is the relative importance of these factors?
- What factors inhibit—or function to impede—positive consumer attitudes toward SNA? What is the relative importance of these factors?
- With respect to the factors observed to facilitate or inhibit positive attitudes toward SNA, does an interaction exist between them and demographic factors such as gender or age?

As more advertisers integrate SNA into their promotional mix, the need for these questions to be answered becomes apparent. Particularly with members of the 18- to 34-year-old demographic, whose digital-video recorder usage and aversion to print media make them an increasingly elusive target, SNA can be a highly effective channel of engagement.

Advertisers need to understand more about how to effectively introduce commercial appeals into an SNS realm that many consumers may view as their own public—yet still private—social spaces. This represents a distinct and unique environment for several reasons. With traditional media such as television, radio, and print, consumers perceive an implicit social contract with advertisers. The contract is simple: in exchange for advertising, consumers receive free (or reduced-cost) programming or editorial content (Gordon and Lima-Turner, 1997). The culture of the Internet, however, has evolved such that consumers do not perceive such a contract in cyberspace but instead consider

advertising to be intrusive and annoying diversions (Matthews, 2000; Gaffney, 2001) that interrupt the flow of online activities (Retie, 2001). These views may be even more pervasive in the context of SNSs. Studies suggest that heavy Internet users—such as those who participate in SNSs—are more likely to perceive online advertising negatively (Yang, 2003). Also, Internet users who actively contribute content—as opposed to those who merely consume content—view online advertisements more negatively (Schlosser, Shavitt, and Kanfer, 1999).

In this study, the authors examine factors that may influence consumer attitudes as advertising “intrudes” into their social spaces. Clearly, marketers do not want to alienate SNS users and, in the process, damage their branding or positioning images. Just as clearly, however, marketers need to advertise through social media because that is where they will find more and more consumers.

This study yields insights regarding how advertisers can best manage this delicate balancing act.

#### CONCEPTUALIZING SNS AND SNA

The broad range of Internet media that comprise SNSs—sometimes referred to as “social media”—come in various shapes and forms, but they share certain commonalities. An SNS allows users:

- to construct a profile within a bounded system,
- to maintain lists of other users with whom they share connections, and
- to view and browse their lists of connections and those of others (Boyd and Ellison, 2008).

The exact mechanisms vary by site. Facebook and MySpace, for example, both allow users to create profiles and connect with “friends”—those with whom they

have chosen to share profiles—whereas the LinkedIn site for professional networking uses the term *connections* to describe those within users’ networks.

All of these connections are bi-directional, but some sites (Facebook, for instance) also allow users to form unidirectional connections as “fans” or “followers.” For example, a company may create a fan page on Facebook, and users will enlist as “fans.” The advantages of such one-way relationships are two-fold:

- Although users are limited in the number of friends they may enroll, the number of fans essentially is unlimited, allowing companies or brands to enlist thousands of fans.
- Users who “fan” a company or brand may want to follow it without granting the firm access to their profile.

YouTube’s paradigm allows users to post videos that may be viewed either by unregistered viewers or by subscribers. Rather than fan pages, YouTube users establish “channels” for videos to which other users can subscribe. Similarly, through the Twitter “micro-blogging” site, “followers of a user receive short text updates, or “tweets,” from the user.

#### SNA AS A DISTINCT FORM OF ADVERTISING

Thus, SNA differs not only in form and substance but delivery method. Some are “pushed” upon consumers; others rely on consumers to “pull” content. Some (e.g., banner advertisements and videos) merely are adaptations of traditional media to the Internet, whereas others, (e.g., fan pages and “tweets”) have no parallel in the offline world. Some advertisements generate revenue for operators of SNS, whereas others are merely non-paid content delivered through social media. As conceptualized for this study, however, SNA is a general

term capturing all forms of advertising—whether explicit (e.g., banner advertising and commercial videos) or implicit (e.g., fan pages or firm-related “tweets”)—that are delivered through SNSs. As such, the attitudinal scale used in this study integrated multiple forms of SNA into a single measurement.

Because the current study concerns generalized attitudes toward the concept of commercial content in SNSs—rather than specific attitudes toward types of ads—it was not deemed necessary to differentiate between them. And, as it turns out, the generalized attitudes toward SNA are consistent across the various types of commercial content delivered through SNSs.

For advertisers, SNA still represents a new, rapidly growing, substantively important, and largely unexplored frontier. In 2009, Facebook and Twitter both posted triple-digit growth in the number of users (comScore, 2010). Users appear to be spending more time on SNSs as well, growing from an average of 3 hours per week in December 2008 to more than 5.5 hours in December 2010 (Nielsenwire, 2010). To tap this growing market, advertisers spent an estimated \$1.2 billion on SNA in 2009, with totals for 2010 expected to grow by more than 7 percent (Williamson, 2009). During a single month in 2009, SNA accounted for nearly 69 billion advertising impressions, with 129.6 million unique users (comScore, 2009). For the operators of SNSs themselves, SNA represents the bulk, if not the entirety, of their revenue stream. A few sites are fee-based; for example, family-oriented Family.com eschewed advertising in favor of a subscription fee (Crow, 2007). Most sites, however, depend on advertising as their primary source of revenue (Enders et al., 2008).

Consumer acceptance is critically important for both SNS advertisers and SNS providers. When an SNS is perceived as being

overly commercialized or infested with commercial spam, it risks negative consequences. This is viewed as an important cause of MySpace’s decline from its prior peak of 75 million U.S. users to fewer than 57 million in February 2010—a serious lag behind Facebook and Twitter (Johnson, 2010).

Facebook has not been immune to user criticism about advertising. Particularly contentious is the company’s “self-service” advertising capability that allows smaller advertisers to create advertising inexpensively and to target users based on such demographic and psychographic variables as location, age, gender, contextual keywords, education, or relationship status/interest. Used properly, such advertisements can be effective. As Stone wrote in *The New York Times*, however, “When it doesn’t work, it’s not only creepy but off-putting” (Stone, 2010), as consumers often wonder how the advertiser learned things about them. Indeed, a survey by media firm Dynamic Logic concluded that some 13 percent of consumers who said they had abandoned an SNS did so because of concerns about privacy (AdReaction, 2010).

#### THEORETICAL FOUNDATION

Researchers have argued that to understand how Internet users respond to advertising, it is necessary to understand their motivations for going online (Rodgers and Thorson, 2000). Similarly, any study of SNS users’ attitudes toward advertising must take into account their motivations for engaging in social networking.

According to extant studies of Internet users (e.g., Stafford, 2008; Stafford and Stafford, 2000; Stafford, Stafford and Schkade, 2004), motives for going online include structural factors (i.e., killing or filling time), content factors (i.e., information or entertainment value), and socialization factors (i.e., to connect with others).

SNSs are, by definition, highly oriented toward the latter; they are online forums in which users with common interests or connections “can gather to share thoughts, comments, and opinions” (Weber, 2009). In addition to communication and collaboration, however, SNSs also facilitate education and information (Safko and Brake, 2009), thus satisfying content-related motives. Furthermore, the popular press is rife with accounts of time wasting on Facebook (e.g., Di Cuffia, 2009; Flavelle, 2007), and the amount of time spent on SNSs has been steadily increasing (Nielsenwire, 2010). Hence, there very likely is a strong structural component to SNS usage.

These motivations are highly consistent with media uses and gratifications theory (Katz and Foulkes, 1962). This theory posits that media users are motivated to expose themselves selectively to media based on their needs and gratification-seeking motives. According to media uses and gratifications theory, consumers actively seek out media to satisfy either utilitarian or hedonic needs. For example, they may watch television to be entertained by a film or to be informed by a documentary or newscast. Lull (1980) further categorized these hedonic and utilitarian motives into structural dimensions (i.e., using media to fill empty surroundings by seeking information or entertainment) and relationship-based dimensions (i.e., using media to facilitate interpersonal relationships or communications).

Although developed to explain television viewership, media uses and gratification theory has been applied to studies of Internet usage (Eighmey, 1997; Eighmey and McCord, 1998; Stafford, 2008; Stafford et al., 2004); online advertising (Rodgers and Thorson, 2000); membership in virtual communities (Dholakia, Bagozzi, and Pearo, 2004); mobile advertising (Peters, Amato, and Hollenbeck, 2007); and the usage of SNSs (Joinson, 2008).

Given the previously mentioned motivations for SNS usage, media uses and gratification theory seems appropriate for the context of this study. Not only do SNS users sometimes actively seek out advertising content, they often participate in the dissemination of the advertising to other consumers.

The authors also evaluated the technology acceptance model (TAM) as an alternative theoretical framework that might support the constructs of interest in this study. TAM is one of the more widely used theoretical foundations in Internet behavioral research (Taylor and Strutton, 2010), but it was not applied to this study for two reasons. First, this study was not designed to investigate consumer acceptance, as TAM does, but rather consumer attitudes. Second, TAM examines only the influence of utilitarian factors (i.e., use and usefulness) on acceptance of new technology. This study examines the motivating influence of hedonic and utilitarian factors on consumer attitudes toward SNA. TAM does not consider the possible motivating influence of hedonic factors; whereas media uses and gratification theory does. Thus, the latter theory offers a superior theoretical fit for these research objectives.

A number of studies measure effectiveness of online banner advertising (e.g., Burns and Lutz, 2006; Fourquet-Courbet, Courbet, and Vanhuele, 2007; Geissler, Zinkhan, and Watson, 2006; Huang and Lin, 2006; Yaveroglu and Donthu, 2008) and consumer acceptance of online advertisements (e.g., Brackett and Carr, 2001; Rodgers and Chen, 2002; Schlosser et al., 1999; Yang, 2003). These studies, however, were conducted in the context of more traditional Web sites in which provider content is delivered to users along with third-party advertising. Advertising through SNSs, however, warrants studies specific to this medium for several reasons. First, the explosive growth of SNS

usage—along with the resulting growth in advertising dollars spent on SNA—warrants a stand-alone study of consumer attitudes. Second, SNSs have their own unique user-to-user ecosystem (Safko and Brake, 2009); thus, relying on studies from other Internet environments may prove insufficient. Third, though traditional Web site advertising is most frequently delivered through banners or sponsored links, SNA is often indistinguishable from user content. For example, MySpace company pages and Facebook fan sites are largely indistinguishable from user profiles, and Twitter “tweets” are identical to non-commercial messages.

#### **CONCEPTUAL RATIONALE AND HYPOTHESES**

To understand the factors that influence attitude toward SNA, it is necessary to examine the factors that affect attitudes toward advertising in general. Although the attitude toward a specific advertisement may be influenced by factors such as credibility, ad perceptions, preexisting attitudes toward the sponsor, and the recipient’s mood (Lutz, 1985), attitudes toward advertising in general are more complex. One study suggests that attitudes toward advertising in general are composed of two dimensions—instrument and institution (Sandage and Leckenby, 1980). The “instrument” refers to the consumer’s evaluation of individual advertisers’ methods; “institution” refers to the social and economic impact of advertising as a whole.

In the context of Internet advertising, a third dimension—“function”—may encompass hedonic motives, social role and image, and product information (Handel, Cowley, and Page, 2007). Implicit in each of these conceptualizations is an internal cost/benefit analysis on the part of the consumer. If the perceived benefit of the advertising exceeds the perceived cost,

the attitude toward advertising will be positive. Conversely, if the consumer perceives that the costs exceed the economic and social benefits of the advertising, the attitude will be negative.

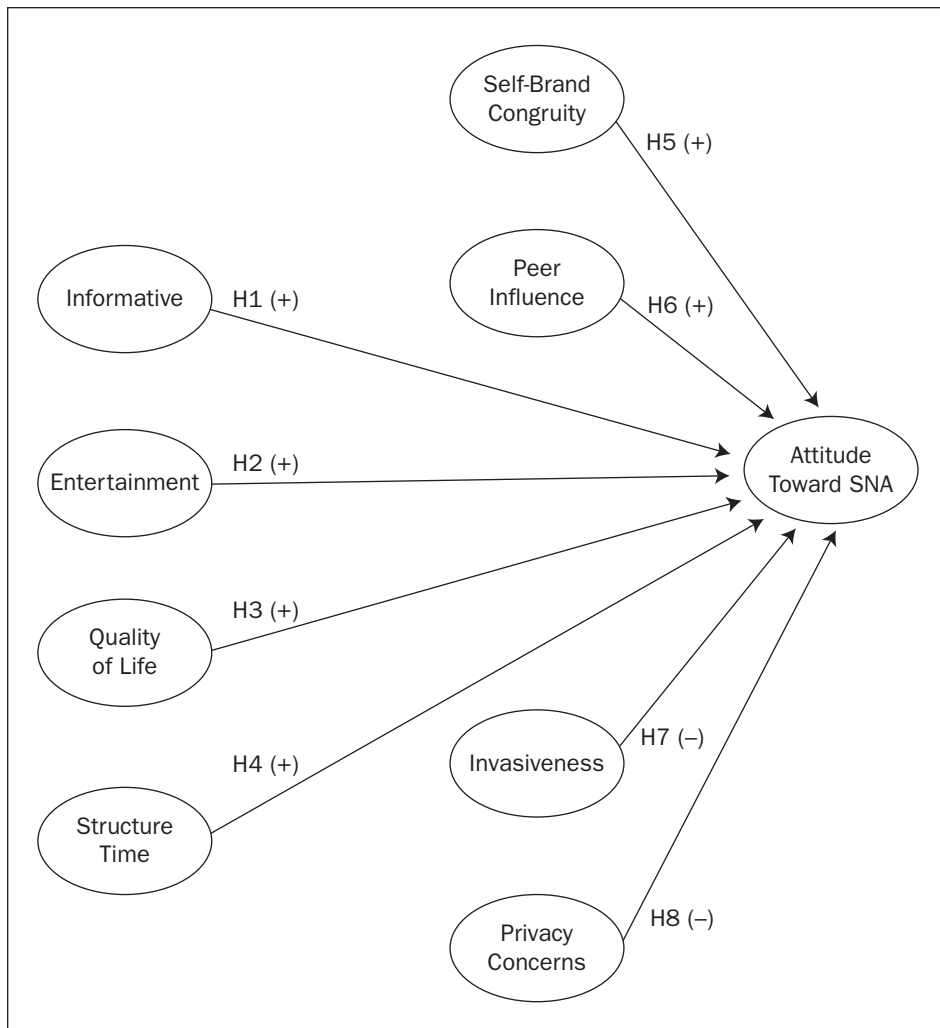
For a model of attitudes toward SNA, the benefits may be conceptualized as being derived from the uses and gratifications a consumer derives from SNSs (Katz and Foulkes, 1962). These uses and benefits are categorized as content-related, structural, and/or social. Content-related benefits include information and entertainment; structural uses relate to filling and structuring time; and social benefits are derived from the self-enhancing value of advertising and the peer-influenced socialization factor.

In the SNS environment, the costs of advertising (i.e., barriers to acceptance of SNA) are identified as the perceived invasiveness of the advertisements and users’ loss of privacy concerns. The conceptual model of these usage motivations influences acceptance of SNA, as does the perceived costs that serve as barriers to SNA acceptance (See Figure 1). Each construct is discussed individually in detail in the following sections.

#### **Advertising Content: Perceived Informativeness and Entertainment Values**

Two content-driven characteristics of advertising messages—perceived informativeness and perceived entertainment—have been identified as determinant influences on consumers’ attitudes toward advertising (Gao and Koufaris, 2006). Some have argued that the chief legitimizing function of advertising is its informative content (i.e., ability to inform users about product alternatives that enable them to make choices yielding the highest value; Rotzoll, Haefner, and Sandage, 1990). Advertising’s capacity to supply functional information may





**Figure 1** Hypothesized Model

be the primary reason for consumers’ approval of it (Bauer and Greyser, 1968). And the capacity of advertising to present more accurate portrayals of products may drive consumer perceptions of its value (Andrews, 1989).

The manner in which consumers evaluate their experiences with advertising—apart from any practical value they derive from its functional content—may constitute another source of advertising value. Research grounded in uses and gratification theory has shown that one value of advertising derives from its content’s ability to satisfy basic consumer needs for diversion, entertainment,

escapism, enjoyment, and emotional release (McQuail, 1983). In an SNS context, the salience of such user needs likely is highly pronounced. Many users enter such sites precisely in pursuit of information or entertainment (AdReaction, 2010). Based on this rationale, two hypotheses are tested:

- H1: Perceived informativeness is positively related to attitude toward SNA.
- H2: Perceived entertainment is positively related to attitude toward SNA.

**Structure: Quality of Life and Structuring Time Values**

One study observed that users of mobile communication devices derived entertainment value from technology usage and browsing, aside from any entertainment value associated with advertising content (Peters et al., 2007). The authors further proposed that this observation was consistent with previously documented behaviors associated with the use of television or Internet browsing to fill time or to “distract” oneself (Lull, 1980; Stafford et al., 2004).

The current study proposes that a similar relationship may prevail with respect to SNSs—that engaging in social-networking activities may be perceived as a means to improve one’s quality of life by purposefully distracting oneself from life’s ongoing challenges. Apart from any value derived from actual content or any communication activities, many consumers may browse SNSs to relieve stress or to enhance relaxation, thus improving quality of life. In such situations, SNA may offer welcome distractions. This could facilitate more positive attitudes toward SNA.

The opportunity to structure time may function as a related motivation to use SNSs. Although consumers may use an SNS to relieve boredom or to occupy themselves between tasks, they also often use sites as part of their daily routine. Among SNS users, 60 percent of teenagers, 67 percent of adults 21 and younger, and 42 percent of adults 22 and older report using SNSs one or more times a day (Li, 2007). This “process motivation” compels users to log into their accounts, for example, in the mornings as part of a structured routine before leaving for work or school, just before leaving for lunch, or after they return home in the afternoon (Peters et al., 2007).

Such ritualized usage may increase the likelihood that consumers view SNA

favorably because it becomes a time-structured and temporally triggered part of their interactions with SNSs. Under such conditions, ritualized exposure to (and comparatively mindless consumption of) any SNA may be implicitly viewed by users as beneficial insofar as the SNA itself may provide an additional welcome diversion and another form of structuring time. The preceding discussion suggests the following hypotheses:

- H3: Perceived value of online social networks as a means to enhance quality of life is positively related to attitude toward SNA.
- H4: Perceived value of online social networks as a means to structure time is positively related to attitude toward SNA.

#### **Socialization Factors: Self-congruity and Peer Influence Values**

The manner in which consumers express themselves through their actions gives meaning to their self-identities (Stryker, 1968). The manner in which consumers express themselves in their responses to advertising or branding messages likewise can be transferred to meanings for self (Wojnicki and Godes, 2008). When consumers perceive their self-identity may be reflected in how a brand is presented or positioned (i.e., as self-brand congruity increases), the likelihood that users will reference themselves in and derive meaning from brand presentations increases (Hennig-Thurau, Gwinner, Walsh, and Gremler, 2004).

Self-brand congruity can be conceptualized as the match between a brand's value-expressive attributes (e.g., product/user images) and the consumer or user's image of self (Sirgy, 1985). In other words, consumers frequently compare imagery that has been associated with a brand with

images they hold about themselves. The greater the congruity, the more positive the consumer's attitude toward the brand in question (Escalas and Bettman, 2005). When self-brand congruity exists, self-enhancement also appears more likely.

SNA also may enhance the maintenance or enrichment of interpersonal relationships (Peters et al., 2007). Active media, such as SNSs, appear more likely than more passive media to promote interpersonal relationships. SNSs, in fact, are designed and promoted with such purposes in mind. SNS users' sharing of SNA with other likely receptive recipients facilitates dialogue and other actions that bring SNS individuals and groups closer together. SNA information that is exchanged may become sources of conversational, deliberative, humorous, and otherwise memorable communication exchanges. Such exchanges may unfold on a one-to-one, one-to-many or, eventually, many-to-many basis. These communication outcomes should bring people closer together and, in the process, may generate gratification, strengthen key primary reference group affiliations, and enhance attitudes toward SNA. The discussion above suggests the following hypotheses:

- H5: Self-brand congruity is related positively to attitude toward SNA.
- H6: Peer influence is related positively to attitude toward SNA.

#### **Barriers: Perceived Invasiveness and Privacy Concerns as Negating Values**

In the SNS context, "privacy concerns" refer to consumers' desire to control the acquisition and subsequent use of information about them that is generated or acquired through online behaviors (Castañeda and Montoro, 2007). Not only can data about consumers be collected

during purchase or other transactions; information also can be gathered by simply monitoring online activity (Mascarenhas, Kesavan, and Bernacchi, 2003). Consumers have little to no control over the collection, storage, or use of such information (Sackmann, Strucker, and Accorsi, 2006). Often, in fact, many are not even aware that Web sites are collecting and analyzing such data (Milne, 2000).

"Privacy concerns" also are defined here as SNS users' feeling of apprehension about their loss of privacy due to the collection of information by SNS providers and/or SNS advertisers. For SNS participants, privacy concerns may be salient with respect to targeted advertising. Not only are advertisements targeted according to previous browsing habits but, for many sites, the content that consumers share on their profiles can be used for targeting purposes. One privacy advocate warns of "an incredibly sophisticated, ever advancing system for profiling online users" (Tessler, 2009) of SNSs such as Facebook and MySpace that capture detailed personal information. When SNS users link privacy concerns with viewing SNS ads, they likely will have a negative inclination toward SNA acceptance.

A related barrier is the level of invasiveness perceived by consumers. An advertisement may be perceived as being invasive when it intrudes on, distracts, or irritates consumers by interfering with their goal-directed behaviors (Li, Edwards, and Lee, 2002). This type of intrusiveness is well documented as a source of irritation and negative attitudes about advertising (Bauer and Greyser, 1968). Because online behavior—including the use of SNSs—is highly goal-directed, advertising may be perceived as being even more irritating in this context (Reed, 1999). Accordingly, when consumers perceive SNA as being intrusive, it may generate

negative attitudes toward the medium. The discussion above suggests the following hypotheses:

- H7: Perceived invasiveness of SNA is related negatively to attitudes toward SNA.
- H8: User perceptions of privacy concern are related negatively to attitudes toward SNA.

**Moderator: Gender Differences among Determinants of SNA**

Men and women generally appear to process advertising differently (Darley and Smith, 1995). So, it is reasonable to suggest differences may exist among the genders in determinants of attitude toward SNA. In addition, previous studies (e.g., Schlosser et al., 1999; Sheehan, 1999; Weiser, 2000; Wolin and Korgaonkar, 2003) suggest motivations for Internet use—and resultant attitudes and behaviors—are different for males and females, reinforcing the notion of SNA attitudinal differences.

Males are more likely to use the Internet for entertainment, leisure, and functional purposes, whereas females are more likely to use the Internet to facilitate communication and interaction (Weiser, 2000). This suggests, with regard to attitude toward SNA, that perceived informativeness and entertainment value of advertising have stronger effects on men’s attitudes than women’s, as do the functional motivations of time structuring and quality of life.

Conversely, two of the socialization factors—peer influence and self-brand congruity—appear to exert a stronger influence on attitude toward SNA for men than they do on women.

Additionally, prior studies suggest a moderating role of gender for perceptions related to privacy concern and invasiveness. Not only do men and women appear to differ in levels of online privacy

concerns but their resultant attitudes and behaviors differ as well (Sheehan, 1999). Although women are found to be more concerned about perceived invasion of privacy, men are more likely to alter their marketing-related attitudes and behaviors when they perceive privacy threats. Thus, it is expected that the influence of privacy concern on SNA will be stronger for men than for women. Women generally appear to have stronger attitudes related to invasiveness (e.g., offensiveness, deceptiveness, and annoyance) of advertising (Wolin and Korgaonkar, 2003), however, suggesting that women’s attitude toward SNA will be more affected by perceived invasiveness. The preceding discussion suggests the following hypotheses:

- H9: The effects of (1) informativeness, (2) entertainment, (3) quality of life, (4) structuring time, and (5) privacy concern on attitude toward SNA are stronger for males than for females.
- H10: The effects of (1) self-brand congruity, (2) peer influence, and (3) invasiveness on attitude toward SNA are stronger for females than for males.

**METHODOLOGY**

**Sample Selection and Data Collection**

The sample frame consisted of residents of a major metropolitan area in the southwestern United States. Potential respondents were identified through the joint efforts of instructors and students in two distinct marketing research classes taught at the largest comprehensive university in the area. Most of these students worked and lived off campus and commuted to campus for their classes. As such, these students had access to a variety of groups, including pre-college (i.e., high school), students, college students, and older

individuals who were no longer in school (See Table 1 for sample related demographics). It was hoped that the process of identifying respondents through student contacts would result in a sufficiently large and varied sample.

Each student was asked to provide contact information for 20 to 30 individuals and encouraged to include individuals from a range of age groups (e.g., high school, college, and post-college). These individuals then were contacted and pre-screened by being asked the following question: “Are you familiar with

**TABLE 1**  
Sample Demographics

<b>Gender</b>	
Male	49.0%
Female	51.0%
<b>Age (years)</b>	
15–17	20.6%
18–22	36.4%
23–29	29.1%
30–40	8.8%
41+	5.1%
<b>SNS Usage (hours per week)</b>	
0–6	59.7%
7–12	24.0%
13–18	7.0%
19–24	4.9%
25–30	2.7%
31+	1.6%
<b>Participation in SNS (months)</b>	
0–12	25.9%
13–24	33.3%
25–36	19.3%
37–48	12.9%
49–60	5.3%
61+	3.3%

social-networking sites?" Individuals who answered "no" were thanked and removed from the respondent list. Individuals who answered "yes" were provided with the study questionnaire (discussed shortly) and asked to complete the questionnaire over a 2-week period and return it to their respective contact individual. It is of some importance to note that the data collection effort was part of a semester-long research project and the students were involved at each stage of the research process; thus, they felt a great sense of ownership of the project and data. There were no extra points for identification of respondents and no penalty for not meeting the respondent quota agreed upon by the classes.

Once the data were collected, the lead researchers screened the information for miscoded and suspicious-looking data entries. The total effort yielded a usable sample size of 2,642 survey questionnaires. The average age of respondents was 23.5 years, with 20.6 percent at 15 to 17; 36.4 percent at 18 to 22; 29.1 percent at 23 to 29; and 13.9 percent 30+. Forty-nine percent of respondents were male, and 51 percent were female. Respondents indicated they have participated on SNS sites for about 27 months (on average); and, at the time of the study, spent an average of 7.5 hours per week on SNS activities (See Table 1).

In addition to collecting these demographic data, respondents were asked two questions to assess more accurately their ability to provide meaningful information. The first question was, "How would you characterize your general computer skills?" On a Likert-type scale where 1 = Very Weak and 5 = Very Strong, the mean response was 4.02, with only 4.6 percent indicating weak (2) and 1.2 percent indicating very weak (1).

The second assessment question asked, "How would you characterize your

general knowledge of SNSs?" On the same scale, the mean response was 3.75, with 7.2 percent indicating weak and 2.3 percent indicating very weak.

Though eliminating these less-well-informed respondents represented a defensible option, they were retained for two reasons. First, it is statistically desirable to analyze samples featuring varying levels of usage and knowledge, as findings should be more generalizable to the population the sample represents. Second, it is practically desirable to retain less-well-informed consumers because their attitudes still matter to advertisers. SNS providers should expect some percentage of users and visitors will consider themselves either weak or very weak with respect to either their "general computer skills" and/or their "general knowledge of SNS."

### Measures and Measurement Validation Procedure

With the exception of the items used to measure the endogenous construct "attitude toward SNA," all constructs were measured with items adopted/adapted from scales previously used in the extant literature. To measure SNA in the most general terms possible, no specific SNSs were identified unless it was necessary to describe a specific type of content (e.g., YouTube videos or Twitter tweets). Each item is measured on a five-point Likert-type scale where 1 = Strongly Disagree and 5 = Strongly Agree. Specifics regarding the items used to measure the constructs in this study are listed in the Appendix.

All construct-related items were included in an exploratory factor analysis. This analysis produced nine dominant factors. Each factor aligned well with the constructs of interest. Items that did not load effectively on one of the nine dominant factors were examined and eliminated.

Prior to deletion, questionable items were compared with the conceptual definition of its associated construct. The deletion of an item never substantively changed the domain of the construct as originally conceptualized. Then, each set of remaining items was examined by calculating item-to-total correlations and Cronbach alphas. This analysis suggested no further need for additional item deletions.

Finally, all remaining items were analyzed via confirmatory factor analysis using LISREL 8.54 to verify unidimensionality. The following fit statistics indicated a good fit for the measurement model: chi-square = 5131.91  $df = 629$ ; IFI = 0.98, TLI = 0.97, CFI = 0.98, RMSEA = 0.05, SRMR = 0.04 (Hu and Bentler, 1999). It is important to note that although the reported chi-square to degrees of freedom ( $df$ ) ratio was substantially higher than that recommended by some scholars (e.g., Carmines and McIver, 1981), this was a direct result of the large sample size used in this study ( $n = 2,642$ ).

When the same model was estimated with more moderate-sized sub-samples (i.e., 200, 500), the ratio fell in line with the recommended  $<3$ . Moreover, as other scholars have suggested, "... there is no consistent standard for what is considered an acceptable model chi-square to  $df$  ratio" (Kenny, 2010, p. 1), whereas "... fit indexes [themselves] were designed to avoid some of the problems of sample size and distributional misspecification associated with the conventional overall test of fit (the  $\chi^2$  statistic) in the evaluation of a model" (Hu and Bentler, 1999).

Nomological validity was assessed by examining the Pearson correlation between each pair of constructs to verify that the relationships were consistent with extant theory and prior work found in the literature. All theoretically suggested correlations were significant (See Table 2), and in the expected direction. Thus,



**TABLE 2**

## Summary Statistics and Correlations among Study Variables

Study Variables	1	2	3	4	5	6	7	8	9
1. Informativeness	(0.87)								
2. Entertainment	0.58*	(0.89)							
3. Self-Brand Congruity	0.54*	0.50*	(0.90)						
4. Peer Influence	0.32*	0.26*	0.32*	(0.88)					
5. Invasiveness	-0.12*	-0.21*	-0.07*	0.04	(0.92)				
6. Privacy Concerns	-0.33*	-0.34*	-0.34*	-0.38*	0.06*	(0.89)			
7. Quality of Life	0.36*	0.30*	0.41*	0.61*	0.00	-0.42*	(0.85)		
8. Structure Time	0.39*	0.36*	0.45*	0.53*	-0.00	-0.43*	0.68*	(0.86)	
9. Attitude Toward SNS Ads	0.53*	0.66*	0.47*	0.33*	-0.18*	-0.36*	0.34*	0.37*	(0.86)
Mean	2.58	2.45	2.33	3.48	3.34	3.58	3.00	2.69	2.59
Standard Deviation	1.00	0.99	0.96	0.88	1.03	1.08	1.05	0.99	0.93

\* $p < 0.01$ .

Cronbach alpha coefficients are listed within parentheses on the diagonal

nomological validity is indicated (Hair, Black, Babin, Anderson, and Tatham, 2006).

Convergent validity first was assessed by examining the completely standardized factor loadings of each observed variable on its designated construct (LISREL 8.54). All loadings were statistically significant ( $t$ -values ranged from 34.71 to 56.73) and exceeded the recommended 0.50 minimum loading (Anderson and Gerbing, 1988). Convergent validity also was assessed by calculating composite reliabilities and average variance extracted (AVE) for each construct using methods suggested by Fornell and Larcker (1981). Composite reliabilities ranged from 0.86 to 0.91 and AVEs ranged from 0.54 to 0.73, all above recommended levels (Fornell and Larcker).

Discriminant validity was assessed using two methods. First, a series of two-factor confirmatory models was estimated. For each pair, the model was estimated by restricting factor

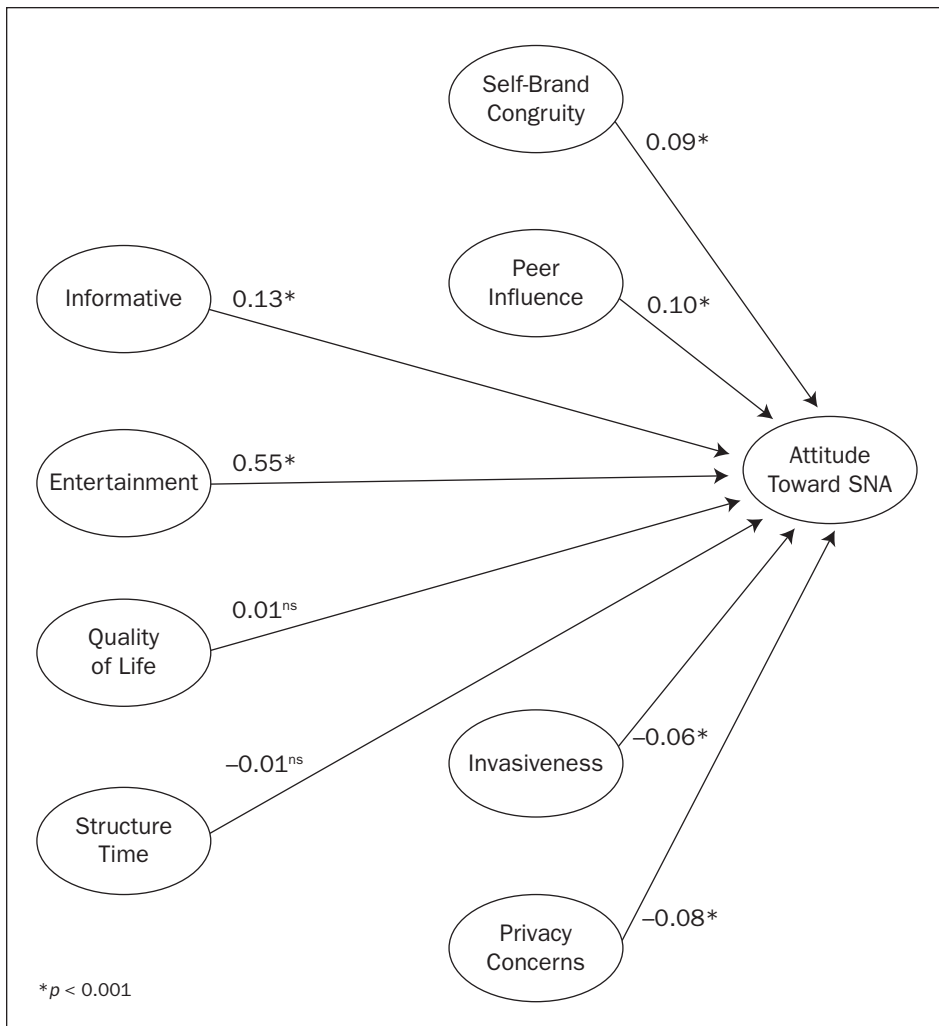
intercorrelations to unity. Then the model was estimated again with the restriction removed. In each case, the chi-square difference tests (1  $df$ ) were significantly smaller in the unrestricted model demonstrating discriminant validity (Anderson and Gerbing, 1988; Bagozzi and Phillips, 1982). Second, the square of the correlation between each pair of constructs was compared to the AVE for each associated construct (Fornell and Larcker, 1981). Among the constructs included in this study, the largest squared correlation equaled 0.46, whereas the smallest AVE equaled 0.54. In sum, in each case, the individual AVE estimates were greater than the individual squared correlation estimates, further demonstrating discriminant validity (Hair et al., 2006).

Last, the data in this study represented the self-reported perceptions of respondents. As with all self-report data, there was the potential for common method bias. Therefore, prior to testing the proposed hypotheses, a common method

factor (CMF) model was tested following Podsakoff et al. (2003; pp. 895–897, model 3A). The CMF model included the eight modeled exogenous constructs plus an additional “same source” first-order factor construct as a ninth predictor of attitude toward SNA. The results from the CMF model were then compared to the results from the same model with the “same source” factor excluded. The findings of this test indicated no significant differences (standardized parameter estimates, related statistical significance) between the CMF model and the model with the CMF excluded—suggesting the relationships to be tested in this study would not be affected substantively by common method bias.

**RESULTS**

Descriptive statistics, correlations, and Cronbach alphas are presented in Table 2. Figure 2 provides the standardized path coefficients and associated significance levels of the structural model (LISREL 8.54).



**Figure 2** Path Estimates for Full Sample

The structural model provides a good overall fit to the study data: chi-square = 5251.377  $df = 629$ ; IFI = 0.97, TLI = 0.96, CFI = 0.97, RMSEA = 0.05, SRMR = 0.04.

Hypotheses 1 through 8 were evaluated by examining the path coefficients between each exogenous construct (i.e., informative, entertaining, and the like) and the endogenous construct (i.e., attitude toward SNA).

The first two hypotheses predicted SNS users' perceptions of SNS advertisements as being informative (H1) and entertaining (H2) and positively would influence their attitudes toward advertising appearing on these SNSs. The study findings

supported both of these hypotheses (0.13  $p < 0.001$  and 0.55  $p < 0.001$ , respectively; See Figure 2).

Hypothesis H3 posited that users' view of participating in SNSs as a way to enhance quality of life through increasing relaxation and reducing stress would be positively related to their attitude toward SNS ads. Hypothesis H4 proposed users' view of SNS participation as a way to structure time in their daily routine in a way that also would influence their attitudes positively toward SNS ads. Neither path estimate was statistically significant; thus, no support was found for either H3 or H4.

The third pair of hypotheses predicted that users' views of the brands advertised on SNSs as catering to and consistent with how they see themselves (H5: self-brand congruity) and their view of SNS participation as being exciting and socially desirable (H6: peer influence) would be positively related to SNS users' attitudes toward advertisements viewed on these sites. Both hypotheses were supported (0.09  $p < 0.001$  and 0.10  $p < 0.001$ , respectively). These results indicated that internal (self-congruity) and external (peer influence) stimuli each were important factors in facilitating greater attitudinal acceptance of advertisements designed to appear in the SNS context.

The final two hypotheses examined potential deterrents to SNS participants' attitudinal acceptance of SNA. Hypotheses H7 predicted users' perception of SNA as invasive (e.g., distracting, intrusive, irritating) would be negatively related to users' attitudes toward SNA. Hypothesis H8 predicted users' SNS privacy concerns (e.g., SNS providers keeping sensitive user information private and secure) also would be negatively related to users' attitudes toward SNA. Both hypotheses were supported ( $-0.06 p < 0.001$  and  $-0.08 p < 0.001$ , respectively). Although the path estimates for both invasiveness and privacy concerns were statistically significant, however, the strength of these two estimates indicated a somewhat weaker influence—as compared to, for example, entertainment, informativeness, and peer influence.

#### **Hypothesized Moderator Results: Gender**

To investigate possible moderator effects, the total sample was separated into two gender sub-samples (male  $n = 1,296$ ; female  $n = 1,346$ ). Then the model shown in Figure 1 was re-estimated individually for each gender sub-sample. Finally, the respective results were compared (See

**TABLE 3**  
Moderating Effects of Gender:  
SEM Path Coefficients

Endogenous Construct	Men Only	Women Only
H1 Informativeness	0.07 <sup>b</sup>	0.14 <sup>a</sup>
H2 Entertainment	0.45 <sup>a</sup>	0.53 <sup>a</sup>
H3 Quality of Life	-0.11 <sup>a</sup>	-0.07 <sup>c</sup>
H4 Structure Time	-0.10 <sup>b</sup>	0.06 <sup>c</sup>
H5 Self-Brand Congruity	0.09 <sup>a</sup>	0.10 <sup>a</sup>
H6 Peer Influence	0.52 <sup>a</sup>	0.12 <sup>a</sup>
H7 Invasiveness	-0.06 <sup>a</sup>	-0.06 <sup>b</sup>
H8 Privacy Concerns	-0.05 <sup>b</sup>	-0.04 <sup>c</sup>

<sup>a</sup>*p* < 0.01; <sup>b</sup>*p* < 0.05; <sup>c</sup>not significant

The fit indices for both gender models are above acceptable levels (Hu and Bentler, 1999)

Table 3). Hypothesis H9 predicted the effects of (1) informativeness, (2) entertainment, (3) quality of life, (4) structure time, and (5) privacy concerns on attitude toward SNA were stronger for males than for females.

No support was found for any of these five moderating relationships. Further, in four of five cases, results were opposite predictions. Specifically, study findings indicated that gender moderated the positive influence of both informativeness and entertainment on attitude toward SNA such that the positive relationships were stronger for women (0.14 and 0.53, respectively) as compared to men (0.07 and 0.45, respectively). In addition, findings indicated consumers (both men and women) who used SNSs as a way to improve quality of life had a negative attitude toward SNA and that negative relationship was stronger for men (-0.11) than for women (-0.07). Last, the use of SNS activities as a means of structuring time also had a negative influence on attitude toward SNA for men (-0.10), but

a positive influence on attitude toward SNA for women (0.06).

Hypothesis H10 predicted the effects of (1) self-brand congruity, (2) peer influence, and (3) invasiveness on attitude toward SNA are stronger for females. No support was found for H10 a–c. Findings indicated gender has no moderating influence on the relationships between self-brand congruity and invasiveness and attitude toward SNA. In fact, the results across genders were almost identical (0.09 | 0.10 and -0.06 | -0.06, respectively). In contrast, contrary to predictions, findings indicated the influence of peer influence on attitude toward SNA was significantly stronger for men (0.52) than for women (0.12).

In sum, the findings suggested that women found advertisements encountered on SNSs more informative and entertaining than did men. Men, however, found these advertisements informative and entertaining as well. Further, males—much more so than females—perceived the socially desirable aspect of SNS participation as being somehow linked to the advertisements they saw at these networking sites. In other words, the content of an ad appeared more likely to become a topic of conversation and/or ongoing interest between these men and their SNS counterparts. The practical implications for firms seeking to ignite viral advertising effects for SNA efforts launched in support of promotions targeted primarily at men are intriguing, but pending future research into this effect, this explanation and its associated implication, although plausible, must remain speculative.

#### Post Hoc Moderator Analysis: Age

First, as noted, the majority of respondents (86.1 percent) were younger than 30. Nevertheless, it seems reasonable to suspect results across high-school-age respondents, college-age respondents, and post-college-age respondents might differ.

Therefore, though no formal hypotheses were offered regarding any potential moderator influence of SNS users' age on the interrelationships among the constructs of interest in this study, it seems prudent to investigate whether such influences exist.

The authors, therefore, tested for these possible moderating influences (post hoc) within the context of the hypothesized model. The original 2,642 respondents were divided into three age-based subsamples: 15 to 18 years; 19 to 24 years; and 25 years and older. The decision to divide respondents into these age groups was based on the following rationale. First, allocating the total respondent pool into these groups provided a roughly equal number of individuals in each group (i.e., 853, 913, and 876, respectively). Second (and more important), these segments made a certain intuitive sense from a practical SNS perspective (i.e., high-school-age, college-age, or post-college-age individuals). Next, the hypothesized model was re-estimated separately using each of the three subsamples (See Table 4).

Surprisingly, only one difference across age groups emerged as noteworthy. For the age group 19 to 24 years, the influence of informativeness (e.g., SNS advertisements were a valuable source of up-to-date information) demonstrated a significant increase in strength (0.25) as compared to the other two age groups (0.09 and 0.06)—and to the gender groups (0.07 and 0.14). The path estimate was roughly two to four times stronger in this age group (19–24 years) as compared to all other groups. This suggests that respondents in this age group found SNS advertisements more informative than other cohorts. This inclination may have led this college-aged segment to hold more positive attitudes toward SNS advertisements appearing on these sites.

Notably, gender distributions across the three age groups were similar. This

**TABLE 4**  
Age As a Moderator: SEM Path Coefficients

Endogenous Construct Attitude Toward SNS Ads	Group 1 15–18	Group 2 19–24	Group 3 25+
H1 Informativeness	0.09 <sup>b</sup>	0.25 <sup>a</sup>	0.06 <sup>c</sup>
H2 Entertainment	0.58 <sup>a</sup>	0.50 <sup>a</sup>	0.56 <sup>a</sup>
H3 Quality of Life	–0.05 <sup>c</sup>	0.01 <sup>c</sup>	0.01 <sup>c</sup>
H4 Structure Time	0.02 <sup>c</sup>	–0.04 <sup>c</sup>	0.00 <sup>c</sup>
H5 Self-Brand Congruity	0.10 <sup>a</sup>	0.07 <sup>b</sup>	0.11 <sup>a</sup>
H6 Peer Influence	0.11 <sup>a</sup>	0.08 <sup>b</sup>	0.08 <sup>b</sup>
H7 Invasiveness	–0.08 <sup>a</sup>	–0.05 <sup>c</sup>	–0.07 <sup>b</sup>
H8 Privacy Concerns	–0.11 <sup>a</sup>	–0.04 <sup>c</sup>	–0.06 <sup>b</sup>

<sup>a</sup>  $p < 0.01$ ; <sup>b</sup>  $p < 0.05$ ; <sup>c</sup> not significant

The fit indices for all three models are above acceptable levels (Hu and Bentler, 1999)

Gender within age groups:

Group 1: 46.3 percent male and 53.7 percent female

Group 2: 48.4 percent male and 51.6 percent female

Group 3: 52.3 percent male and 47.7 percent female

suggests that any observed age group differences were not due to within-group gender bias (see footnote below Table 4).

## DISCUSSION AND IMPLICATIONS

This study yielded important new insights about a topic that interests both theoreticians and practitioners. Specifically, actionable insights into the identity and nature of factors that motivate consumers to ascribe positive attitudes toward SNA were generated. Insights into the identity and nature of factors that lead consumers to ascribe negative attitudes toward SNA also were revealed.

Advocates of media uses and gratification theory long have speculated that media content and socialization factors may impose determinant influences on users' attitudes toward—and ultimate acceptance of—various media such as television or cell-phone messaging. The current study revealed that media uses and gratification theory likely harbors substantial value in terms of its ability to explain heretofore unexamined user attitudes

toward advertising delivered through the still-emerging medium of SNA.

This study's findings suggested that, when SNA delivers content that is consistent with the motivations originally expressed in media uses and gratification theory, consumers were more likely to ascribe positive attitudes toward advertising conveyed to them through an SNS medium. Specifically, when SNA delivered content or impressions that provided entertainment or informational value or offered social value, consumers appeared more likely to respond favorably toward the ad stimuli themselves.

As has been shown true with respect to other types of media advertising, consumers apparently derived utility from SNS ad messages that provided information that addressed some functional or pressing user need and from the hedonic value that entertaining ad messages could deliver to the media's users. Similarly, when the SNS advertising's messaging style or content provided some sort of social capital, users' attitudes toward SNA appeared likely to

be more positive. These results suggested this "social capital" could be derived through SNA that reinforces SNS consumers' identity through the creation of self-brand congruence or through the creation of SNA content that closely conforms to the norms of peers or reference groups that focal users hold out as important.

Contrary to expectations, structural motivations failed to influence consumer attitudes toward SNA. The desire to improve quality of life or to provide structure to a user's Internet usage was not related to SNA attitudes. If one considers the more organic nature of advertising via social media, this observation makes sense at an intuitive level. Users may visit SNSs for structural purposes without considering SNA as separate from other SNS activities. For example, users frequently may sign into their Facebook pages to relax or relieve stress, but users' motivations are apparently unlikely to be specifically tied to improving quality of life by viewing advertising. Instead, users relax or de-stress by viewing a combination of noncommercial and commercial posts. Thus, the practical benefits that may accrue to advertisers who are sufficiently creative in their efforts to blur distinctions between commercial and noncommercial content become more evident.

Collectively, these results suggested that one prerequisite to more successful SNA execution would be for advertisers to create messages that provide some sort of explicit value to SNS users. And by a wide margin, the value that appeared most likely to be highly regarded by SNS users was entertainment, followed by informative value.

It is worth noting that "entertainment" exhibited almost four times more strength of influence on favorable consumer attitudes toward SNA than the second most influential predictor variable (i.e., "informative"). And when contrasted



**Advocates of media uses and gratification theory long have speculated that media content and socialization factors may impose determinant influences on users' attitudes toward—and ultimate acceptance of—various media such as television or cell-phone messaging.**

with the four remaining significant SNA characteristics—"peer influence"; "self-brand congruity"; "privacy concerns"; and "invasiveness" (listed in order of diminishing strength of influence)—"entertainment" imposed about five times greater influence on positive SNS user attitudes toward SNA.

Two clear managerial implications emerged: to increase the likelihood that SNS users will react with a favorable attitude, advertisers should make their advertisements more entertaining. Should entertaining messaging styles, however, be inappropriate—presumably owing either to the nature of products being promoted or perhaps the SNS itself—the next best messaging option available is to create more-informative ads.

From a practical advertising-positioning perspective, these results suggested that any value appeals embedded in SNA content should be aligned carefully with the interests and motivations of individual SNS users. Content that users of one SNS (say a sports-oriented site) find "entertaining" or "informative" might be viewed by a politically oriented site's membership as being in "poor taste" or "out of touch."

Experts need to understand how and why advertising content that users view as relevant in terms of its (1) ability to "impress (one's) peers"; (2) provide actionable (personal needs-based)

"information"; (3) enhance "self-image"; and/or (4) make one's day (entertainment-wise) is more likely to be accepted by individuals who are exposed to it. Not coincidentally, each of these advertising values was significantly and positively associated with favorable consumer attitudes toward SNA. Similarly, it is understood that when advertising content is not consistent with users' needs and motivations (i.e., irrelevant advertising), it will be evaluated less positively.

Therein lies a challenging paradox. The most common way for SNS advertisers to deliver relevant advertising is to target messages based either on demographic data collected as part of the user profile creation or through contextual keywords. However, user attitudes toward SNA are negatively impacted by the perceived intrusiveness of advertising or loss of privacy from ad-related data collection. In essence, this study suggested a thin line existed between relevant and "invasive" SNA content. The attitudinal receptivity of SNS users toward SNA targeted precisely toward their special needs or interests appeared likely to be high. When those same users perceived, however, that their privacy had been violated, they seemed likely to develop more negative attitudes toward the same ads. This implies that perhaps the best strategic approach toward driving receptivity of SNA among

those who currently have unfavorable SNA attitudes is for SNS management to ensure users that their privacy is not being violated and thereafter to adhere strictly to such standards.

Although the hypothesized moderating effects of gender were not supported, the results provided interesting insights. For instance, the directions of the relationships for structuring time and quality of life were the opposite of those originally hypothesized—negative, rather than positive. Yet, as predicted, those relationships were stronger for men than for women. In fact, though structuring time and quality of life exerted a significant negative influence on SNA for men, the relationship was not significant among women. Thus, the results suggested that men who use SNSs to fill time may have a less positive attitude toward advertising on the sites.

This insight yields interesting managerial implications for advertisers: if advertisers can somehow tap into structural motivations—for example, posting or updating new advertising content at a specific time each day—they may be able to reverse this relationship by meeting the male user's need to structure or fill time. This would be a less effective tactic for advertising that targets women, however, because their attitudes did not appear to be influenced one way or another by these structural motivations.

Other findings are not only interesting but appear to contradict previous research. For example, previous studies have found that men are more likely to be motivated to go online seeking entertainment or information. The current study suggested, however, these motivations had a stronger effect on women's attitude toward SNA—the exact opposite of the previous findings. Similarly, although extant research suggests differences in the ways men and women react to perceptions of invasiveness and concerns about

privacy, no such differences materialized in this study. These contradictions may be explained as either differences in the SNS environment and the Internet as a whole or it may be that the Internet user profile has evolved over the course of the last decade to a degree that previous research no longer is applicable.

Similarly, although no formal hypotheses addressed age-based differences, post hoc analyses suggested the attitudes of college-age SNS users toward SNA appeared to be more strongly influenced by perceived informativeness. This is an important theoretical contribution: to the knowledge of the researchers, this relationship has not been identified previously. For practitioners, this also represents an important and actionable insight. College-age SNS users may be more heavily swayed by informational advertising than their older counterparts. Thus, advertisers should consider using information-based appeals when targeting this demographic. For users younger or older than traditional college age, the perceived entertainment value of SNA appears more likely to be positively received.

**LIMITATIONS AND FUTURE RESEARCH**

Although the researchers took every available step to ensure methodological rigor, some caveats apply. First, the sample was constrained to the southwestern United States. The sample also was skewed toward younger respondents. Each condition may have limited generalizability. Second, despite the richness of the model that was tested, additional data or more sophisticated analysis involving additional contributory issues such as different types of SNA (given that various SNSs feature different advertising models) may reveal relationships not yet tested. Using this model as a foundation, this possibility should be investigated in future research projects

that investigate the attitudes of more generalizable samples.

The study pointed toward other interesting directions for future research. For example, what factors determine whether advertising is viewed as relevant and personalized as opposed to intrusive? In addition, the prospect that various social determinants may impact acceptance of SNA should be investigated. Does SNA enhance or reinforce self-image or aid consumers in their socialization? Do differences exist in how users respond to advertising’s “intrusion” into their social space according to the type of SNS format (i.e., sports-oriented site, political-oriented site, entertainment-oriented site) basis? Do different types of SNA invoke different attitudinal and behavioral responses among SNS users? Each question is relevant and interesting. More important, each question is practically significant to advertising creators and media planners and to marketing theorists.

The study of social media still is in an iterative stage. This study contributed its unique understanding of the relationships that were examined but, as would be expected (and, indeed, usually is actively desired), this study raised as many new questions as it answered.

These results clearly provide, however, a substantial contribution to the current understanding of the attitudes of younger SNS users toward advertising. Specifically:

- The study introduced a reasonably comprehensive model of the facilitating determinants and inhibiting barriers to acceptance of advertising among users of SNSs.
- This study addressed an academic gap and provided empirical support for applying media uses and gratification theory within the social-media environment.

- The study also offered specifically actionable managerial guidance for advertisers who seek to exploit the ever-increasing scope and reach of social media but seek to avoid, in the process, alienating the very customers and prospects they are targeting.
- In addition, this study identified several gender- and age-related differences that can be used by advertisers. **JAR**

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## APPENDIX

### Final Items Used in Testing and Analyses

*Informativeness*: Cronbach Alpha (0.87):  
Source: Ducoffe (1996) and Cheng et al. (2009)

1. SNS ads are a valuable source of product/service information.
2. SNS ads are a convenient source of product/service information.
3. SNS ads help keep me up to date.

*Entertainment*: Cronbach Alpha (0.89):  
Source: Lastovicka (1983)

1. SNS ads are fun to watch or read.
2. SNS ads are clever and quite entertaining.
3. SNS ads do not just sell—they also entertain me.
4. SNS ads are often amusing.

*Quality of Life*: Cronbach Alpha (0.85):  
Source: Huang et al. (2007)

1. Participating in a SNS improves the quality of my life.
2. Participating in a SNS can reduce stress after a difficult day.
3. Participating in a SNS is a way to enjoy myself or relax.

*Structure Time*: Cronbach Alpha (0.86):  
Source: Bond and Feather (1988)

1. I tend to participate in SNS sites around the same time of day.
2. My participation in SNS sites fits together in a structured way.

3. Participating in SNS fulfills a purpose in my life.
4. I have a daily routine that I follow with regard to participating in SNS.
5. Sometimes checking SNS sites is a way to "get going" with my day.

*Self-brand Congruity*: Cronbach Alpha (0.90): Source: Sirgy et al. (1997)

1. The brands advertised through SNS are consistent with how I see myself.
2. The brands advertised through SNS cater to people like me.
3. The brands advertised through SNS reflect who I am.
4. The typical customers of brands advertised through SNS are very much like me.

*Peer Influence*: Cronbach Alpha (0.88):  
Source: Roman and Cuestas (2008)

1. Participating in a SNS is exciting.
2. Participating in a SNS is cool.
3. Participating in a SNS is socially desirable.
4. I recommend participating in a SNS to others.
5. I encourage my friends to participate in a SNS.
6. I say positive things about SNS to others.

*Invasiveness*: Cronbach Alpha (0.92):  
Source: Li, Edwards, and Lee (2002)

1. I find ads shown on SNS distracting.
2. I find ads shown on SNS intrusive.
3. I find ads shown on SNS irritating.
4. I find ads shown on SNS invasive.
5. I find ads shown on SNS interfering.

*Privacy Concern* (all items reverse coded): Cronbach Alpha (0.89): Source: Wolfinbarger and Gilly (2003)

1. I feel secure in providing sensitive information to the SNS Web site.
2. I feel the SNS Web site will keep my personal details private.
3. I feel secure in posting personal information on my SNS pages.

*Attitude Toward SNS Ads*: Cronbach Alpha (0.86): Source: New scale

1. I like banner product and brand advertising on SNS profiles.
2. I like SNS profiles created by the sponsor company of the product or brand.
3. I like SNS profiles created by customer/fans of the product or brand.
4. I like YouTube videos created by the sponsor company of the product or brand.
5. I like YouTube videos created by customers/fans of the product or brand.
6. I like Twitter feeds for the product or brand.

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