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THE INFLUENCE OF AGE GENERATIONS ON SOCIAL NETWORK USAGE AND BEHAVIOUR

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ABSTRACT

The emergence of social networking has sparked a of lot interest in academia especially in the areas of privacy, attitude and usage behaviour. However, there appears to be limited knowledge on whether demographic differences and more specifically differences between different age generations impact the usage levels of social networks specifically in the South African market. The purpose of the study is therefore to examine the influence of different age generations on social network usage in the South African market. A convenience sampling approach was used to collect data from different consumer age groups that engage in social networking. A total of 1176 usable questionnaires were retained for data analysis. The results indicate that there is no difference between the age generations (Baby boomers, Gen X, Gen Y, Gen Z) with respect to their usage of social networks, but that significant differences were found between the age generations and their perceived ease of use, usefulness and intention to continue their usage of social networks. Marketers targeting consumers should acknowledge these differences and formulate their communication accordingly when targeting different age groups on social networks in South Africa.

INTRODUCTION

Social networks have become a worldwide phenomenon with the rapid movement into the digital age and a suggested 1.96 billion social network users in the world (Boyd and Ellison, 2008:210; Statista, 2015). Social networks have become such a significant part of people's daily lives that even those who do not like social networks occasionally visit them (Iordache and Lamanauskas, 2013:24). What is the attraction of using social networks? It has been determined that most users use social networks primarily to find and spread information, keep up with current events and to keep in touch with friends and family (Hughes, Rowe, Batey and Lee, 2012:564). Perceived ease of use, usefulness and intention to continue using the social network also determine how users behave on social networks (Rauniar, Rawski, Yang and Johnson, 2014:16).

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Given the increasing diversity of these social network users and the fact that the 50+ age generation is increasing their use of social networks, it has become pertinent to understand social network users' characteristics and its influence on social network usage and behaviour (Chakraborty, Vishik and Rao, 2013:948). Although some research has been conducted on the differences between age generations and their usage and behaviour on social networks, research on this specific topic in the South African market is limited (Hughes *et al*., 2015).

This study therefore seeks to address this gap by investigating the concepts of social network usage and behaviour between age generations in South Africa, thereby providing marketers with insights pertaining to different age groups' behaviours on social networks. The primary objective of the study is to determine whether age generations differ with regards to their social network usage and behaviour, as well as their sharing of personal information. The study is further supported by three secondary objectives.

The remainder of the paper is structured as follows: Firstly, an overview of the relevant literature on social networks and its usage is discussed, followed by social network behaviours between age generations. The relevance of the research is presented in the form of a problem statement, followed by the objectives and hypotheses for the study. The methodology and results are then presented. Lastly, the discussion and managerial implications are presented, as well as the limitations and directions for future research.

LITERATURE REVIEW

The literature review provides a description of social networks globally as well as in South Africa. It also focuses on current literature relating to social network usage defined in terms of information and social purposes as well as social network behaviours defined in terms of perceived ease of use, perceived usefulness and intention to continue using social networks. Differences between age generations with regards to social network usage and behaviour are also reviewed.

Social networks

Social networks are a group of applications on the Internet that allow users to create and exchange user generated content, such as text-based communication, pictures, videos, and other forms of media (Kaplan and Haenlein, 2010:61). According to Statista (2015), social networks have grown rapidly over the last ten years and there are currently 1.96 billion social network users in the world. This is predicted to increase to 2.44 billion users by 2018 (Statista, 2015). Singapore has the most active social network users compared to its population, followed by Hong Kong, Argentina, the UK and USA (Kemp, 2015). The most popular social network is Facebook with 1.49 billion monthly active users followed by Google+/YouTube with 343 million, LinkedIn with 332 million, Instagram with 300 million and Twitter with 284 million (Bennet, 2014; Facebook, 2015).

In South Africa, the top five most used social networks follow the global trend. According to World Wide Worx (2015), in South Africa, there are 11.8 million Facebook users, 7.2 million YouTube users, 6.6 million Twitter users, 3.8 million LinkedIn users and 1.1 million Instagram users with an average 20% increase in users each year (Kemp, 2015; World Wide Worx, 2015). The reason for this rapid growth can be attributed to rising smartphone use and the decreasing cost of data (Van Zyl, 2015). This is affirmed by Kemp (2015), who shows that 61% of South African Internet users access the Internet via their mobile phones and only 32% do so using desktop computers. From this, 10.6 million South Africans access social networks via their mobile phones (Kemp, 2015).

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According to Morrissey (2015), South Africans have an openness to social networks that suggests it could be a successful way to connect with them as consumers, if their usage and behaviour is understood well. Since social networks are such an important and useful platform for marketers to reach consumers, it is important to review further literature to understand why and how consumers use social networks.

Social network usage

Internet users worldwide spend 101.4 minutes of their day using social networks (Statista, 2015). Global Web Index (2015) lists the top ten motivations of why people use social networks as: To stay in touch with friends, to stay up-to-date with news and current events, to use up spare time, to find funny and entertaining articles and videos, to share their opinion, to share photos and videos with others, because their friends are on the social network, to network professionally with other people, to meet new people and to share details of their daily lives. This study supports the work of Hughes *et al*. (2012), which suggests that social network usage can be defined in terms of information purposes and social purposes.

Social network usage for information purposes

Hughes *et al*. (2012:564) determined that social network usage can be defined in the context of information purposes as social networks are primarily used for information, to find and spread information and to keep up with current events. This is supported by research which shows that one of the most important functions of social networks for users is information sharing and gathering (Min and Kim, 2013:851). Kim, Lee and Elias (2015:291) state that social networks have become an essential source of news and information for users and Bazarova and Choi (2014:650) further expand on this definition by hypothesising that social networks are used to share information which benefits other social network users. This information also includes personal information such as life experiences which serve to increase social bonding and social connectedness (Maksl and Young, 2013:591; Wang, 2013:875).

Social network usage for social purposes

Social networks are used for social purposes in terms of socialising, keeping in touch with friends and because friends use that social network as well (Hughes *et al*., 2012:564; Contena, Loscalzo and Taddei, 2015:32). This is further supported by Chang and Hsiao (2013:106) who propose that social networks are used to browse information posted by friends and community members as well as information about friends and community members. Social networks can also be used for "relationship management" as users form online relationships, social ties and develop a sense of belonging to specific social network communities (Min and Kim, 2013:845).

Social network behaviour

In a study by Rauniar *et al*., (2014:16) social network behaviour is explored using an adaption of the items from the Technology Acceptance Model (Davis, 1989) which include; perceived ease of use of social networks, perceived usefulness of social networks and intention to keep using the social network site.

Perceived ease of use of social networks

According to Rauniar *et al*., (2014:20), perceived ease of use is determined by the user believing that the social network is flexible to interact with, they find it easy to get the social network to do what they want, they find it easy to become skilful at using the social network, they find the social network easy to use and their interaction with the social network is clear and understandable. Similarly, Kim *et*

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al., (2015:298) determined that users who understand how to use social networks and are able to easily learn advanced features of social networks, have a high level of perceived ease of use of social networks.

Perceived usefulness of social networks

Users perceive social networks to be useful when it enables them to re-connect with people that matter to them, they find it useful in their personal life, it enables them and makes it easier to stay in touch with others and it makes it easier to for them to stay informed about others (Rauniar *et al*., 2014:20). Research agrees that the more a user finds a social network to be useful, the more likely this is to affect their behaviour on the social network, in terms of self-presentation and user-satisfaction (Min and Kim, 2013:849; Yoon and Rolland, 2015:5).

Intention to keep using social networks

Social network users display the intention to continue using social networks when they use a social network to communicate with others and to reconnect with people that matter to them (Rauniar *et al*., 2014:20). It is also suggested that the intention to continue using the social network affects the behavioural intention of the user (Rauniar *et al*., 2014:20). Research also shows that if a social network is perceived to be easy to use, useful and provide socially rewarding benefits, users are more likely to continue social network use (Min and Kim, 2013:851; Yoon and Rolland, 2015:6). Online relationships, usage and behaviour may arguably also be affected by the user's age, much like in traditional marketing (Vinerean, Cetina, Dumitrescu and Tichindelean, 2013:77).

Social network usage and behaviour of different age generations

Hughes *et al*. (2012:567) determined that younger users are more likely to use social networks for social purposes, whereas older users tend to use social networks more for information purposes. All age generations arguably find social networks useful if they can communicate and stay in touch with others, but they do so differently (Bolton, Parasuraman, Hoefnagels, Migchels, Kabadayi, Gruber, Loureiro and Solnet, 2013:249). It is therefore possible to segment social network users into age generations as there is evidence that shows they use and behave differently on social networks. Hayes, van Stolk-Cooke and Muench (2015:508) propose that the most significant way in which age generations differ in their social media usage, is their frequency of status updates, photo sharing and browsing through friend's photos - Generation Y (born 1977 – 1994) and Generation Z (born 1995 - 2012) are especially the most active in these. Gen Y gravitates more towards social networks that they can actively participate in and experience a sense of community, while Gen Z finds social networks useful if they can build relationships with friends and school or university peers (Bolton *et al*., 2013:249).

Gen X, or midlife adults (born 1966 – 1976), have a more positive attitude towards social networks and primarily use social networks to reconnect with old friends from school or university who they have lost contact with and see this reconnection as a potential resource for sharing mutual information, professional support, for companionship and camaraderie or for simply observing their social group's shared lives to satisfy their curiosity (Quinn, 2013:397). The Baby Boomers (born 1946 – 1965) arguably perceive social networks as difficult to use as they were not exposed to technology and social networks in the same way as the latest generations have. They are also more inclined to share their information and photos if their friends also share more frequently, suggesting that their social network usage may have an effect on their social network behaviour (Chakraborty *et al*., 2013:954; Yang and Jolly, 2015:277). Older adults are also more concerned with privacy on social

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networks, but most studies have not included a wide enough age range to determine how these privacy concerns compare between the different age generations (Litt, 2013).

PROBLEM INVESTIGATED

Given the increasing popularity of social networks, as well as the diversity of social network users, it is particularly important to understand how these different users use and behave on social networks (Statista, 2015). The literature review provides evidence that different age generations may use and behave on social networks differently and therefore have different responses to marketing and brand messages on social networks (Hughes *et al*., 2012; Rauniar *et al*., 2014).

As far as the researchers could determine, no research on social network usage and behaviour, as defined in the literature review above, has been conducted in a South African context with a specific focus on differences in age groups. This study therefore focuses on social network usage, for information and social purposes, and social network behaviour, in terms of perceived ease of use, perceived usefulness and intention to continue use between age generations. The study will also explore differences in age groups with regards to their use of private information on their social network profiles, as Litt (2013) suggests that there is currently not enough literature on the differences in privacy behaviours between age groups.

The following primary objective is formulated for the study: To determine whether age generations differ with regards to their social network usage and behaviour.

The following secondary objectives support the primary objective of the study:

1) To present a demographic profile of social network users.
2) To present respondents' general social network behaviours.
3) To explore whether different age generations differ in terms of personal information sharing on their social network profiles.

Based on the primary objective of the study, the following hypotheses were formulated:

H^1: There is a significant difference between age generations and their usage of social networks for information purposes.

H^2: There is a significant difference between age generations and their usage of social networks for social purposes.

H^3: There is a significant difference between age generations and their perceived ease of using social networks.

H^4: There is a significant difference between age generations and their perceived usefulness of social networks.

H^5: There is a significant difference between age generations and their intentions to use social networks.

RESEARCH METHODOLOGY

Sampling and data collection

The target population for this study included social network users from all age generations, as classified per Shroer (2015): Baby Boomers (age 50 – 69), Gen X (age 39 - 49), Gen Y (age 21-38)

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and Gen Z (3-20) in South Africa. A quantitative descriptive research design was used in the study in order to collect a large sample size as well as provide specific data that can be analysed to determine the relationships between the variables (Hair, Wolfinbarger, Ortinau and Bush, 2012:109). The units of analysis were the individual social network users from the four different generations specified.

A non-probability convenience sampling method was used to select respondents as Hair *et al*. (2012:138) state that this type of sampling method allows a large number of respondents to be reached when time is limited. A self-administered survey method was used for the study and 70 trained fieldworkers were used to identify and recruit respondents who had used a social network in the last six months in order to widen the reach of the survey in the simplest way possible. The target sample size was 1400, based on previous research in which similar constructs were measured by Rauniar *et al*., (2014:25) where a sample of 900 responses was collected. A total of 1176 questionnaires were deemed usable, representing an 84% response rate.

Measuring instrument

The questionnaire consisted of five sections of structured questions as well as an introductory section. The introductory section of the questionnaire entailed the instructions for respondents. A screening question was included in this section to ensure only data from respondents who have used social networks in the last six months were collected.

Section A obtained a demographic profile of the respondents which included age, level of education, gender, home language, employment status and marital status. Section B contained information about respondent's social network usage habits including frequency and duration of use, using an ordinal scale. Section C consisted of a usage scale adapted from a previous study conducted by Hughes *et al*. (2012:564) and gathered information about whether respondents primarily used social networks for information or social purposes. These 6 items were measured using a 5-point Likert scale, where 3 items measured information usage and 3 items measure social usage, using the scale points 1 = 'strongly disagree' and 5 = 'strongly agree.'

The 5-point Likert scale for social network behaviour in Section D was adapted from research done by Rauniar *et al*., (2013:20) and gathered information regarding respondents' perception of ease of use which has 5 items, usefulness which has 5 items and intention to continue using social networks which has 3 items, all measured using the scale points 1 = 'strongly disagree' and 5 = 'strongly agree.' Section E also used an adapted five-point Likert scale to measure social network personal information sharing and privacy statements. Each of these statements was measured separately on the 5-point scale. This specific scale does not represent an overall construct, but separate statements pertaining to information on social network profiles.

Data entry, editing, coding and analysis

The data was coded, entered and edited for data analysis using the software Statistical Package for Social Sciences (SPSS). The frequency distribution of the results for each of the scale items was examined as the first step of data analysis in order to determine whether the data was normally distributed. The normality of the distribution of results of each scale item was determined in order to determine whether parametric or non-parametric tests should be used to test the hypotheses of the study. The distribution of results can be considered normal if it exhibits a skewness of less than an absolute value of 2.00 and a kurtosis of the distribution of less than 7.00 (West, Finch and Curran 1995:79). The scale items used in the study all fall within these parameters. Due to this, and the fact that a large sample size was used (n = 1176), parametric tests were decided to be suitable for hypothesis testing.

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Descriptive analysis was conducted and statistics such as frequencies, percentages, mean scores and standard deviations were calculated where applicable, for the different questions asked in the survey to allow for statistical comparison. A p-value of 0.05 or less (a 95% confidence interval and a subsequent 5% level of significance) for hypothesis testing was indicative that the hypothesis may be supported.

A one-way analysis of variance (ANOVA) was used to determine whether significant differences exist in terms of age generations with regard to respondents' social networks usage for information purposes and for social purposes. A one-way analysis of variance (ANOVA) was also used to determine whether significant differences exist in terms of age generations with regard to their perceived ease of use and usefulness of social networks as well as their intention to continue using social networks. Lastly, a cross tabulation was generated to explore whether age generations differ in terms of personal information sharing on their social network profiles.

RESULTS

This section provides the results obtained regarding the demographic profiles of the respondents as well as respondents' social network usage and their social network behaviour.

Demographic profile of respondents

Of the 1176 respondents who participated in the study, 44.4 percent were male and 55.6 percent were female. The home language of the majority of the respondents is English (35.5%), with Nguni (22.4%), Sotho (22.2%) and Afrikaans (9.1%) following. The majority of the respondents are from Generation Y (75.8%), with 14.7 percent being Generation Z, 6.5 percent from Generation X and 2.9 percent being Baby Boomers. Table 1 exhibits the demographic profile of the respondents.

TABLE 1
DEMOGRAPHIC PROFILE OF RESPONDENTS

Demographics (n = 1176)		Percentage %
Gender	Male	44.4
	Female	55.6
Home language	Afrikaans	9.1
	English	35.5
	Nguni	22.4
	Sotho	22.2
	Venda/Tsonga	5.2
	Other	5.6
Age generation	Baby boomers	2.9
	Gen X	6.5
	Gen Y	75.9
	Gen Z	14.7

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Respondents' social network habits

Table 2 indicates the results for the respondents' social network habits.

TABLE 2
RESPONDENTS' SOCIAL NETWORK HABITS

Question (n = 1176)		Percentage %
Times logging onto social network	Several times a day	72.3
	Once a day	14.6
	Less than once a day but more than once a week	7.1
	Once a week	2.6
	Once every two weeks	1.8
	Once a month	1.1
	Other	0.4
Time active on social network	Less than 1 year	6.5
	1 year or more but less than 2 years	10.1
	2 years or more but less than 3 years	14.2
	3 years or more but less than 4 years	15.7
	4 years or more but less than 5 years	17.3
	5+ years	36.1
Time spent per session using social network	Less than 30 minutes	54.3
	30 minutes to 1 hour	28.9
	1 to 2 hours	7.5
	More than 2 hours	9.4

Table 2 indicates that the majority of respondents log onto a social network several times a day (72.3%), while 14.6 percent log on once a day and 7.1 percent log on less than once a day but more than once a week. The majority of respondents have been active on a social network sites for more than 5 years (36.1%) while 17.3 percent have been active for 4 years or more, but less than 5 years, and 15.7 percent have been active for 3 years or more but less than 4 years. Only 6.5 percent have been active on a social network site for less than 1 year. The table also shows that 54.3 percent of the respondents spend less than 30 minutes per session on the social network site with 28.9 percent spending 30 minutes to 1 hour on the site, 9.4 percent spending more than two hours and 7.5 percent spending 1 to 2 hours on the social network site.

Respondents' social network usage and behaviour

Table 3 provides the mean (M) and standard deviation (SD) scores for the level of agreement respondents indicated when presented with statements regarding their social network usage and behaviour.

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TABLE 3
RESPONDENTS' SOCIAL NETWORK USAGE AND BEHAVIOUR

Statements (n=1176)	Mean (M)	Std dev. (SD)
Social network usage: Information purposes		
1. I use this social network to find and spread information	3.53	1.253
2. This social network is primarily for information	3.23	1.209
3. I use this social network to keep abreast of current events	3.62	1.120
Overall mean score	3.46	
Social network usage: Social purposes		
4. I use this social network to keep in touch with friends	4.07	1.051
5. I use this social network because my friends do	3.11	1.334
6. This social network is primarily for socialising	3.67	1.159
Overall mean score	3.61	
Social network behaviour: Perceived ease of use		
7. This social network is flexible to interact with	3.95	0.938
8. I find it easy to get this social network to do what I want	3.83	1.027
9. It is easy to become skilful at using this social network	3.92	1.024
10. I find this social network easy to use	4.30	0.847
11. Interaction with this social network is clear and understandable	4.20	0.864
Overall mean score	4.04	
Social network behaviour: Perceived usefulness		
12. Using this social network enables me to re-connect with people that matter	4.00	1.051
13. I find this social network useful in my personal life	3.67	1.156
14. Using this social network enhances my effectiveness to stay in touch with	3.89	1.023
15. Using this social network makes it easier to stay in touch	4.00	0.972
16. Using this social network makes it easier to stay informed about others	4.01	0.926
Overall mean score	3.91	
Social network behaviour: Intention to use		
17. I intend to use this social network for communicating with others	3.94	1.024
18. I intend to use this social network to get reconnected with people that	3.84	1.083
19. I will continue to use this social network for social networking	4.06	0.981
Overall mean score	3.94	

From Table 3, it is evident that respondents agreed mostly with the statements regarding the perceived ease of use of social networks. The statements 'I find this social network easy to use' (M = 4.30, SD = 0.847) and 'Interaction with this social network is clear and understandable' (M = 4.20, SD = 0.864) were strongly agreed with. Respondents also strongly agreed with the statements for perceived usefulness of social networks as well as indicated their intentions strongly to continue using social networks with the statements, 'Using this social network makes it easier to stay informed about others' (M = 4.01, SD = 0.926), 'Using this social network enables me to get re-connected with people that matter to me' (M = 4.00, SD = 1.051), and 'Using this social network makes it easier to

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stay in touch' (M = 4.00, SD = 0.972). Furthermore, respondents indicated that they use social networks almost equally for social purposes (overall M = 3.61) as they do for information purposes (overall M = 3.46). Having said this, the most strongly agreed reason for social network usage was to keep in touch with friends (M = 4.07, SD = 1.051).

The Cronbach's alpha coefficient values were calculated for each of the two dimensions of social network usage as well as the Cronbach's alpha coefficient value for the three dimensions of social network behaviour. While different levels of reliability are required, depending on the nature and purpose of the scale, Nunnally (1978) recommends a minimum level of 0.7. The values obtained were all above 0.7, except for social network usage for social purposes which had a value of 0.633. This is because Cronbach's alpha values are dependent on the number of items in the scale and when there are a small number of items in the scale (fewer than 10) Cronbach's alpha values can be quite small. With short scales (e.g. scales with fewer than ten items) it is common to find quite low Cronbach's alpha values. A value of 0.633 was therefore deemed acceptable for the construct measuring social network usage for social purposes.

Having analysed the individual statement means above, the statements can be combined into sub constructs as, based on the Cronbach's alpha, the scales can be considered reliable. The Cronbach's alpha coefficient values are indicated in Table 4.

TABLE 4
CRONBACH'S ALPHA COEFFICIENT FOR SOCIAL NETWORK USAGE AND BEHAVIOUR STATEMENTS

Sub constructs	Cronbach's Alpha
Social network usage: information purposes	0.722
Social network usage: social purposes	0.633
Social network behaviour: Perceived ease of use	0.820
Social network behaviour: Perceived usefulness	0.863
Social network behaviour: Intention to use	0.800

Respondent's sharing of personal information on social networks
Table 5 provides the percentages of each age generation who strongly agreed with the 11 statements related to sharing of personal information on social networks.

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TABLE 5
RESPONDENTS' SHARING OF PERSONAL INFORMATION ON SOCIAL NETWORKS

Statements (n=1174)	Baby Boomers (n= 34)		Gen X (n = 76)		Gen Y (n=891)		Gen Z (n= 173)	
Scale: 1 = Strongly disagree 5 = Strongly agree	1	5	1	5	1	5	1	5
1. I allow anyone to view my profile	44.11%	8.82%	46.05%	18.42%	29.96%	23.56%	32.36%	23.12%
2. I include pictures of on my profile	17.64%	11.76%	11.84%	35.52%	4.71%	44.66%	5.78%	48.55%
3. I include my email address on my profile	38.23%	8.82%	48.68%	17.10%	35.69%	18.85%	43.35%	17.34%
4. I include my instant messenger address	47.05%	8.82%	50%	10.52%	43.20%	10.99%	49.13%	9.24%
5. I have my phone number on my profile	52.90%	5.88%	52.63%	10.52%	49.27%	14.7%	47.97%	18.49%
6. I have my home address on my profile	85.29%	0%	77.63%	1.31%	64.53%	6.84%	65.31%	6.35%
7. I include information about my interests on my profile	26.47%	8.82%	23.68%	10.52%	15.15%	21.43%	17.34%	20.80%
8. I include information about my personality on my profile	52.94%	5.88%	36.84%	5.26%	18.63%	18.52%	21.38%	16.18%
9. I write on other people's pages	32.35%	5.88%	17.10%	22.36%	11.89%	26.71%	13.29%	26.01%
10. I spend time personalizing my profile page	50%	0%	34.21%	9.21%	22.89%	13.46%	27.74%	14.45%
11. I use my real name on my profile page	5.88%	47.05%	6.57%	64.47%	6.95%	54.76%	6.35%	61.84%

Respondents across all age generations agreed most strongly with the statement 'I use my real name on my profile page', with Gen X being the largest group agreeing to this statement (64.47%). A large percentage of Gen Y and Gen Z respondents also agreed that they include pictures of themselves on their profiles. The respondents agreed least with the statement I have my home address on my profile', with no Baby boomers at all agreeing to this statement. Baby boomers and Gen X also disagreed most with statements relating to sharing of contact information on their profiles such as their email address and phone number. Baby boomers and Gen X also disagreed more than Gen Y and Gen X about sharing information about their interests and personalities on their profile. Overall, Baby boomers had the lowest percentage agreeing to most of the statements while Gen Y and Gen Z had the highest percentages agreeing to the statements.

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Results of hypotheses formulated pertaining to social network usage and behaviour

Several findings were observed with respect to hypotheses formulated for this study. H1 and H2 were tested using a one-way between groups' analysis of variance to compare the effect of age on social network usage for information purposes and social purposes. Subjects were divided into four groups according to their age (Gen Z: 20 years or less; Gen Y: 21 to 35 years; Gen X: 36 to 54 years and Baby boomers: 55 years and above).

For H1, there was no statistically significant difference at the $p < 0.05$ level in information usage scores for the four age groups: $F (3, 1170) = 0.78$, $p = 0.504$. H1 is therefore not supported. There was a statistically significant difference at the $p < 0.05$ level in social usage scores for the four age groups: $F (3, 1170) = 5.68$, $p = 0.001$. H2 is therefore supported. However, despite H2 reaching statistical significance, the actual difference in mean scores between the groups was small. The effect size, calculated using eta squared, was 0.01. Cohen (1988:284) recommends an effect size of 0.01 as a small effect, 0.06 as a medium effect and 0.14 as a large effect.

Post-hoc comparisons using the Tukey HSD test indicated that the mean score for Baby boomers ($M = 9.26$, $SD = 3.15$) was significantly different from Gen Y ($M = 10.86$, $SD = 2.69$) and Gen Z ($M = 11.24$, $SD = 2.30$). Gen X ($M = 10.48$, $SD = 3.19$) did not differ significantly from either Baby boomers, Gen Y or Gen X whereas Gen Y and Gen Z were significantly different from each other.

H3, H4 and H5 were all tested using a one-way between groups' analysis of variance to compare the effect of age on perceived ease of use using social networks, perceived usefulness of social networks and intentions to continue using social networks. Subjects were again divided into four groups according to their age (Gen Z: 20 years or less; Gen Y: 21 to 35 years; Gen X: 36 to 54 years and Baby boomers: 55 years and above). For hypothesis 3, there was a statistically significant difference at the $p < 0.05$ level in social behaviour scores for the four age groups: $F (3, 1170) = 6.017$, $p = 0.000$. For H4, there was also a statistically significant difference at the $p < 0.05$ level in social behaviour scores for the four age groups: $F (3, 1170) = 2.757$, $p = 0.041$. H5 had a statistically significant difference at the $p < 0.05$ level in social behaviour scores for the four age groups: $F (3, 1170) = 6.375$, $p = 0.000$. H3, H4 and H5 are therefore supported.

However, upon reviewing the actual difference in mean scores between the groups for all three hypotheses, it is evident that it was quite small (Cohen, 1988:284). The effect size, calculated using eta squared, was 0.01 for H3; 0.007 for H4 and 0.01 for H5. Post-hoc comparisons using the Tukey HSD test was conducted for all three hypotheses. For H3, the test indicated that the mean score for Baby boomers ($M = 17.70$, $SD = 3.73$) was significantly different from all Gen X ($M = 19.97$, $SD = 3.98$), Gen Y ($M = 20.32$, $SD = 3.49$) and Gen Z ($M = 20.21$, $SD = 3.73$). Gen X, Gen Y and Gen Z were only significantly different from Baby boomers and not from each other. For H4, the test indicated that the differences between the mean scores of Baby boomers ($M = 18.88$, $SD = 4.05$), Gen X ($M = 19.05$, $SD = 4.96$), Gen Y ($M = 19.49$, $SD = 4.11$) and Gen Z ($M = 20.32$, $SD = 3.73$). Lastly, for H5 the test indicated that the mean score for Gen Z ($M = 12.52$, $SD = 2.32$) was significantly different from all other groups, Baby boomers ($M = 10.91$, $SD = 3.02$), Gen X ($M = 11.39$, $SD = 3.12$) and Gen Y ($M = 11.78$, $SD = 2.57$). Baby boomers, Gen X and Gen Y were not significantly different from each other.

DISCUSSION

The majority of respondents have been active on a social network site for more than 5 years (36.1%), which reflects the rise in the popularity of social networks in the last ten years (Statista, 2015). Most respondents log onto a social network several times a day (72.3%), with 86.9 percent logging in at least once a day and most of the respondents (54.3%) spend only 30 minutes per session on their social network of choice (Table 2).

Results from this study indicate that the age of respondents does not matter when it comes to using social networks for information purposes and that all age generations are somewhat indifferent about using social networks to find and spread information or to keep informed of current events (Table 4).

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With regards to using social networks for social purposes, although the most agreed purpose was to keep in touch with friends, the results show that there are significant differences between age generations. These results are not consistent with the results from Hughes *et al*., (2012:567) who determined that younger users are more likely to use social networks for social purposes whereas older users tend to use social networks more for information purposes which suggests that the South African market is different from the global market.

The results also determine that most respondents find social networks easy to use and their interaction with the social network is clear and understandable. However there is a significant difference in the ease-of-use level between Baby boomers and the other age generations but not between Gen X, Gen Y and Gen Z. This supports research which proposed that Baby Boomers perceive social networks as more difficult to use as they were not exposed to technology and social networks the way the latest generations have, who tend to be more technologically literate (Hayes *et al*., 2015:508; Chakraborty *et al*., 2013:954; Yang and Jolly, 2015:277).

The results show that most respondents perceive social networks to be useful as it enables them to re-connect with people that matter to them and makes it easier for them to stay in touch with others. The difference between the age generations is however very small. This is supported by research which shows that although age generations behave similarly on social networks in terms of staying in touch with others, the social groups they stay in touch with differs. Gen Z find social networks useful if they can build relationships with friends and school or university peers while Gen Y gravitate more towards social networks that they can actively participate in and experience a sense of community (Bolton *et al*., 2013:249). Gen X prefer to reconnect with old friends from school or university who they have lost touch with, while Baby boomers are happy to just stay in touch with family (Quinn, 2013:397). Most respondents agreed that they will continue using the social network with Gen Z being significantly different from all other age generations. This is consistent with research that shows if a social network is perceived to be easy to use, users are more likely to continue social network use (Min and Kim, 2013:851; Yoon and Rolland, 2015:6).

Respondents across all age generations agreed most strongly that they include their real name on their profile page. This is likely because most social networks such as Facebook require a real name when signing up. A large percentage of Gen Y and Gen Z respondents also agreed that they include pictures of themselves on their profiles. The respondents agreed least with the statement I have my home address on my profile', with no baby boomers at all agreeing to this statement. Baby Boomers had the lowest percentage agreeing to most of the statements while Gen Y and Gen Z had the highest percentages agreeing to the statements, in indicating Baby Boomers share less personal information on social networks than the younger generations. Therefore it can be concluded that different age generations differ in terms of personal information sharing on their social network profiles.

MANAGERIAL IMPLICATIONS AND RECOMMENDATIONS

The frequency and duration of time that users spend on social networks should determine the frequency and quality of content that organisations publish on social networks. As users tend to log on several times a day, best practice indicates that brands should post on social networks at least once a day to reach their target audience (Bufferapp, 2015). Each of these sessions usually last less than 30 minutes therefore it is vital that marketers generate and publish content on social networks that quickly and effectively obtains and retains the attention of the audience.

With regards to social network usage for information and social purposes, the implication of the results of this study for marketers is that it is important to always keep in mind the core function of social networks, which is social interaction (Strauß and Nentwich, 2013:725). Social networks should not be used as a broadcast marketing channel to push product and selling onto consumers but rather as a two-way communication channel to educate, entertain and engage with consumers. Marketers should aim to create social communities of like-minded audiences who are interested in the same things in order to generate brand affinity and loyalty. Furthermore, because it has been determined

that there are differences between age generations and using social networks for social purposes, marketers need to ensure that their messaging and content are tailored for each different age segments.

As the results determined there are age differences in social network behaviour especially with regard to perceived ease of use, marketers need to ensure the content published on the organisation's social networks is simple to understand and age-appropriate graphics and photos are used, in order to make older users comfortable with interacting with the brand on social networks. Furthermore, marketers can use social network promoted ads to target an older audience, such as Facebook Ads and Twitter Cards, which includes a button clicking directly through to a landing page, or a direct newsletter signup. This reduces the number of steps required for the user to take before conversion occurs.

Furthermore, the different age groups tend to gather in social network community groups of similar ages and lifestyles as they find those groups most useful to them. This means marketers should target these community groups (example: the *People who live in Centurion* or *UJ Alumni* groups on Facebook) as this will ensure that potential consumers are targeted in the places they find most useful online and are more likely to respond positively to marketing messages. As consumers will continue using social networks, organisations need to start, if they haven't already, including social networks as an official channel of communication and as part of the organisational and marketing strategy in order to reach consumers where they are and will be in the future, which is on social networks.

A convenience sampling method was used and therefore the results of the study would only be representative of the portion of the defined target population who participated in the study. Consequently, the results of the study cannot be generalised to the entire South African population who use social networks. To overcome this limitation, it is recommended that the study be conducted on a much larger scale to be inclusive of more social network users in South Africa from varying geographical areas and age groups, especially as the majority of respondents fell into one age group only. Furthermore, as South Africa consists of many different and diverse cultures which may affect usage and behaviour, an avenue for further study may be to identify whether age groups in different cultures have an effect on social network usage and behaviour, and ways to incorporate these differences into marketing strategy. Lastly, this study determined how different age groups use and behave on social networks in the personal capacity within their own social communities. Consumers however, tend to behave differently in a social context and it is vital that marketers understand that behaviour. Therefore it is suggested that further research be conducted to determine whether there are differences between age generations in the way they interact with brands on social networks.

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