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The effect of Facebook in-application advertisements on purchase intent: a case of retail shopping in South Africa

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2018

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The effect of Facebook in-application advertisements on purchase intent: A case of retail shopping in South Africa

Neo Makgalong Radise

A research report submitted to the Faculty of Commerce, Law and Management, University of the Witwatersrand, in partial fulfilment of the requirements for the degree of Master of Management in Strategic Marketing

Johannesburg, 2018

ABSTRACT

Social media has transformed how people communicate with each other and has carved alternative ways for businesses to engage and interact with customers by sending them targeted campaigns and promotions using various social media platforms. Social media has made information accessible to consumers which assists them to make well informed decisions when making a purchase.

The focus of the study is to establish the effectiveness of in-application advertisement on Facebook on purchase intent - a case study on retail in South Africa. The analysis is based on the black baby boomer cohort, an under studied segment of the population, in South Africa.

The findings of the study reveal the growing adaptation and use of Facebook by baby boomers in South Africa, as they use and rely on this platform to remain connected with family, friends and peers and to be able to source information on products and services based on peers via word of mouth.

This study relies on quantitative analysis of the results obtained through an online survey. A total of 603 respondents engaged with the survey, which was placed on Facebook, and 235 of the successfully completed questionnaires were by baby boomers in South Africa. The study testes five hypotheses using Structural Equation Modelling and SPSS.

The study revealed that the hypotheses that tested in-application advertisement on Facebook and its effectiveness does show a strong relationship with performance expectancy by baby boomers. Effort and social influence had a weak relationship to any of the variables, however this changed when new mediator variables, clicking on and advertisements and word of mouth, are introduced.

The study contributes to the literature and theoretical knowledge on the positive effectiveness of Facebook and online banner advertisement towards purchase intent, and the effectiveness and impact of word of mouth both online and offline, in South Africa. The findings may be applied and expanded to other African regions.

DECLARATION

I, Neo Makgalong Radise, declare that this research report is my own work except as indicated in the references and acknowledgements. It is submitted in partial fulfilment of the requirements for the degree of Master of Management in Strategic Marketing in the University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination at this or any other university.

Signed at ……

On the …….. day of …… 2018

DEDICATION

I dedicate this to my mother, Mme Chwaro Ellen “Tonono” Radise (nèe Mosiako).

1950/10/16 – 2014/07/20

In the beginning of 2014 we shared a lot of dreams and wishes. She leaned a lot on me for the littlest things, little did I know she was sharing words of wisdom and imparting courage that I would need to carry with me because her time on earth was nearing an end.

An academic, who was also a University of Witwatersrand alumni, an educator by profession, an avid entrepreneur, disciplinarian, yet generous, thoughtful and very loving human being. I hope to be at least half the woman that she was.

I hope she knows she was loved immensely and her absence is still felt almost four years later. I might have not been a perfect child nor did I follow the rules but all I ever wanted was to make you proud and happy, I hope I achieved that.

From the depth of my heart, Thanks Mama. Given a chance, I would choose you as a mother again and again.

A promise I made to you has come to pass, this degree is in honour of you.

It is well with your soul.

ACKNOWLEDGEMENTS

I would like to take this opportunity to thank the following people and organisations who have contributed towards the completion of my Master's degree:

- The God almighty who continues to make all things possible
- My family and friends for the unwavering support.
- The lecturers, programme managers and administrative staff at Wits Business School for the honour of being able to further my education at such a prestigious institution.
- My supervisor, Dr. Yvonne Saini, for her support, motivation and valuable contribution to my research.
- Khaleesa Advisory Services for statistical data support
- My syndicate member, Dewald Geldenhuis. Thank you so much for holding my hand and supporting me throughout the year. I'm forever grateful for allowing me to tap into your knowledge bank and for never saying "no" to me.
- Siphiwe Dlamini, 2015 MMSM student, you have been my truest inspiration. Your patience and support has been unbelievable, Thank you.
- My previous employer, Momentum MMI, for allowing me time off to attend classes and focus on my studies.
- My current employer, The Apprentice Valley, thanks for taking a chance and believing in me.

It has been an honour and a blessing.

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CHAPTER 1. INTRODUCTION

1.1 Purpose of the study

The purpose of this research is to investigate the effectiveness of in-application advertising on Facebook on the purchase habits (consumer behaviour) of black baby boomers in South Africa. The paper further intended to investigate this cohort's attitudes, perception and engagement on social media platforms and whether the advertising communications they are exposed to on Facebook influence their purchase intention and decision-making processes.

The intent of the research study is to establish how baby boomers have adapted to the usage of digital media in the new age, with a key focus on banner advertising on Facebook, as a non-traditional marketing tool and whether marketing messages baby boomers are exposed to on social media create a need or desire to purchase products. The effects of online advertising are enhanced due to the brand awareness, the recall of products and attitudinal and behavioural changes experienced by consumers (Duffett, 2015).

1.2 Context of the study

The evolution of technology and development of community virtual platforms on social media applications such as Facebook, Twitter and Instagram have significantly enhanced the level of engagement by providing a platform for consumers to connect with their favourite brands (Saboo, Kumar & Ramani, 2015). In today's modern society where technology advances rapidly, the Internet and its multiple uses have become personal (mobile phones and tablets), direct (face-to-face), immediate (Facebook, Twitter, Instagram, Skype), reliable (monitoring delivery of messages) and allow for a two-way means of communication that is measurable. A popular social media platform that continues to gain popularity and has a wide global audience is Facebook, which currently has over one billion users worldwide (Dickey & Lewis, 2010). Facebook remains as the leading, in terms of popularity, social networking site amongst all

age groups with a noticeable increase in the usage amongst users aged sixty five years old and older (Duggan, Ellison, Lampe, Lenhart, & Madden, 2015).

Social media, as a virtual community communication platform, has become a part of people's everyday life and the development of web-enabled social media platforms has made it possible for people to communicate with family, friends and colleagues worldwide. People can chat, share their hobbies and pictures on social media instantly without physical human interaction. Social media platforms have also provided an opportunity for brands and marketers to send marketing and promotional messages to consumers using these platforms. Online media is at the cornerstone of the digital ecosystem and brands now appreciate the value of incorporating social media as an element in products and brands' holistic strategies (Hanna, Rohm, & Crittenden, 2011).

Baby boomers who not only have time but also have discretionary income at their disposal dominate the rapidly increasing demographic in the social media market (Lewis & Ariyachandra, 2011). Furthermore, baby boomers make up a significant quota of the world's population and purchasing power and are also redefining the concept of getting old in modern times (Beneke, Frey, Chapman, Mashaba, & Howie, 2011; Pitta, Eastman, & Liu, 2012). Most baby boomers are assumed to be in their prime spending years and are an attractive and persuasive consumer cluster (Loroz & Helgeson, 2013).

1.3 Problem statement

1.3.1 *Main problem*

Customarily, marketers concentrate their marketing efforts towards the younger generation and have historically neglected baby boomers due to the perception that this cohort is not ready for innovation and generally reject innovations (Badowska et al., 2015). Baby boomers' purchase motivation and intent starts with a retailer that they trust and who provides advice for correct product selection (Parment, 2013). Evidence exists to support the narrative that social media activities influence consumer purchases (Saboo, Kumar & Ramani, 2015),

however, scant research has been conducted in the retail sector with respect to what influences male and female black baby boomers' purchase aim in the South African population.

On a broader scale, empirical research studies have been undertaken to understand the consequences of age on mobile service intention, particularly in the age of internet implementation (Kumar & Lin, 2006). While dynamic digital and information technology inventions are rapidly altering, and crafting an assortment of new applications and features online, the problem is that moderately little attention is given to how this cohort understands the internet and their acceptance and use of new technologies.

It is estimated that over 2.4 billion individuals used and interacted on the Internet in 2011 and this has been perpetuated by the increase of interactive social media platforms such as Google, MySpace, Twitter and Facebook (Mackey & Liang, 2013). The research further states that four (4) in five (5) internet users represent both the developed and emerging markets (Mackey & Liang, 2013). Generations differ in terms of their media use due to cohorts adopting specific patterns of media consumption in their youth and hold differing society needs for and values about the various media uses. Baby boomers and Generation- X are categorised as the "TV generation" (Bondad-Brown, Rice, & Pearce, 2012). There is research available on baby boomer uptake on social media and technology (Celik & Schoreels, 2014; Dumbrell & Steele, 2014; Kumar & Lim, 2008; Leung, 2013; E. McLeod, 2009). Be that as it may, there is not enough literature that spotlights how online marketing media impacts their purchasing behaviour.

There are studies available that predominately focus on millennials and their adaptation of social media, however Nyemba, et al, (2011) have highlighted the lack and a gap in the studies available that have focused on the older generation and their perceptions on and participation in social media.

The intended outcome of this study is to explore and interrogate the correlation between baby boomers and their purchase intent when exposed to digital marketing campaigns. Black males and females in this cohort have disposable

income and have decision making power in their households and are therefore more inclined to search for product information from various sources. They are the TV generation, however there is an opportunity for marketers to add digital media and an alternative source of information and entertainment.
Findings are planned to give direction to advertisers on the most proficient method to impart to the diverse segments in the business sector, as applying blanket marketing methodology may not as a matter of course yield the expected results.

1.3.2 *Sub-problems*

Sub-problem number 1 (one) is to investigate whether people born between 1946 and 1964 are influenced by in-application advertisement on Facebook during their process of decision making prior to making a purchase.

Sub-problem number 2 (two) is to determine whether the effectiveness of in-application advertisements in Facebook influences the performance expectancy, effort expectancy and social expectancy of baby boomers therefore leading to purchasing motivation of this cohort.

1.4 Significance of the study

The study focuses on the importance of Facebook in-application advertisement and engagement habits of black male and female baby boomers with online marketing messages. Consumers actively partake in a range of online behaviours such as product research, recommendations and information sharing (Sabo, Kumar & Ramani 2015). There is an uptake of social media by senior citizens globally as a means to keep in touch with family, friends and peers (Lewis & Ariyachandra, 2011).

This study will provide a foundation to further explore the difference in purchasing behaviour of black male and female baby boomers and other generation cohorts and how the differences in online knowledge and behaviour plays a significant role in social class and ultimate purchase intent of South Africans.

The findings of the study are anticipated to help marketers to better align and develop marketing strategies and digital promotional plans that are better suited and understood by the growing black baby boomer cohort in South Africa. These insights will also assist marketing brand decision makers on how their brands can use online advertising to influence baby boomers' decision making. These insights will help in better communicating to the under-serviced black male and female baby boomer cohort in South Africa

1.5 Delimitations of the study

The outcomes of the study will be generalised to black male and female baby boomers residing in Johannesburg, who are between the ages of 54 to 74 years, across the black South African population and those who have active profiles on social media. This is limited to active Facebook profiles. The cohort for this research will be part of the sampling population across Johannesburg.

The paper explores South Africa's black baby boomer cohort's behaviour, with a key focus on their social influence, performance and effort expectancy, however the study is limited to the cohort within the Gauteng province. The paper will establish ways to improve marketers' and brands' approach in communicating to senior citizens on social media.

1.6 Definition of terms

- **Social media**

Derived from the social software movement, social media is described as a assortment of websites, services, and initiatives that support community building, involvement, and sharing (Junco, Heibergert, & Loken, 2010).

- **Online purchasing**

Online purchasing is summarised as a virtual platform or tool for shopping with no intermediary services involved in the process (Dhanapal, Vashu, & Subramaniam, 2015).

- **Facebook in-application advertisement**

Facebook in-application advertisement can summarised as advertisements created and placed by businesses on the Facebook site (Curran, Graham, & Temple, 2011).

- **Generational cohort**

A cluster of individuals who share comparable experiences and have mutual characteristics and opinions around these occurrences. Each cohort is associated with unique values and significances which continue throughout their lives (Pitta et al., 2012).

- **Baby Boomers**

A cohort of individuals born between the years 1946 and 1964. This includes people who are between 51 and 70 years old in 2016 (Parment, 2013).

- **Purchase intent**

This is a plan or desire to purchase goods and/or services (Mothersbaugh, Best, & Hawkins, 2007; Solomon, Russell-Bennett, & Previte, 2012).

- **Performance expectancy**

The level to which a person trusts that operating a system will assist him or her to gain benefits in job performance (Venkatesh, Morris, Davis, & Davis, 2003).

- **Effort expectancy**

The level of convenience and effortlessness perceived of using the information system (Venkatesh et al., 2003).

- **Social influence**

The extent to which an individual perceives that individuals of influence believes he or she must use a new information system (Venkatesh et al., 2003).

1.7 Assumptions

Various assumptions exist in identifying the fundamental bases of this study, and they are:

- It can be assumed that the black male and female baby boomers selected in Johannesburg are a reasonable representative of the South African black male and female market.
- All respondents will have an active social networking profile on Facebook.
- Respondents will be subjective in their responses considering that they will respond based on their own social media and online advertisement engagement experiences.

CHAPTER 2. LITERATURE REVIEW

2.1 Introduction

Latest technology and web-based tools have become a necessary everyday resources for the convenience and social enjoyment web-based platforms offer (Walsham, 2008).

Although the number of baby boomers is expected to decline, due to mortality, by 2056, the population of people who are 65 years old and older is forecasted to become greater than the population of those who are eighteen (18) years and younger (Colby & Ortman, 2014). There is a general belief that elderly citizens have not fully merged or comprehended the internet landscape due to little education or understanding of the internet as a whole (Ogawa, Inagaki, & Gondo, 2006).

The intention of this research is to investigate the influences that may impact baby boomers' buying behaviour and patterns when exposed to marketing messages on social media. Key factors to be discussed are perceived privacy, the web experience and level of interaction of the elderly on social media, the social norms imposed by society around baby boomers being on social media and the purchase intent of black male and female baby boomers when confronted with brand and product marketing messages on social media.

The discussions of the focus areas are: Unified theory of acceptance and use of technology (UTAUT), Generational cohort theory, Digital marketing communications and Consumer behaviour.

2.2 Unified theory of acceptance and use of technology (UTAUT)

Venkatesh et al. (2003) developed the UTAUT, as a comprehensive synthesis of prior technology acceptance research. Understanding usage of information systems is one of the most reliable string of information technology research (Sundaram, Schwarz, Jones, & Chin, 2007; Venkatesh, Davis, & Morris, 2007). The four constructs that encompass the UTAUT are performance expectancy, social influent, effort expectancy and facilitating conditions (Venkatesh, Thong, & Xu, 2012). These constructs have been adapted from UTAUT to the consumer technology adoption and usage. In addition, users' gender, age, experience and willingness to use form part of the moderating factors in UTAUT (K. H. Wang, Chen, & Chen, 2017). Previous research studies have discovered an adverse association between ageing and the prospect to accept new technology however Venkatesh et al (2000) considered age-related effects may have attributed to the age and the experiences of a cohort of persons in the study.

In this context, *performance expectancy* is defined as the extent to which making use of technology will deliver benefits to a consumer's ability to perform activities. *Social influence* is the level with which consumers regard people of importance in their lives' opinion on which technology to use while *effort expectancy* refers to level of simplicity linked with consumers use of technology, and facilitating conditions is defined as users' perceptions of the means and support at hand to project a behaviour (Venkatesh et al., 2012). Existing research shows that performance and social influence showed a degree of positively affecting behavioural intention while the impact of two additional constructs, *risk expectancy* and *credibility expectancy*, have been observed as being direct predecessors of intention to utilise, while the trust factor functioned as an indirect predecessor (J.-H. Lee & Song, 2013).

According to research findings by Venkatesh et al (2007) on UTAUT, social influence, performance and effort expectancy have an influence on behavioural intent to use technology, whereas the behavioural and facilitation conditions decide which technology to use. Gender, age and experience are noted as

individual variables that moderate various UTAUT relationships. (Venkatesh et al., 2007; Venkatesh et al., 2003; Venkatesh et al., 2012).

This study focuses on the following constructs as measures of the effectiveness of Facebook in-application advertisement on purchase intent of black Baby Boomers in South Africa: Performance and effort expectancy, and social influence.

2.2.1 *Performance expectancy*

A research study on implementation, by Hong et al (2008), revealed that performance expectancy is a significant factor in describing consumer behaviour, however research by Davis (1989) argued that the usefulness of a system can be explained at the level at which individuals hold the belief that new technology adoption will improve a tasks' performance. In depth research conducted on information systems and mobile commerce supports the significance of supposed usefulness on acceptance or intention to use (Davis, 1989; B. Kim, Choi, & Han, 2009; Kuo & Yen, 2009; Shin, 2009). Be that as it may, it is believed that perceived effectiveness has an impact on users intention to accept mobile business (Alkhunaizan & Love, 2012). Performance expectancy reveals performance improvements when users implement new technology (Alkhunaizan & Love, 2012). Prior research by Bhattacherjee (2001) verified the effectiveness of perceived usefulness on continued usage by individuals. When individuals form positive opinions towards mobile digital use, their usage will continue (Zhou, 2011).

For this variable, a performance expectancy scale was adapted from Gruzd et al., (2012); Hung et al., (2011) and Duffett (2015) with four (4) items. Respondents were asked Facebook in-application advertisement and performance expectancy based on the performance expectancy scale.

Hypotheses 1

H10: A positive relationship exists between Facebook in-application advertisement and performance expectancy.

H1A: A negative relationship exists between Facebook in-application advertisement and performance expectancy.

2.2.2 *Social influence*

The social influence variable can be shaped by relational engagement and society on a broad scale. Relational interaction helps amplify the specific value to the individual (Agarwal & Prasad, 1998; J. Lu, Yao, & Yu, 2005).

Social influence is regarded as an important element in innovation diffusion (J. Lu et al., 2005). Support from people of influence has an effect on what action a prospective adopter choses to take due to individuals adapting their attitudes, behaviours and beliefs to their societal context (Salancik & Pfeffer, 1978).

For this variable, a social influence scale was adapted from Im et al., (2011) with four (4) items. Respondents were asked about Facebook in-application advertisement and social influence based on the social influence scale.

Hypotheses 2

H20: Social influence positively impacts the effect of Facebook advertisement on purchase intent among black baby boomers.

H2A: Social influence negatively impacts the effect of Facebook advertisement on purchase intent among black baby boomers.

2.2.3 *Effort expectancy*

Once individuals invest effort into learning to use digital mobile then their satisfaction is not guaranteed (Alwahaishi & Snásel, 2013). This will in turn affect user satisfaction. If individuals hold the belief that digital mobile is easy to use, they will express a positive attitude towards mobile use because mobile services viewed on devices may be perceived as being complex and tedious due to physical restraints, such as challenges with entering information or small screen

display, associated with mobile commerce (Alkhunaizan & Love, 2012; Y. E. Lee & Benbasat, 2004).

For this variable, an effort expectancy scale was adapted from Chin et al., (1988); Davis et al., (1989); Im et al., (2011) and Thompson et al., (2005) with four (4) items. Respondents were asked about Facebook in-application advertisement and effort expectancy based on the effort expectancy scale.

Hypotheses 3

H30: A positive relationship exists between Facebook in-application advertisement and effort expectancy.

H3A: A negative relationship exists between Facebook in-application advertisement and effort expectancy.

2.3 Generational theory

Generations are not elective groups nor are they aware that they part of a belonging, in its place, generation belonging is based on the communal position of an age-group in historic time (Karisto, 2008; Kowske, Rasch, & Wiley, 2010). The theory of generation is vital because the movement of new and old generations, paired with past and social events, drive change which is described as a demographic metabolism (Kowske et al., 2010; Ryder, 1985). Shared experiences at significant development points contribute to distinctive qualities that outline and distinguish each generation. These unique qualities in turn influence conformist social forces and drive societal adjustment (Ryder, 1985).

A generational cohort consists of a set of persons who were born during an era and whose life courses correspond with each other (Parment, 2012). These people share similar life experiences and have unique qualities and characteristics centred around these experiences (Pitta et al., 2012).

These events and past experiences are a direct result of the events that occurred when a cohort was “coming of age” (Lissitsa & Kol, 2016). Values and certain

priorities which are formed during a particular cohort, may continue over the particular cohort's lifetime (Jackson, Stoel, & Brantley, 2011).

There are studies available (Schewe & Meredith, 2004) to illustrate the differences in how cohorts relate in various settings however research on how these cohorts relate to social media as their purchasing tool is scant.
Several identified sets of generational cohorts exist and have been summarised by Rosen 2011 and Yan 2006 as follows:

Matures/Silent Generation: This cohort consists of people who are born between 1900 and 1942. The main defining attribute of these members is their strong middle-age values. They are conformists who are conventional in their thinking and were focused more on marriage and raising families (Brosdahl & Carpenter, 2011).

Baby Boomers: Individuals born between the years 1943 and 1960. They were born after the World War, they are self-reliant and individualistic with sturdy interest in personal growth, self-fulfilment and have earning potential.

Generation X: People born between 1961 and 1981. This cohort consists of highly educated individuals who are interested in demystifying cultural icons, are very interested and have adapted to the internet while constantly finding ways to enrich the quality of their daily lives.

Net generation: This cohort, also referred to as Generation Y or millennials, are individuals born between 1982 and 1991. This cohort is driven by high sophistication in their shopping preferences and are highly consumption oriented.

iGeneration: The members in this cohort were born after 1991, they constantly want to stay connected with people and consume high volumes of information which they want at their fingertips. They are visual beings who are able to interpret and absorb information or content presented visually and virtually.

2.3.1 *Characteristics of each generational cohort*

In table 1 below is the five-generational cohorts that currently exist and have been summarised according to literature available on the subject matter.

Table 1: Characteristics of generational cohorts

	Matures/Silent	**Baby Boomers**	**Generation X**	**Net generation**	**iGeneration**
Year of birth	1900-1942	1943 – 1960	1961 – 1981	1982 – 1991	1992
Descriptors	Greatest generation	"Me" generation	Latchkey generations	Millennials	No majority race, dominant media or family unit
Distinctions	Commands control and respect. Self-sacrificing	Economically stabile Hard workers and have attained career success	Independent Sceptics	Hopeful Determined	High expectations, preferred bespoke items
Likes	Law abiding Family oriented Concerned with involvement in the community	High work ethic Responsibility	Require a work-life balance Multitaskers	Activists Latest technology Parents	Virtual communication technology Brand savvy
Dislikes	Wastefulness Technology	Laziness	Red tape/ bureaucracy	Slow adaptions	Failure Sadness

Source: (Howe & Strauss, 2007; Jackson et al., 2011; Rosen, 2011; Waldron, 2012).

2.3.2 *Baby Boomers*

Prior studies (Glass, 2007; Jr Longino, 2005) have classified baby boomers as individuals who were born post World War 2. This population of people are typically born between the year 1946 and 1964 and are sometimes referred to as the Golden Baby Boomers (GBB) (E. S. F. Nyemba, C. M. Mukwasi, S. Mhakure, S. Mosiane, & W. Chigona, 2011b; Pitta et al., 2012).

A generational group such as the baby boomers, comprises of a cohort of individuals who share similar historical and social experiences that shape their lives. There are distinguishable differences between one generation to another (Jurkiewicz, Massey Jr, & Brown, 1998). Markert (2004), however, recommends the use of a twenty (20) year generational incremental benchmark, thus defining baby boomers as people born between 1946 and 1966.

The emergence of baby boomers in the 1940s broke the shape of the modern life course. In 2003, people aged from sixty five (65) and over made up seventy three (73) million of the EU twenty five (25) countries' population compared with thirty eight (38) million in the year 1960 (Solomon et al., 2012). Baby boomers are profiled as a cohort that has dual-income households, increased job agility, reasonably high qualifications and are an influential consumer group (Loroz & Helgeson, 2013). Baby boomers have also been characterised as having individualistic qualities, and being competitive free agents who have strong self-fulfilment with interest in personal growth and demonstrate strong work ethic which has led to this group of people to become successful in their careers and attain economic security (Jackson et al., 2011).

In the 1950s, computer and information technology was a relatively unknown concept to the general population (Gilleard & Higgs, 2002). As the mature market is growing into an attractive market sector in the online social networking space, it is important for brands and marketers to correctly profile this group, as they possess the time and the discretionary income to fully engage with brands through social media (Lewis & Ariyachandra, 2011). Research shows that baby boomers are likely to make purchases once they have searched for the products and have been exposed to the items online (Goyal, 2017).

In the South African context, this cohort was exposed and lived through the Sharpville Massacres in 1960, the rise of the Bantu Education from 1948 to 1960, the Soweto uprising of 1976 and the banning of the Pan Africanist Congress (PAC) and the African National Congress (ANC) in the year 1960 (Jonck, Van der Walt, & Sobayeni, 2017).

According to the Statistics SA 2016 mid-year population report, people born between the year 1946 and 1964 are estimated to amount to five point four (5.4) million and eighth (8) per cent of the South African population, across all races, are made up of individuals who are sixty (60) years old and above, as represented in figure 1 below:

Black South Africans			
Age	**Male**	**Female**	**Total**
0-4	2 556 260	2 490 878	5 047 138
5-9	2 498 888	2 445 502	4 944 390
10-14	2 207 170	2 168 357	4 375 527
15-19	2 039 224	2 017 699	4 056 923
20-24	2 241 775	2 237 569	4 479 344
25-29	2 376 145	2 323 243	4 699 388
30-34	1 876 201	1 951 808	3 828 009
35-39	1 555 156	1 616 532	3 171 688
40-44	1 244 305	1 294 001	2 538 306
45-49	986 845	1 067 928	2 054 773
50-54	776 212	879 707	1 655 919
55-59	614 926	740 202	1 355 128
60-64	467 703	597 752	1 065 455
65-69	315 003	441 813	756 816
70-74	194 932	322 289	517 221
75-79	103 406	213 171	316 577
80+	65 048	182 231	247 279
	22 119 199	**22 990 682**	**45 109 881**

Figure 1: Mid-year population estimate by population group, age and sex. (Statistics SA, 2016)

There are studies available that predominately focus on millennials and their adaptation of social media, as future consumers, however Nyemba, et al, (2011) have highlighted how little is known about current and potential consumers from older generations.

2.3.3 *Characteristics of Baby Boomers*

The following characteristics of baby boomers have been recognised by Pitta et al., (2012), Jackson et al., (2011) and Ng, (2012) have been selected as distinct qualities that this cohort has:

Population size: It has been estimated that there are seventy-six (76) million baby boomers in the world. Statistics South Africa's 2016 latest data has stated and estimated that the baby boomer population in South Africa amounts to approximately five point four (5.4) million (Statistic SA, 2016)

Education and career: More educated than their predecessors, possess strong work ethic, work centric, goal orientated and generally competitive. Due to economic success of their time, this cohort did not struggle to find jobs after completing their education (Jonck et al., 2017).

Financial status: High job contribution which has led to security, stability and career success. They have disposable income and are generally shopping decision makers in their households, hence the interest in this consumer cohort for this study. According to the Effective Measure report on Generational Lifestyle 2017, in South Africa, this cohort can earn up to fifty thousand rand (R50 000) a month and 4% of respondents in the study shop online more than in the store because of the convenience and time-saving that online shopping offers.

Technology adaption level: Evidence exists to support the notion that older consumers show difficulty in comprehending new or complicated information which affects older consumers level of learning new technologies (Badowska et al., 2015). It must be noted that baby boomers are more technologically savvy than their predecessors which makes them an attractive segment to target using online marketing (Hawkins et al., 2013).

2.3.4 *Baby Boomers in South Africa*

According to Census 2016, the population size of South Africa is 55.9million and baby boomers make up 5.4million of that population.
The following cohort summaries have been highlighted in the generational lifestyle report regarding the South African baby boomer target population. The findings are a result of surveys conducted on the lifestyles of the different cohorts in South Africa (Effective Measure 2017):

Income: South African baby boomers can earn up to fifty thousand rand (R50 000) in monthly income, which is more than any other cohort
Online purchase: Baby boomers in South Africa commonly make software and electronics purchases online, however 26% of the surveyed sample reported to source travel and accommodation information online.

Purchase behaviour: Forty five percent (45%) of the cohort has declared that they only shop when required, and eighteen percent (18%) source for bargains

Media and Technology: Forty one percent (41%) of baby boomers showed familiarity and ease with using computers, phones and new technology. Another observation worth researching further is that one percent (1%) of the baby boomers survey indicated that they last accessed the internet four (4) to twelve (12) months before the survey, with six percent (6%) declaring that they last accessed the internet within the previous seven (7) days. Twenty six percent (26%) of baby boomers spend one (1) to two (2) hours a day accessing the internet and six percent (6%) spend their time on the internet being on social networking sites.

Online advertising perception: A study by Burst Media revealed that only 23% of South Africans between the ages of 55 and 64 feel that there is not enough online content focused on their age segment (Beneke et al., 2011).

2.4 Digital marketing and communications

Digital communication has radically evolved since the inception of the World Wide Web in 1989. Web-based information technology has moved from being a place where you purely search for information to a place where users are able to create content. The internet was developed with the sole purpose of conducting methodical research by the U.S departments of Defence (Cheung & Huang, 2005).

Since the implementation and acceptance of the web, the platform has impacted the lives of humans from all spheres and has impacted brands, shopping behaviour and social activities (Cheung & Huang, 2005). The internet has become a virtual platform that allows for sharing of content by users, online community realisations and extension (Suter, Alexander, & Kaplan, 2005). Online social networking activities can be described as an innovative virtual spaces that allows individuals to share information about themselves, create networks and maintain relationships with others (Lewis & Ariyachandra, 2011).

Social media, as a digital communication platform, is a virtual networking tool that allows and stimulates conversation and engagement on the internet. Known popular social media platforms are Facebook, MySpace, Twitter, Instagram and gaming sites (Lewis & Ariyachandra, 2011). This platform or tool transforms the internet into a dynamic and radical platform for technologically curated information and for social communication (Nyemba et al., 2011b).

Although the baby boomers are more likely to lose social contact and have less ability to physically visit friends, families or shopping malls due to retirement and other physical limitations, this group of individuals is a growing market segment in the online social networking space (Leist, 2013).

2.4.1 *Overview of social media platforms*

Social media networking platform are an eco-system of internet-based applications that are developed on the technology underpinnings of Web 2.0 which essentially allows for two-way trade of user generated content (UGC) (Tim,

2005). Social community tools such as Facebook, Twitter, Instagram, YouTube, MySpace, MSN spaces and blogs are available for users to share their photos, videos, express opinions, make friends and establish communities based on shared interests (Leung, 2013).

The first known virtual community sharing site, Six Degrees, was created in 1997 and it was a platform that permitted users to upload a profile of themselves and invite friends (Kietzmann, Hermkens, McCarthy, & Silvestre, 2011). Facebook was launched four (4) years later. The first blogging sites took off in 1999 thus creating a virtual networking pool that is still apparent today (Kietzmann et al., 2011).

Social networking sites are used for multiple reasons; however, the most common uses are sharing photos, uploading videos and audio files, instant messaging and sending emails.

The most prevalent social networking platforms are Facebook with almost 1.6 billion registered active users, followed by Instagram with 400 million registered active users then Twitter with 320 million registered active users and SnapChat with 200 million registered active users (Phua, Jin, & Kim, 2017).

Today, 11% of South Africans use their cellular phones to go online, with Facebook being popularly visited and consumed by 85% of mobile subscribers (Hutton, 2011).

2.4.2 *Social media literacy*

Baby boomers are often prone to limitations to process information as quickly as the younger generation do due to their age and some impairment. Limitations such as visual impediments and physical inabilities may prohibit the use of social media or the internet.

Previous research indicates that information technology acceptance in older age reveals functional anxiety, such as memory decline and age, and negative views towards the internet (B. Lee, Chen, & Hewitt, 2011). Studies have shown that online networking amongst senior citizens is largely used for instant messaging

and online discussions, with a small portion of this age group engaging in photo sharing or creating new content (Leist, 2013).

As technology and handset manufactures develop user friendly device applications for smartphones and tablets, the assumption is that the uptake of internet by baby boomers will see the of consumption of social media more rapidly in the future.

2.4.3 *Social media amongst baby boomers*

Baby boomers are a population that aspired to gain education, wealth and some social standing on community and society as a whole(Loroz & Helgeson, 2013). Most baby boomers go online to email, source hobby and retirement information, medical and health advice, weather updates and also just for leisure (Lewis & Ariyachandra, 2011). Other social beneficial elements of social media for baby boomers is the ability to stay connected to and with one's widespread network which is a solution for this cohort's social isolation (Nyemba et al., 2011b).

There are some baby boomers who still have difficulty transitioning to electronic communications platforms and simply do not have access to electronic devices (Leist, 2013). Senior citizens who are categorised as being resistant to change do adapt to new media and technology if they believe that they are appropriate and easy to navigate (Lewis & Ariyachandra, 2011).

Nyemba et al., (2011) noted that the non-adaption to social media by users and non-users is due to trust and safety. It's been noted that social media is perceived by baby boomers to be a time waster and this cohort does not understand where the younger generation finds time to participate on these platforms, highlighting trust and privacy as a reason for non-adaption of social media(E. S. F. Nyemba, C. Mukwasi, S. Mhakure, S. Mosiane, & W. Chigona, 2011a).

Numerous papers and studies have been conducted with a key focus on millennials and the iGeneration's Facebook(Chan, 2011) habits, however there is not enough research ,in the South African context, available that focuses on baby boomers.

2.4.4 *What is Facebook?*

The evolution of Web 2.0 along with the spurge of virtual communities has afforded an opportunity for people to learn and share their experiences online (Bonsón, Torres, Royo, & Flores, 2012).

Facebook is one of the first social networking platform to launch and gain popularity in 2004. Founded by Mark Zuckerberg, Facebook is a virtual platform that permits individuals to add family and peers, send inbox messages and to notify friends about themselves (Quan-Haase & Young, 2010). Facebook allows its members to create personal profiles where they can share information such as occupation, religious beliefs, political views, movies and music preferences (Hughes, Rowe, Batey, & Lee, 2012). Another functionality of Facebook is the ability to add and remove friends from your network and upon accepting a friend request, that particular friend has access to your wider network and timeline updates (Davenport, Bergman, Bergman, & Fearrington, 2014).

The initial objective of Facebook was to have a forum for college students. To this day, Facebook is still largely used by undergraduates (Tosun, 2012). Facebook is a popular network site which started off with five point five (5.5) million users in 2005 to two point zero (2.01) billion monthly active users in June 2017 (Facebook, 2017). The most famous social media network sites globally, ranked by active users is Facebook with two point ten (2.10) billion users followed by YouTube with one point five (1.5) billion and WhatsApp with one point two (1.2) billion (Statista, 2017).

Facebook remains the number one most popular social media tool in most countries, with China being an exception due to the site being banned there, thus not having a profile on Facebook might label anyone under the age of thirty five (35) years old as being technologically challenged (Patterson, 2012).

2.4.5 *Effectiveness of in-application Facebook advertisements*

Social media advertisements provide a new dimension to advertising, as it offers interactivity to users, particularly on Facebook (Dehghani & Tumer, 2015; Logan, Bright, & Gangadharbatla, 2012). Social networking site (SNS) advertising is essential online advertising which provides a different and unique experience for consumers, allowing consumers to actively interact with the advertisement, when compared to online banner advertising. Furthermore, social networking site advertising gives consumers an opportunity to like and share the content and advertisements they see on SNS with their friends (Logan et al., 2012).

Social media is considered as a platform that assists brands to gain awareness through available opportunities and possibilities (Dehghani & Tumer, 2015), a trusted source for brand messages(Logan et al., 2012), provided specific targeted content and advertising for brands (Patterson, 2012) and users are able to share experiences and opinions about product brands their products and services in real time (Sabate, Berbegal-Mirabent, Cañabate, & Lebherz, 2014).
In-app advertisement is a popular feature on SNS platforms for brands to use for marketing their brands. Facebook has added features which allow brands to use Facebook to reach their audiences in a different way and also allows Facebook to generate revenue through this form of advertising (K. K. Roberts, 2010). Facebook conducts its targeted marketing approach by observing user profiles and collecting data on demographics, locations and interests then displaying relevant advertisement on the relevant user's page. This is a segment targeted approach Facebook uses (Al Qudah, Cristea, Shi, Al-Sayyed, & Obeidah, 2014).

Findings by Muntinga et al (2011) suggest social media users contribute to the brand and its online presence by engaging in branded marketing related activities. As a result, the brand interaction increases consumer engagement with these messages. It is also noted that online media engagements increased the effectiveness of advertisements, using attitudinal and behavioural intent measures (Logan et al., 2012).

It is worth noting that research findings from previous studies have found that at times, online advertisement has very little effect on consumers because online users fixate their eyes on an online advertisement and almost always forget most advertisements they've viewed (Kuisma, Simola, Uusitalo, & Öörni, 2010). Another study noted that very few people actually click on banner advertisements and the percentage of people who actually click on banner advertisement is on a steady decline (Curran et al., 2011).

2.5 Consumer behaviour

Consumer behaviour is summarised as the analysis of persons, groups or organisations and the processes they follow in order to choose, secure, utilise and dispose of goods and or services to fulfil their needs as well as influences these processes have on the consumers and society (Hawkins et al., 2013). Traditionally, consumer behaviour illustrates how consumers make decisions for products and services from need recognitions to the disengagement stage (Blackwell, Miniard, & Engel, 2006).

According to Kotler (2012), not all consumer behaviour stages and steps will be followed to precision for all goods and services. As a consumer becomes self-assured with the goods or services, they might bypass some stages or steps and go directly to the purchasing decision stage.

Kardes et al. (2011) have noted the following five (5) stages in the customer purchasing decision process which are: Need recognition, pre-purchase search, evaluation of alternatives, purchase behaviour and post-purchase evaluation.

Hawkins and Mothersbaugh (2010) further state that internal and external factors manifest consumers' desires and needs which leads consumers to make a purchase consideration. As consumers are faced with relevant situations, the consumer decision making process is triggered, and once this process starts, the experiences and acquisitions it produces influence the consumers self-concept and their lifestyle by triggering the internal and external characteristics (Hawkins et al., 2013).

The consumer decision process model (CDP) illustrates that external influences (such as culture, demographic, family) and internal influences (such as

perceptions, learning, memory emotions) are factors that influence some consumers' purchasing decision.

The key focus will be on motivation as an attribute in the internal influences. Motivation is a reason for a behaviour. Motive is described as a construct representing an unobserved inner force that stimulates and compels a behavioural response to a specific direction to that response (Hawkins et al., 2013).

The SRI Consulting Business Intelligence VALS (values and lifestyles) programme developed a system that classifies adults into eight distinct consumer related segments. The values and lifestyles programme is based on enduring psychological characteristics that correlate with purchase habits. Respondents are classified according to primary motivations which can be classified as *ideal motivations.* These consumers are guided in their choices by their beliefs rather than feelings or desire for social approval. *Achievements motivations*: These consumers strive for clear social position and are persuaded by their actions, approvals or opinions of other and lastly, *self-expression motivation,* which relates to consumers who are action-orientated and express their individuality through their choices such as purchasing experiences (Hawkins et al., 2013; Lin, 2002).

Motive is an internal driver that a consumer experiences when faced with a desire to satisfy a need. Maslow's hierarchy of needs explains that humans have five basic needs and it is those needs that drive motivations (Maslow, 1943).

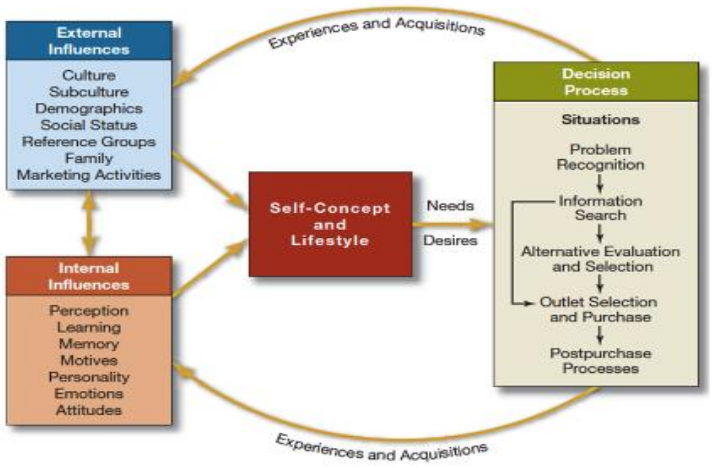
Human beings needs are classified, in theory, according to the theory of *human motivates*, which classifies the basic needs of humans in hierarchy, and a theory of *human motivations*, which relates to general behaviour of humans (Maslow, 1943; Wahba & Bridwell, 1976).

Early versions of Maslow's hierarchy of needs encompassed five motivations needs being physiological, safety, social, esteem and self-actualisation, and are often depicted as hierarchal levels within a pyramid (Maslow, 1943; S. McLeod, 2007). Maslow also distinguished his five (5) categories by classifying some of the needs as deficiency needs and others as growth needs. The needs for safety

and feelings of belonging, love and respect for others were classified as deficits (Maslow, 1955).

Maslow applied two concepts that linked needs to behaviour, these being deprivations and gratification. Maslow further concluded that depriving or dissatisfaction of a dominant needs that has high pre-potency leads to the dominance of this need over a human's personality. Once the dominant need has been satisfied, relative gratification of the said need submerges it and then activates the next higher need on the hierarchy pyramid (Maslow, 1943; Wahba & Bridwell, 1976).

Hawkins and Mothersbaugh (2010) consumer decision process model can be seen in figure 2 below.



Consumer Decision Process Model (Hawkins & Mothersbaugh, 2010, p.27)

Figure 2: Consumer behaviour process by Hawkins & Mothersbaugh consumer behaviour model

2.5.1 *Purchase intent*

Purchase intent refers to the mental state that is reflective of a consumers' decision to acquire goods or services in the immediate future (Nirmala & Dewi, 2011). Purchase intention is further described as a combination of consumers' interest in a product and possibly buying it. Due to multiple studies on the subject, purchase intention relates to attitude and inclination towards a brand or product

so that evaluating purchase intention assumes consumers' future behaviour based on their attitudes (A. J. Kim & Ko, 2012).

Consumers vary in the amount of time and sort of effort they put into shopping and these differences are critical for marketers to understand.
There are drivers and motives that influence consumers to make a purchase decision. Manifest motives are those that cause a certain behaviour and consumers will freely admitted while latent motives such as access to money, lifestyle and feelings are some purchase motives that influences consumers' purchasing behaviour (Hawkins et al., 2013).
Many social media sites display a plethora of advertisements such as digital web banners, behavioural advertisements (these are advertisements that are sent to users based on their web behaviour) and demographic–based advertisements which are profile-based advertisements that are determined by users' age, gender and marital status (O'Keeffe & Clarke-Pearson, 2011).

Research by Akar & Nasir (2015) established that consumers who purchase more items online are price sensitive. Those consumers who are loyal to websites preferred online shopping more and those people who spent more time online bought more items. It has been noted in research that in general, Generation Y are the highest contributor of online shopping, followed by Generation X and Baby Boomers which further cements the fact that Generation Y is a compelling component of online purchasing behaviour (Goyal, 2017).

The baby boomer market is a rapidly growing market in the online eco-system (Lewis & Ariyachandra, 2011). It is important for brands and marketers to identify the online buying intentions, nature and criteria of boomers effectively as digital savvy seniors not only have time to source information on the internet but they poses discretionary income to fully utilise tools and technology offered on digital platforms to inform their purchase intents.

2.5.2 *Consumerism*

The invention of the television, and consumption of the content on television, suggests that baby boomers are profoundly affected by television (J. A. Roberts & Manolis, 2000).

In addition to the invention of the internet, there has been an increase in the exposure of multiple marketing messages and this has created very consumer-oriented, wiser and consumer savvy generation. Baby boomers are viewed as a generation that is more likely to spend time shopping compared to other cohort (J. A. Roberts & Manolis, 2000). This is largely due to the disposable income and time they must research and compare products both in-store and on the internet. Connected baby boomers are prone to using social networks to investigate and compare different products and services online (Lewis & Ariyachandra, 2011).
External influences such as marketing activities and internal influences such as personality and learning contribute to how we make final product and brand preference and purchase decisions (Mothersbaugh et al., 2007). Consumer decision behaviour is influenced by opinions and personal experiences by family and friends. Product information and referrals are conveyed by word of mouth rather than by television and radio advertisements, print media and billboards and to an extent even company websites (Kotler & Armstrong, 2010; Mothersbaugh et al., 2007).
According to Mothersbuagh et al. (2007), there are two influences consumers are exposed to prior to acknowledging a need to purchase and making the actual final purchase. As depicted in Figure 2 above, these influences are external and internal influences and for this study, the paper will focus on external influences that encompass culture, demographics, social status, peers, family and marketing activities. This is to demonstrate the importance of external influences, as a strong component, to consumers' purchase behaviour and choices.

With that said, the rise of social media platforms such as Facebook has created a virtual consumption communities where members share views and product preferences (Solomon et al., 2012). Brands and marketers need to effortlessly go where consumers are. The web has become a community where marketers are

able to start conversations with consumers and offer them exactly what they want (Kotler & Armstrong, 2010).

When a brand outperforms consumers' expectations, it may be rewarded with repeat purchases and long-term customer value by consumers towards a brand and this experience is easily shared amongst peers on social networking platforms (Solomon et al., 2012).

Consumerism is defined as a societal and economic movement that encourages the purchase of products in great volumes (Papasolomou, 2014). Consumerism in marketing is concerned with the promotion and protection of the interest of consumers.

The rise of consumerism has encouraged companies and brands to improve their service to consumers. Baby boomers are a community and consumerists and refer their peers to products or services they have personally used. In this light, brands need to communicate with this generation and segment in a language and medium that they understand, bearing in mind that this segment is consumption influential.

2.5.3 *Online purchase intent*

Online shopping may be described a digital platform that allows purchasers to purchase products or amenities over the internet using a web-based browser (Schramm-Klein, Swoboda, & Morschett, 2007).

A Pan African E-Commerce initiative adopted the European Commission definition of electronic commerce as a method of undertaking business electronically which is based on transmitting data, including texts, sounds and videos. This includes electronically trading goods and service, the online distribution of digitised content, electronic money transfers, trading of shares, direct consumer marketing and post-sale service (Jobodwana, 2009). Businesses continue to invest in electronic commerce applications while having to assess and maintain the success of their electronic commercial systems(Brown & Jayakody, 2008).

Research exists that examines e-commerce in developed countries (García-Murillo, 2004), however not enough research has put emphasis on acceptance and dissemination of electronic commerce in developing countries(Uzoka, Shemi, & Seleka, 2007). Diffusion of innovation and planned behaviour theories have been applied to e-commerce acceptance in developed countries with attitudinal issues being thought to play a pivotal role in Africa with regards to e-commerce adoption (Ajzen & Fishbein, 1975; Rogers, 1983; Uzoka et al., 2007). Fishbein et al, 1975 describes attitude as a person's optimistic or undesirable feelings about executing targeted behaviour. This is related to behavioural intentions since people form their intent to execute behaviours towards that which they recognise to affect them positively.

Based on the diffusion of innovations theory, it is suggested that the different attitudinal beliefs towards invention can be measured using five (5) perceived attributes being relative advantage, compatibility, complexity, trial and observability (Rogers, 1983).

B2C (business to consumers) continues to grow in developing emerging markets which has resulted in an increase in the global community of online shoppers (Cyr & Bonanni, 2004; Van Slyke, Belanger, & Comunale, 2004). South Africa is often characterised as being underdeveloped and lagging behind its European counterparts, however online retail shows a continuing trend, having maintained an above growth rate of 20% since the turn of the century (World Wide Worx, 2016 report).

Consumers have now been transformed into computer users who perform all traditional functions on a computer whilst interacting with a software system i.e.: business website (Koufaris, 2002). Koufaris et al (2002) further states the physical presence of a computer has been converted into virtual stores through implementing information technology practices. A web factor such as search engines, hierarchical classifications and intelligent agents allow customers to have high level of convenience and control (Koufaris & Ajit Kambil, 2001).

Social commerce is a new age phenomenon which has evolved rapidly. It refers to the distribution of electronic based commerce properties, activities and transactions through social networking environment and technologies. It is also regarded as the new evolution in commerce. Social commerce can be considered

a subsection of electronic commerce that includes the use of social technologies to assist electronic commerce transactions and activities(B. Lu, Fan, & Zhou, 2016).

Traditional e-business focuses on business objectives, however social commerce is more oriented towards socially engaging goals such as networking, collaborations and sharing of information with secondary attention on purchasing (C. Wang & Zhang, 2012). Online shoppers can get access to social information and expertise to support them in their purchasing decision making process, deep understanding of their purchases and making informed decisions (Dennison, Bourdage-Braun, & Chetuparambil, 2009). High levels of interaction and engagement on Facebook have positive correlation to purchase intention and favourable attitudes towards a brand (Duffett, 2015).
This study will focus on two components of the consumer decision process model (Mothersbaugh et al., 2007) with regards to external and influences which affect purchase decisions in terms of social media experience, preference and online buying influences.

For this variable, an effort expectancy scale was adapted from Shim et al., (2001) with three (3) items. Respondents of the survey were asked about their purchase intents once they have viewed an advertisement on Facebook

Hypotheses 4

H40: Performance expectancy has a positive impact on purchase intent among black baby boomers.

H4A: Performance expectancy has a negative impact on purchase intent among black baby boomers.

And

Hypotheses 5

H50: Effort expectancy has a positive effect on purchase intent among black baby boomers.

H5A: Effort expectancy has a negative effect on purchase intent among black baby boomers.

2.5.4 *Social norms*

Social norms theory refers to rules and codes of conduct and behaviour within a group or community that its culturally and societally normal (Kiesler, Siegel, & McGuire, 1984). Social influence further described as the level to which consumers perceive that their peers, including close associates, believe they ought to use a certain technology (Hsu & Lin, 2016; Venkatesh et al., 2012).
The adaptation of social media into daily lives has been a gradual process since inception. Social media is now a normal aspect of individual's lives and as such users tend to be influenced to adopt new technology in their lives to not only follow society but to also benefit from the effects of social networking (Lewis & Ariyachandra, 2011).
Senior citizens are more likely to embrace social networks when referred to by people they trust, such as Peers and family, to accept this new technology (Lewis & Ariyachandra, 2011).

Marketers and brands need to understand the motives of the different market segments and understand the segments' online behaviour patterns. They have an opportunity to include digital communications platforms, which are target specific, in marketing efforts, especially in the baby boomer market, that is becoming technologically savvy.

2.6 Conceptual model and hypothesis summary

The study tested the relationships between Facebook in-application advertisement effectiveness on performance expectancy, social influence and effort expectancy on purchase intent of baby boomers. The below conceptual framework in Figure 3 presents the hypothesised constructs tested in this study.

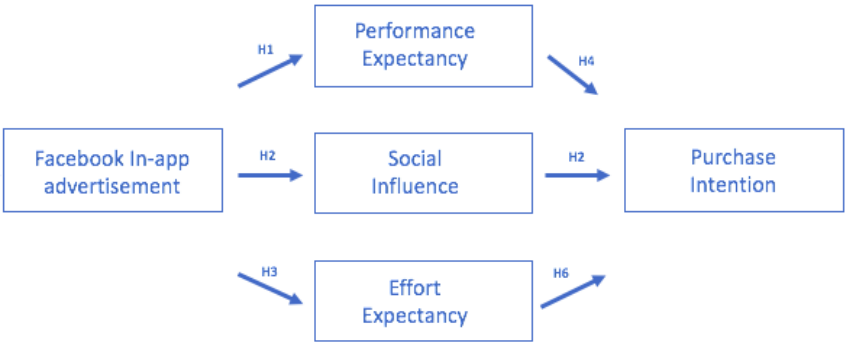


Figure 3: A conceptual model of the effectiveness of in-application advertisement on Facebook on the purchase intention of baby boomers

2.6.1 *Summary of tested Hypotheses*

The following proposed hypotheses are formulated based on the above illustrated model:

H10: A positive relationship exists between Facebook in-application advertisement and performance expectancy.

H1A: A negative relationship exists between Facebook in-application advertisement and performance expectancy.

H20: Social influence positively impacts the effect of Facebook advertisement on purchase intent among black baby boomers.

H2A: Social influence negatively impacts the effect of Facebook advertisement on purchase intent among black baby boomers.

H30: There is a positive relationship between Facebook in-application advertisement and effort expectancy.

H3A: There is a negative relationship between Facebook in-application advertisement and effort expectancy.

H40: Performance expectancy has a positive impact on purchase intent among black baby boomers.

H4A: Performance expectancy has a negative impact on purchase intent among black baby boomers.

H50: Effort expectancy has a positive effect on purchase intent among black baby boomers.

H5A: Effort expectancy has a negative effect on purchase intent among black baby boomers.

2.7 Conclusion of Literature Review

The discussion in the literature provides a wide indication of the multiple instruments used to interrogate and explore reasons why baby boomers use social media platforms and tools as a source of information and remaining in contact with family, friends and peers. The paper also explores the baby boomers' web experiences, especially in the rapidly changing innovative times we live in, and the purchase intent of elders once they see brand and marketing messages on social media.

The literature suggests that baby boomers have interest in becoming more knowledgeable in all the technology platforms and devices in the market. Further, from a South African perspective, it would be interesting to assess if the above-mentioned key factors do indeed influence the purchase intent of black baby boomers. This is explored further in the next chapter.

CHAPTER 3. RESEARCH METHODOLOGY

Research methodology encompasses various important factors that a researcher needs to be mindful of when undertaking research, for instance, the approach of the research, data collection and data analysis techniques (Collis & Hussey, 2013). Research can be described as a process of investigation that leads to new insights and/or solves problems effectively (Bryman, Becker, & Ferguson, 2012).

The literature review has elaborated on the influence and effect of social media in South Africa however further studies on the impact of social media adverting on the purchase intent of baby boomers requires further research while considering the hypotheses discussed.

This chapter will address the research methodology adopted and approach applied in collecting data. A further investigation on sampling strategies, research instruments and data collection techniques will be discussed.

3.1 Research methodology /paradigm

Research can be carried out applying either quantitative research or qualitative research or by using mixed approaches (Bryman et al., 2012).

This research will attempt to explore and elaborate the quantitative method applied, namely, the positivism paradigm and its relevance to the research on the effect of social media on consumer related purchasing behaviour of the baby boomers. Quantitative research focuses on precise measurement. In business research, the measurements are usually consumer behaviour, attitudes, knowledge and opinions. It is also concerned with concerned with testing objective theories and examining relationships between variables (D Cooper & P Schindler, 2014; Creswell, 2013) Positivism is a quantitative approach that establishes the relationship between variables in order to provide an explanation and also provide measurement, replication and generalisation (Bryman et al., 2012).

Quantitative research in its nature takes a view of social reality as an external impartial reality and includes practices and norms of natural scientific model and of positivism in particular (Bryman & Bell, 2015). The positivism paradigm is

concerned with finding true knowledge of explicit phenomena and correlation between them. This paradigm is concerned with gaining objective knowledge using scientific methods of enquiry. Common methods in this paradigm are surveys and experiments that require quantitative data (Collis & Hussey, 2013).
While considering that the study will explain the relation between digital communications to the purchase intent of baby boomers, the quantitative study will assist in identifying the associations that exist between these variables (Bryman et al., 2012).
Fietkiewics, Kaja, Lins (2016), Lewis, Ariyachandra (2011) and Beneke, Frey, Chapman, Mashaba, & Howie, (2011) used similar quantitative research strategies to examine the effects and influence of social media on purchase intent in the baby boomer cohort.

Fietkiewics et al (2016) conducted research to determine inter-cohort dissimilarities in social media usage and the motivation for particular social media platforms. The purpose of the study was to determine the significance of the differences between Generation Y, Generation X and Baby boomers in terms of their usage of social media. A quantitative strategy was applied in the study to assess various elements in this generational cohort. The benefit of applying a quantitative research strategy in this study is that you can collect data using quantitative methods such as interviews and questionnaires in a quick manner and the data collected can be analysed using statistics software. The study adopted a reliable and validated T-test statistical examination that is most commonly used to test two differing populations and/or samples assuming the normal distribution is unknown and sample sizes are small (Fietkiewicz, Lins, Baran, & Stock, 2016).
Loroz & Helgeson (2013) lead an exploratory research to examine two large generational cohorts for probable key differences that managers may find useful in adequately segmenting and targeting the market and the appropriate advertising platforms to use. This study used a quantitative strategy to observe variables in their social setting. Quantitative research is concerned with measuring the precise count of some behavioural patterns, knowledge, opinions and attitudes (D Cooper & P Schindler, 2014). This was used to assess value orientations, differences in behaviours and responses to various advertising

appeals in between the two cohorts. The benefits of this approach to the study is that it provides measurable results from a comparative study of two cohorts on their attitudes towards advertisements as opposed to a general study of the field. The findings offer insights into the characteristics of baby boomers' attitudes towards advertising when compared to another cohort.

3.2 Research Design

Bryman (2012) defines research design as the provision of a guideline that is stipulated in the evaluation, collections and analysis of data. Research design is described as a plan and structure of exploration developed to acquire responses to research questions. This includes an outline of the plan of action that the research will take from conceptualising and writing the hypotheses and its operational implications to the final analysis of data (D Cooper & P Schindler, 2014). According to Becker (2012), there are five (5) types of research designs namely comparative design, case study, experimental design, longitudinal and cross sectional design (Collis & Hussey, 2013; D Cooper & P Schindler, 2014).

This study adopted a cross-sectional design that observes and analyses' data gathered from a population (black female baby boomers in South Africa) and was carried out once and represents a glimpse of one point in time.
Cross-section design, also referred to as survey design, is concerned with the gathering of data of more than one incident at a particular point in time in order to collect quantitative or qualitative data containing more than two variables which will be assessed for similarities or uniformity (Bryman, 2012). This research approach adopted the identified independent (social media, web experiences, perceived privacy and social norms) and dependant (purchase intent) variable to test the influences that occur between them. This was carried out once as this represents the desired snapshot of a single point in time (D Cooper & P Schindler, 2014).

The research design applied by Loroz & Helgeson (2013) on the study of baby boomers and comparing their advertising appeals to those of a younger cohort was a cross-sectional design. The objective of this design is to explore similarities

and differences in value with regards to consumer behavioural habits and responsible consumption. This design was used to expedite the initial considerations of generational dissimilarities in attitudes to a wide set of appeal types. The benefit of this design was that specific cohorts and their opposing or similar habits were analysed across various behaivour points. The benefit from this study is that it conducts direct comparison of attitudes towards specific advertising mediums as opposed to one medium. This will allow the study to develop techniques that allow causal inferences to be made. It will also make allowance for a longitudinal study to be conducted should the characteristics and behaivour of this cohort change over time and require ongoing research.

A similar study by Beneke et al., (2011) applied the same design with an aim of gaining global perspective of the mature market through literature in South Africa. The rationale was to examine South Africa's mature market by conducting an empirical analysis of the South African mature market using different variables in a cross-sectional study. This will provide valuable analysis through research derived from lifestyle data. The benefit of this design is that the different variables, when used in conjunction, appear to be a differentiator of the mature market in South Africa. Adopting this design will assist in assessing and making comparison to two variables namely: Preferred purchasing engagement platform – in-store or online and level on internet usage knowledge – basic or interactive.

The findings will provide guidelines in assessing the black female segment and will provide a foundation and benchmark to conduct an in-depth study of this unique cohort. Mature ddults over the age of 50 years use the internet, amongst other things, to strengthen their social network (Hogeboom, McDermott, Perrin, Osman, & Bell-Ellison, 2010). The design applied in this study is cross-sectional and this is because the measures applied were drawn from an existing base. The benefits of a cross-sectional study is that longitudinal questioning about past attitudes, history and forecasted expectations can be revealed in cross-sectional without the constraints of budgets and times experienced in an study over a long period as is the case in this study.

3.3 Population and sample

3.3.1 *Population*

Target population comprises of people, events or records that possess the desired information and are able to respond to the measurement questions (D Cooper & P Schindler, 2014). Bryman (2012) states a population as being a universe of components that the sample of the intended research will be selected from. Target population can be defined once a researcher has drawn and answered important questions about the characteristics of the population (Zikmund, Babin, Carr, & Griffin, 2013).

Studies by Loroz and Helgeson (2013) followed baby boomers as their target population. The aim was to empirically compare the psychosomatic profiles and advertising appeal effectiveness across two different population groups. The selected participants of these target populations were drawn from a single, religiously affiliated, private university and were of Caucasian descent. The baby boomer population reported higher household income and higher educational achievements than the population at large.

The baby boomer population was found to have high awareness and possessed equally high responsible consumption. This essentially means baby boomers' values include the scope and nature of their consumption behaviours and the affiliated social, economic and environmental impact these have on the broader community. This cohort was also more religious and less materialistic compared to Generation Y.

The advantage derived from this target population is that both cohorts represent the highest and largest generational cohorts in the United State and hold market influence and the highest disposable income and purchase decision-making responsibilities in their household. Baby boomer lifestyles have a large and positive impact on the market due to this cohort's dual income within the households, increase job mobility, high education levels and amplified focus on health.

The population of baby boomers was selected particularly for the noticeable and compensatory consumption practices, making this cohort the predecessors of

modernised consumerism. The findings received from this study will guide in deriving a more South African analysis and provide necessarily comparative data to assist in formulating correct hypotheses.

Studies by Lewis and Ariyachandra (2010) also studied the baby boomer generation. The purpose of the study is to assess the digital literacy of baby boomers and their uptake regarding digital media and its impact on their daily lives. The rationale of selecting this target population is that literature presents circumstantial stories and assumption of the occurrence of social networking on senior adults as an integral cohort in society that would influence electronic commerce. The senior adult population is growing into a large cohort in the online social marketing space. It has become an important aspect to critically define the nature and characteristics of this cohort as they possess disposable income and the desire to be part of the electronic commerce eco-system for both purchase and social purposes. Digitally knowledgeable seniors have the time and the discretionary resources to copiously use electronic tools offered through online social platforms. The most common use of electronic platforms by seniors is to stay in touch with family and peers; this is because this cohort realises that physical disparities and retirement from formal employment affect their social ties. As organisations, such as retail stores, move towards offering digital shopping experiences, wired baby boomers are able to use these platforms to investigate and compare products and services as well as conduct a full shopping cycle on their mobile cellphones and tablets. The findings provide a base to further interrogate the electronic landscape in the black male and female segment in South Africa.

Leach, Phillipson, Biggs and Money (2013) focused their study on the baby boomer segment. The aim of the study was to explore generational narratives emerging between first wave boomers in relation to population and consumption changes over the post-war period. The rationale of selecting this cohort was that baby boomers experienced mass consumption in the 1950s and 1960s and are thus viewed as the “eager to reap the benefits” population group who are seen as transforming consumer behaviour and adjusting to innovation and social changes.

The rationale is that baby boomers have passed through several political, economic, social and cultural milestones on issues relating to consumptions and lifestyle. The narrative, from the study, presumes that baby boomers are a distinct group in social, cultural and economic terms and these insights will help derive a more South Africa-specific narrative regarding the purchase intent of black male and female baby boomers in the South African context.

It is not viable to gather data from the entire baby boomer population in South Africa; as a result, this study will incorporate the collection of data from black male and females in the baby boomer cohort in Johannesburg to make an informed conclusion on the impact and influence of the social media on purchase intent of black male and female baby boomers in South Africa.

3.3.2 *Sampling frame and size*

The sample frame and study for this study consists of baby boomers who make up the South African population. The age of the population is all adults that were born between 1946 and 1964 and are either in retirement or contemplating it. The gender selection is proportionally selected to allow an equal representation of gender population in this target market. The sample population targeted for this study is all baby boomers that have access to and use social media, particularly Facebook.

The sample size for the study is 235 and this is adequate to assemble an ideal sample size. The sample size is adequate to test the relationship between the variables using structural Equation Modelling and the findings were used for data analysis and interpretation (Bryman & Hardy, 2004).

3.3.3 *Sampling method*

A sample is referred to as a small group of cases that a researcher selects from a larger group and uses to generalise a population (Neuman, 2013). An appropriate sampling method to be employed should show fairness and unbiased factors for the scientific research to be met (Cooper & Schindler, 2001b; DR Cooper & PS Schindler, 2014). This study adopted the probability random

sampling technique approach, as this approach allows the population an equal and fair opportunity to be selected. This ideology of probability stems from the likelihood that a certain event may or may not happen. This element is important in sampling as it enables the research to use data in the cohort to extract similarities about the targeted population from which the sample was chosen(Creswell & Creswell, 2017). A total sample of 235 respondents was received for purposes of this study.

3.3.4 *Sampling of respondents*

The sampling profile of respondents for this study is:
Age: Respondents who are born between 1946 and 1964, falling under the baby boomer generational cohort.
Gender and race: Males and females. All races represented in South Africa
Geographic region: Respondents must reside in Johannesburg, South Africa.
Social media usage: Respondents must have an active Facebook account.

3.4 The research instrument

Interviews or questionnaires used in a formal or semi-formal approach are examples of research data collection instruments. These instruments can be used to investigate what the researcher intends to investigate (Bryman, 2012). Creswell (2014) states that a tool used, for ultimate use, by the researcher to collect data required to respond to questions, whether in a form of pre-set questions or defined checklist, is also referred to as a collection method.

Zikmund et al (2010) further elaborates that a collection method technique in which a sample is interviewed or their behaviour is observed and described in one some way is also a data collection method. Two types of data collection instruments are observation schedules and interview schedules.
This study will utilise self-administrated questionnaires to be completed by the sample. Self-administrated questionnaires can be presented in postal surveys, email and internet surveys and group administered questionnaire.

Benefits of self-administered questionnaires are:

- There is anonymity, the respondent will be assured of their complete anonymity and privacy, as they will have no interviewer to influence their responses
- A large amount of surveys can be distributed at once and thus creating greater efficiency
- The cost saving factor means no travel time for face-to-face interviews is required
- Minimum error as the respondents' completion of the questionnaire is not assisted

Additional benefits of this type of research instrument is that they are quick to administer, no biased answers due to the absence of an interviewer and convenient for respondents (Collis & Hussey, 2013).

Bryamn (2012) states that research data collection instruments are used to discover what the research requires discovering. This is a tool a researcher uses in the processes of collecting data and answering research questions (Creswell, 2013). This can be achieved by interviewing respondents in some form or the research can observe the behaviour of the respondent.

The three structures of research data collection instruments are unstructured, semi-structured and fully structured. The study will follow a structured collection method.

Studies conducted by Lewis and Ariyachandra (2010) followed a fully structured method. The aim was to collect data from seniors with a focus on their social networking ability. The rationale was that the initial phase will run a pilot study then followed by fully structured survey instrument which was rolled out in the second study. The advantage was that it tested the overall model and was combined with theory related to online social media. The insights derived will provide ground data and guidance on similar studies on South African networking skills and interest.

Loroz and Helgeson (2013) followed a similar method. The aim was to collect data from baby boomers and their offspring in a school setting. The rationale was

that baby boomers would complete a survey provided to them at home and return it through post mail. The advantage of this mode is that it ensures with absolute surety that completion of the survey is not influenced by the presence of a researcher with probing questions. The benefits are that the findings will be unique in the similarities and dissimilarities of baby boomers and their babies.
Two methods were utilised to collect data for the study. In the first method, the respondents will be requested to log on to their Facebook accounts and directed to a Vodacom in-application advertisement. Together with the questionnaire, they will be asked questions pertaining for the Vodacom Mega-U branded advertisement while they are actively viewing and interacting with the advertisement on Facebook. The advantage of this method is that respondents can answer the questionnaire while viewing and interacting with the advertisements and while they can still remember the advertisement.

In the second method, questionnaires will have the campaign storyboard embedded and attached to each question. The storyboard will demonstrate and replicate what one would ordinarily find on the Facebook in-application in method one. This will help in assessing brand message recall and campaign association.

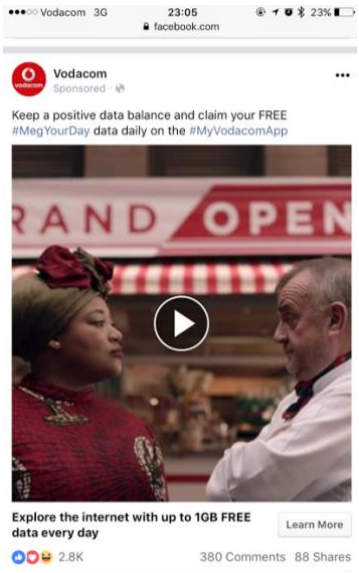


Figure 4: Mega-U in-application advertisement as seen on Facebook

The barrier to this method is the length of the questions and ability to respond truthfully and quickly.

Both methods will contain the same questions and same visuals and imagery.
The research instrument will be made up of multi choice, ranking and closed questions. There will be questions where the responded is expected to select one answer from a selection of two.
Rating scale questions where each respondent will be provided with specific dimensions to answer the specific questions. The respondent will be required to rate an opinion from a specified selection of answers and the seven (7) Lickert scale question allows the respondent to provide their opinion to a certain degree.

The questionnaire will be split according to two sections. Section one (1) focuses on demographic questions and section two (2) focuses on the research objectives.

3.5 Procedure for data collection

Bryman (2012) states that the collection of data and the storage thereof is a process of gathering data from a sample for the specified research questions to be responded. The specification of the task and the parameters of how, where, who, when and what in the details of the task (D Cooper & P Schindler, 2014). Information can be collected in a structured or unstructured fashion and through observations, interviews and documents for recording of the information (Creswell, 2013).
There are four modes of data collection, namely participant observations, interviews, focus groups and documents. This study will apply the interviews and questionnaire collection modes. Interview questions allow the researcher to observe and record non-verbal and well as verbal behaviours that the respondents display (D Cooper & P Schindler, 2014).
Web-based questionnaires can be used to collect data. This is a quick and easy survey that can be administered online and is computerised way that allows visual manipulation and flexibly to change the design online (Creswell, 2013).
Studies by Loroz and Helgeson (2013) followed a questionnaire data collection method. The aim was to allow for collected data that can be directly compared to two cohorts in a single study. The rationale was that the two generations surveyed for similarities were able to take home the surveys and these were supplemented

by face-to-face surveys. The benefit of this is its convenience. The benefit of this to the study is that the survey could measure the appeal and effectiveness of two different cohorts.

Jumar and Lim (2008) conducted a study that followed a survey questionnaire mode. The aims were to collect and measure data from two opposing cohorts. The data was collected by an online based survey from baby boomers and a paper and pen surveys from Generation Y. The benefit of this mode is that the web survey allowed for profiling of respondents and eliminating the possibility of false answers. The benefit to the study is that this mode can measure variables between the cohorts using factor analysis. Raw data will be stored on a cloud server which will be encrypted to avoid information being exposed. Only the researcher will have access to this data. Once the study is complete, the data will be destroyed.

Respondents of this study were contacted and communicated to at sporadic points before the start of the data collection. This will ensure that a thorough brief has been presented to them and coordinate the delivery of the self-administered questionnaire.

3.5.1 Pilot testing of questionnaire

A pilot sample of 20 senior citizens were selected to determine potential limitations in the questionnaire layout and design. Following the pilot study, the questionnaires were circulated to the identified sample group and the data gathered was used to verify validity and reliability of the scales (Cooper & Schindler, 2001a).

3.6 Data analysis and interpretation

Data analysis involves diminishing the data that has been collected from the sample to a controllable size, developing summaries, observing patterns and applying statistic techniques to analyse the information (D Cooper & P Schindler, 2014). This process entails the classifications of persons, events and things while characterising these properties which will be ultimately organised and

categorised (Creswell, 2013). The data processing stage encompasses multiple elements with the intent of reducing this data into manageable sizes (Bryman, 2012).

Some of the methods that can be employed to analyse quantitative data are univariate analysis, which is a basic analysis, and multivariate analyse which encompasses, amongst others, factor analysis, cluster analysis, multiples linear regression, discriminant analysis and structural equation modelling, etc. For this study, the data analysis process will adopt a multivariate approach that involves analysing three or more variables at the same time (Creswell, 2013).

Path Modelling and Confirmatory Factor Analysis (CFA), which are included in the Structural Equation Model (SEM), are used in the study. SEM specifies precise measurement error assessments associated with these scales (Bryman et al., 2012; Bryman & Bell, 2015). The selected techniques will be suitably matched to the type of variables generated during the study.

Data analysis is an vital part of conducting research as the data collected and analysed puts meaning and substance to the research study (Bryman & Hardy, 2004).

3.7 Validity and reliability

Reliability and validity are important factors and criteria to ascertain the quality of the research (Bryman, 2012). Validity is the length of a test measure that a researcher wishes to measure while reliability assesses the whether the measurement procedure is precise (D Cooper & P Schindler, 2014). Validity and reliability ensures that the study is accurate in its findings and the approach is consistent across multiple undertakings (Creswell, 2013).

For purposes of this study, factor analysis will be undertaken to check the reliability of the measurement instruments and the internal standardisation of the research constructs. The Factor analysis values, Cronbach's value and Composite Reliability (CR), will be defined using SAS 9.5 software in order measure the reliability of the measurement items.

3.7.1 *Measurement validity*

Measurement validity, which can also be referred to as construct validity, has become the overriding objective in validity, and it has focused on whether the scores serve a useful purpose and have positive consequences when they are used in practice (Creswell, 2013). Cooper & Schinder (2014) state that measurement validity is concerned with the level to which scores on one scale corroborate the scores on another scale, which are designed to assess the same construct and are able to truthfully represent unique concepts (Zikmund et al., 2013).

3.7.2 *External validity*

External validity is concerned with assessing whether the research results can be generalised beyond the context of the study (Bryman & Hardy, 2004). The study used probability sampling, because the respondents are baby boomers, there is likelihood that the external validity will be limited as per similar research conducted by (Fietkiewicz et al., 2016). Therefore, the results may not precisely be indicative of the true behaviours and characteristics on the wider social media usage of black male and female baby boomers in South Africa, which presents a limitation to the study. However, gathering information from respondents from two or three metropolitans or geographic regions (in Gauteng, Western Cape and Kwa-Zulu Natal) in the country may assist in gathering more varied samples.

3.7.3 *Internal validity*

In a quantitative study, internal validity is concerned with whether the findings from the study, that assume that a relationship between variables are believed to lead to other conditions, can be certain (Bryman et al., 2012). An example is whether the coverage of any promotional message on the internet influences consumers' buying decisions.

This study employed a self-administered questionnaire. Considering that, the result variable can't be controlled by the study. Along these lines, causality between the variables must be construed. There is probability that the outside

legitimacy will be restricted according to comparable exploration led by Fietkiewicz, Lins, Baran, & Stock (2016). In this study, internal validity was used to test whether the instruments indeed measure what they had intended to.

Estimation methods in covariance structure analysis are traditionally developed based on assumptions of multi-variates' normality. This assumption is usually defied in practice. A violation of the multivariate normailty assumption can have a negative impact and invalidate statistical hypothesis testing (Browne, 1987; Equacions Estructurals Bollen, 1989; Hu, Bentler, & Kano, 1992; Jöreskog, 1969).

A vital part of SEM (structural equation modelling) is the goodness of fit testing. As a standard regression, the fundamental measure of relationships between variables is the covariance and the dynamics of actually fitting the SEM models to incorporate covariance structure modelling. Fit estimators are varied and have contributed to vast research. Noteworthy fit tests are global fit test, illustrated in table 1, which tests fit between residual matrices and local fit test, illustrated in table 3, which indicates portions of the model that may or may not contribute to a poor or good fit (McDonald & Ho, 2002; Schermelleh-Engel, Moosbrugger, & Müller, 2003).

The table below summarises global fit statistics:

Table 2: A recommended composition of the SEM global fit statistic

Global Fit Statistic	Conventional Fits/cut-offs		
	Good	**OK**	**Poor**
Chi-square statistic	Non-significant chi-square (e.g. p > 0.05)	Significant chi-square if sample reasonably large	Significant chi-square if sample small
(SRMR) Standardised Root Mean Square Residual	SRMSR < 0.05	SRMSR < 0.08	SRMSR > 0.10
RMSEA Estimate	RMSEA < 0.05, especially if upper end of CI <0 .08	RMSEA < 0.08, especially if upper end of CI < 0.10	RMSEA > 0.10, especially if lower end of CI > 0.08
CFI (Bentler's Comparative Fit Index)	CFI > 0.95	CFI > 0.90	CFI < 0.90
NNFI/TLI (Non-normed fit index)	NNFI > 0.95	NNFI > 0.90	NNFI < 0.90

Source: Adapted from (G. Lee, 2015)

A vital part of SEM (Structural Equation Modelling) is the goodness of fit testing. The following table summarises local fit statistics:

Table 3: A recommended composition of the SM local fit statistic

Local Fit Statistic	Amendments Required	
	Amendment not needed	***Amendment might be required***
Largest normalised residuals	Largest normalised residuals < ±2, or at least reasonably few > 3, none far from 3	Look at specific residuals > ± 2-3
R^2 statistics for endogenous variables	Relatively high R^2 (relative to variables / area of study)	R^2 relatively close to 0
Standardised paths	Standardised path moderate too large and significant	Standardised path small / non-significant: path insubstantial. May consider removing path / variable (especially in CFA)
Lagrange multipliers (LM statistics) – modification index	Non-significant LM statistics (not a big chi-square improvement if new path added)	Significant LM p-value suggests substantial improvement to chi-square if new path added
Wald statistics – modification index	Significant Wald statistic, big deterioration in chi-square if path deleted	Non-significant Wald statistic (small deterioration in chi-square if effect is deleted)

Source: Adapted from Lee (2015, p. 357)

3.7.4 *Reliability*

Reliability is concerned with the consistency of measures and precision thereof (D Cooper & P Schindler, 2014). The research should be able to replicate the procedures undertaken from one research in another as a measure of its reliability (Bryman, 2012). In understating the reliability of a study, the main indicator is consistency that the same results will be draw should it be replicated in another study (Zikmund et al., 2013).

The factors and questions were taken from measurements scales applied by various authors. Cronbach's Alpha was used for each of the factors which is set at 0.07 which is the permissible score for testing internal reliability of the variables of a factor (Hair, Black, Babin, & Anderson, 2009; Sa & Chai, 2016).

A visual illustration of the path model has been introduced to demonstrate the relationships between variables and factors.

3.7.5 *Ecological validity*

In a quantitative study, ecological validity is concerned with whether social scientific discoveries are applicable in everyday natural and social settings (Bryman et al., 2012). This can also be defined as the degree to which a study is able to display how well or appropriate the measurement works in practice (Zikmund et al., 2013). The findings in the study regarding the behavioural patterns and norms on baby boomers in South Africa, when exposed to digital form of marketing, will help marketers to better align their messages and insights on how best to deliver these messages to where the target audience spends most of their time, which is on mobile phones. The generational cohort of baby boomers have recognised that they have a lot to benefit from online social networking when paralleled to the other cohorts (Lewis & Ariyachandra, 2011). These findings may be a foundation in the study in addressing the growing baby boomer market that is under-serviced yet possesses the most disposable income and influence purchasing behaviours amongst peers, family and friends.

3.8 Demographic profile of respondents

The survey comprised of two qualifying questions to ensure only baby boomers (individuals born between 1946 and 1964) completed the survey. The study focused on baby boomers, therefore the following attributes form part of the descriptors of the demographic profile:

Race and Gender	: Black, male and female
Age	: 54 – 72 years old
Geographic region	: Johannesburg
Social media account	: Active Facebook account
Number to be sampled	: 250

3.9 Ethical considerations

Ethical considerations in social research as prescribed in the statements produced by professional bodies include (Becker, Bryman, & Ferguson, 2012):

- *Respect for research participants:* enabling respondents or their representatives to make reflective choices about whether to engage or not, how to engage and treating them with respect throughout the research process
- *Protection of research participants*: ensuring participants are not harmed and minimizing their risk of harm during the research
- *Ethical awareness*: identify ethical challenges, anticipate potential harms and notice any form of discomfort in participants
- *Moral integrity and honesty*: consider whether covert research is necessary, when, if ever, it is acceptable to lie or be economical with the truth and how much of the researchers' personal lives to share
- *Moral courage:* to turn down funding from compromising sources, report abuse, publish controversial findings and act according to researchers' responsibilities as citizens
- *Professional wisdom*: make sound judgments when faced with complex ethical dilemmas for which principles and rules of ethics provide no clear answers

This research report has adhered to the principles of academic research by maintaining anonymity and interests of the respondents while adhering to the ethical writing standards of academic research.
Only respondents between the ages of 54 and 72 we permitted to take part in the study.

3.10 Limitations of the study

There is likelihood that the respondents from the baby boomer sample selected will be generalised to only those residing in a certain geographic region of the South African market. The sample of 235 baby boomers is relatively small in comparison to the entire demographic of senior citizens that make up the population of South Africa. The reliability and validity of the study might be compromised as respondent might respond in accordance with what their peers in the market are doing as opposed to own characteristic and experiences. The assumption is that the respondents will answer in a precise manner and the researcher is conscious that the analysis of the study may be subjected to predetermined or adaptable results.

3.11 Conclusion

The essence of Chapter 3 was to describe the research design and methodology applied to deliver on the research objective. The research design was outlined followed by population sampling and profiling of respondents, research instruments, data analysis, limitations of the study and ethical consideration.

CHAPTER 4. PRESENTATION OF RESULTS

4.1 Introduction

This chapter provides results of the online survey conducted by illustrating three sections, being demographic, validity, descriptive statistics and results on the hypotheses. The results in the chapter will prove whether the hypotheses of this study are indeed true and aligned to the conceptual model designed for this study. The online survey was distributed on Facebook and administered through Qualtrics, resulting in a total of 603 respondents and 235 of them being baby boomers whole completed the survey end to end.

4.2 Demographic profile of respondents

4.2.1 *Age group*

The survey was targeted towards baby boomers living in South Africa. Based on the responses received, the researcher found that 235 (40,53%) from the total number of respondents were all baby boomers. The rest of the respondents were not profiled because the focus was on baby boomers.

4.2.2 *Gender*

Of the total number of 235 baby boomers respondents, females account for 77, 02% (181 respondents) while males made up 30% (54 respondents) of the study.

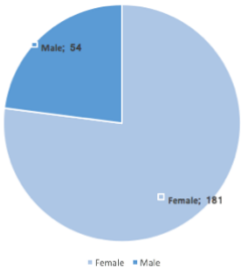


Figure 5: Gender representation

4.2.3 *Race*

The white population were the race that represented the highest number of respondents with 65,82%, followed by blacks with 19,41%. The coloured race contributed to 7,59% followed by Indians with 4,64%. The remaining 2,43% respondents fell part of the race composition that was not listed.

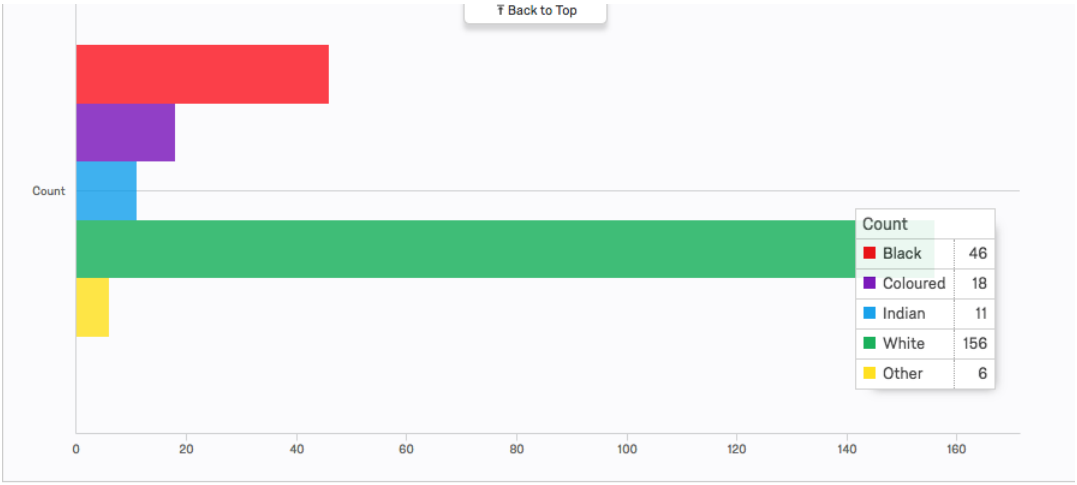


Figure 6: Race representation

4.2.4 *Level of education*

The figure below illustrates that most of the baby boomers who responded to the survey have a tertiary education. The composition of respondents who have a tertiary education is 61%, followed by those who have a matric at 29%; 9% have high school education and 1% represents respondents with primary education.

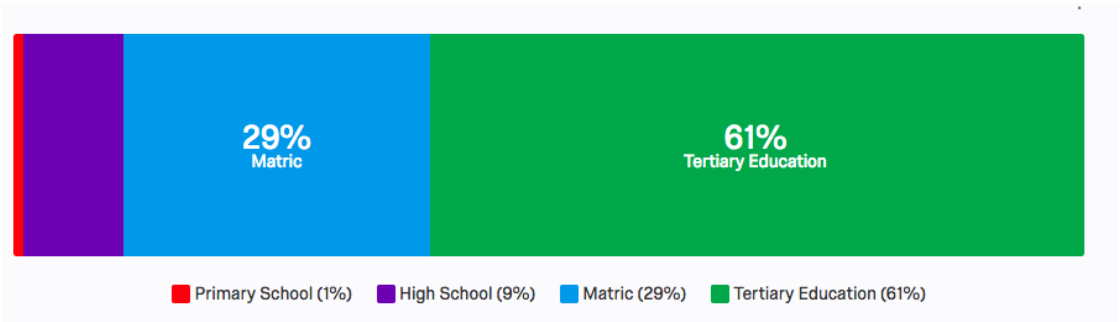


Figure 7: Education representation

4.2.5 *Active Facebook account*

The study focused specifically on baby boomers who had a social media account. One of two eliminating questions was whether the respondents had an active Facebook account. The figure below illustrates that all (100%) respondents have an active Facebook account.

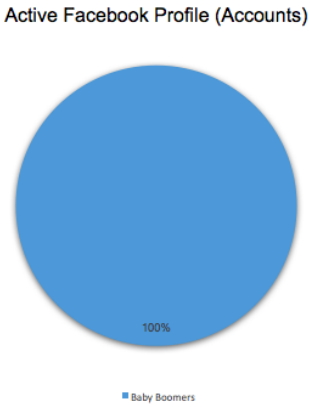


Figure 8: Facebook profile

4.2.6 *Time spent on social media*

The figure below represents the time (in hours) baby boomers spent on Facebook per day. 159 respondents spent one (1) to three (3) hours on Facebook while 58 respondents spent four (4) to seven (7) hours per day on Facebook, followed by 20 who spent more than seven (7) hours each day on Facebook.

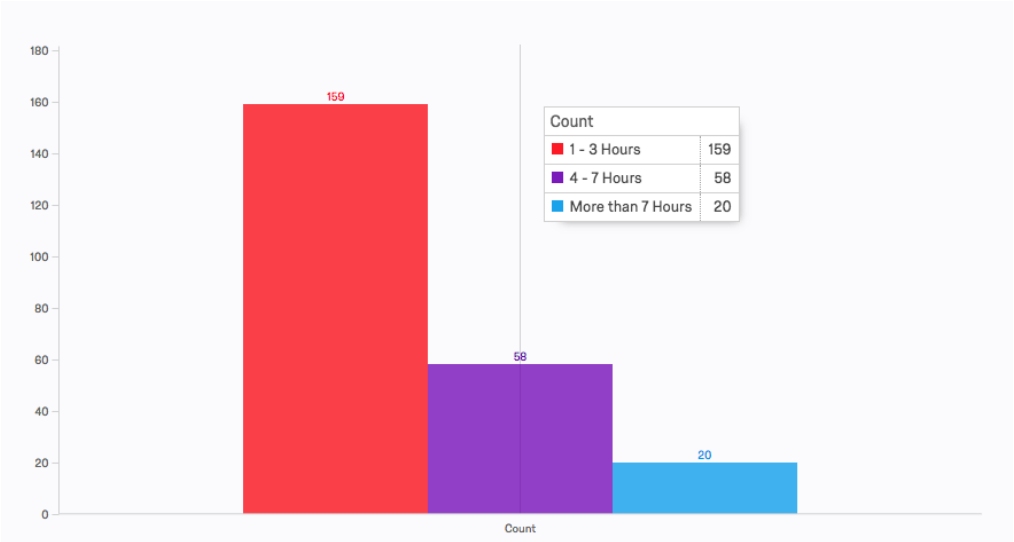


Figure 9: Hours spent on Facebook per day

4.3 Descriptive statistic: Measurement scale

This section represents the results from the seven (7) point Likert scales collect from respondents across the variable. The literature review and hypotheses are the basis from which the results are presented.

4.3.1 *Effectiveness of in-application advertisement*

4.3.1.1 Effectiveness of in-applications measurement scales

Table 4: Responses to effectiveness of in-application advertisement

	Question	Strongly disagree	Disagree	Somewhat disagree	Neither agree nor disagree	Somewhat agree	Agree	Strongly Agree	Total
1	Would you say you have notices any company branded advertisement campaigns on Facebook	20	16	16	43	34	75	30	**234**
2	Have you ever interacted with any banner advertisements on Facebook?	42	46	18	34	27	50	14	**231**
3	Would you say Vodacom has strong presence on Facebook	15	23	10	57	37	59	31	**232**
4	Would you say you have noticed the Vodacom Mega-U campaign banners on Facebook	32	51	13	35	26	43	19	**219**

As presented in the table 4 above, 32% (75 out or 234) of the respondents specified that they agree that they notice company branded advertisement campaigns on Facebook. 7% (16 out of 234) disagree. This confirms that in-application advertisement is noticeable on Facebook. 22% of respondents agree and confirm that they have interacted with advertisements on Facebook while 18% strongly disagree with this statement. It can be concluded that a larger sample of the respondents interact with web in-application banner advertisements. 25% of the respondents agree and equal proportion neither agree or disagree that the Vodacom brand has strong presence on Facebook.

This confirms that a brand's perceived popularity offline does not equate to strong presence on Facebook. Vodacom Meg-Your Day campaign was advertised on Facebook for the duration of the campaign. When respondents answered whether they had noticed the campaign, 23% disagreed and 20% agreed which confirms that a higher percentage of respondents did not notice the in-application banner advertisement that Vodacom posted on Facebook.

4.3.2 Performance expectancy

4.3.1.2 Performance expectancy measurement scales

I find Facebook useful in my everyday life

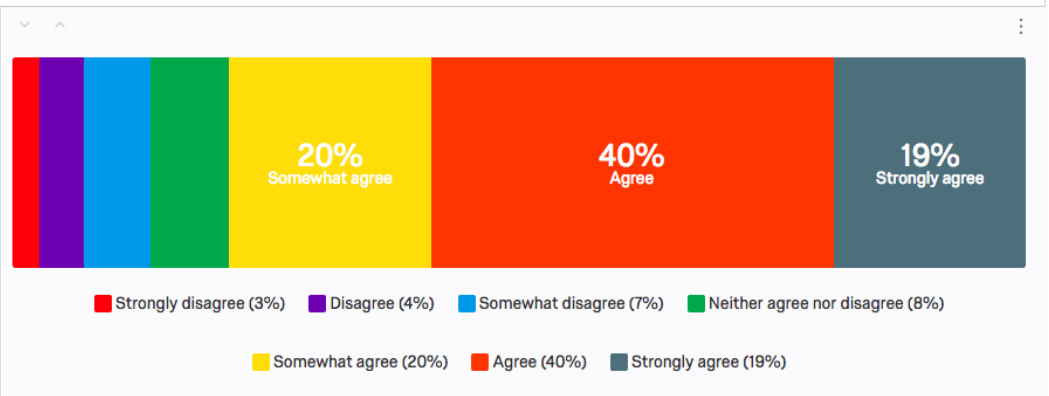


Figure 10: Performance expectancy - usefulness

As illustrated in figure 10, 40% of the respondents specified that they find Facebook useful in their everyday life and only 4% disagreed. This confirms that Facebook is a useful social media platform in baby boomers' lives.

If I use Facebook I'll be able to connect with friends and family

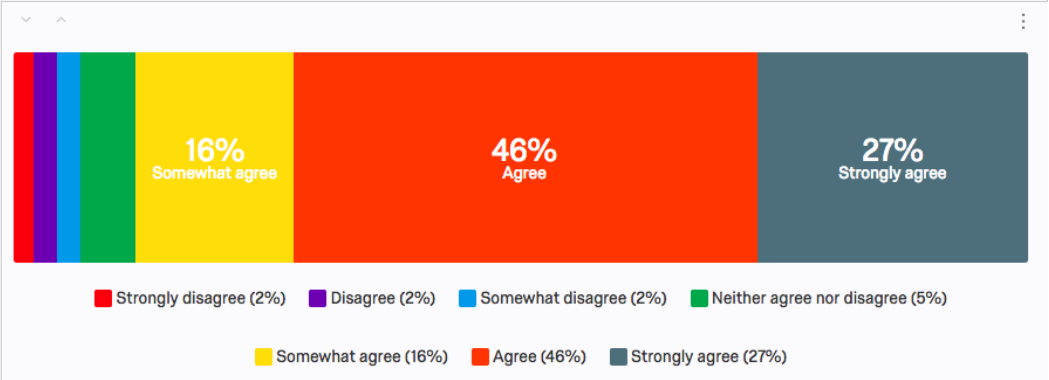


Figure 11: Performance expectancy: connectedness

46% of respondents agree that Facebook helps them connect with friends and family while 2% disagrees. The percentages illustrated in the above figure confirm that Facebook is a useful social media platform for baby boomers to connect with friends and family.

If I use Facebook, it will increase my chances of sourcing information on products and services

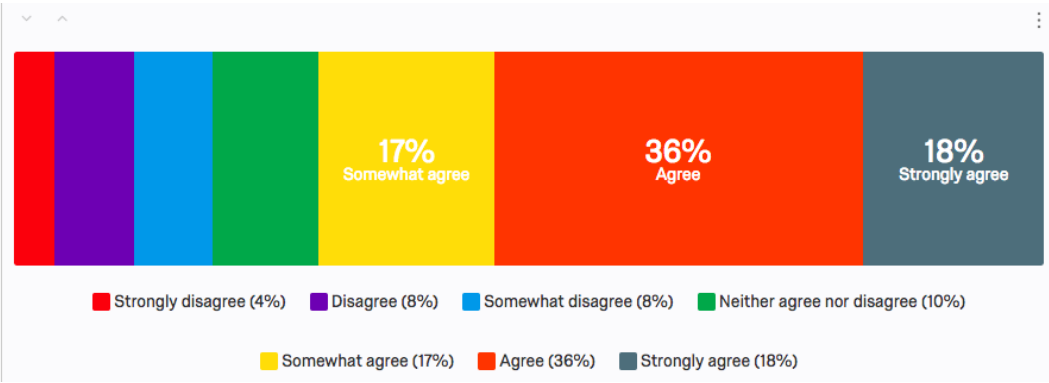


Figure 12: Performance expectancy: information searching

36% of respondents agree that they use Facebook to source information on products and services. 8% disagree with this statement. This confirms that baby boomers use Facebook to source product and service related information.

Facebook is safe and monitors what companies post on Facebook to maintain quality

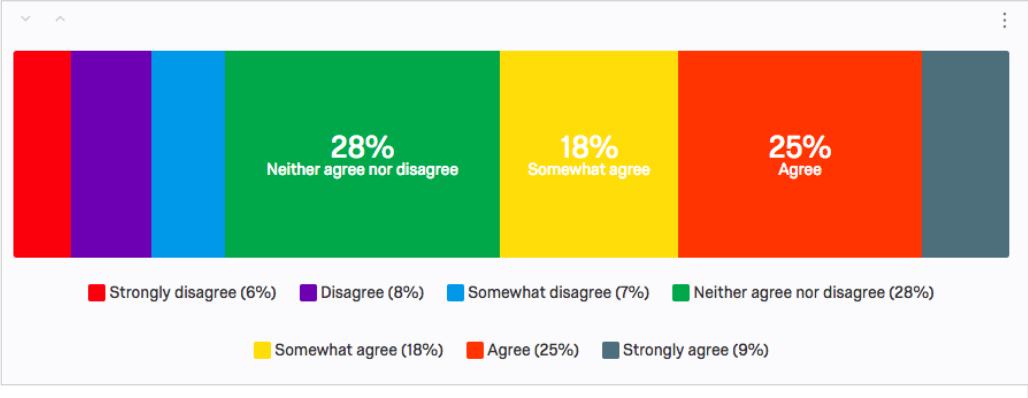


Figure 13: Performance expectancy: online safety

As shown in figure 13, 28% of respondents neither agree nor disagree that Facebook is safe and activities on Facebook a monitored. 8% disagree with this statement. The affirms that respondents are neutral with the statement that Facebook is safe and monitors what companies post on the platform to maintain quality.

4.3.3 Effort expectancy

4.3.1.3 Effort expectancy measurement scales

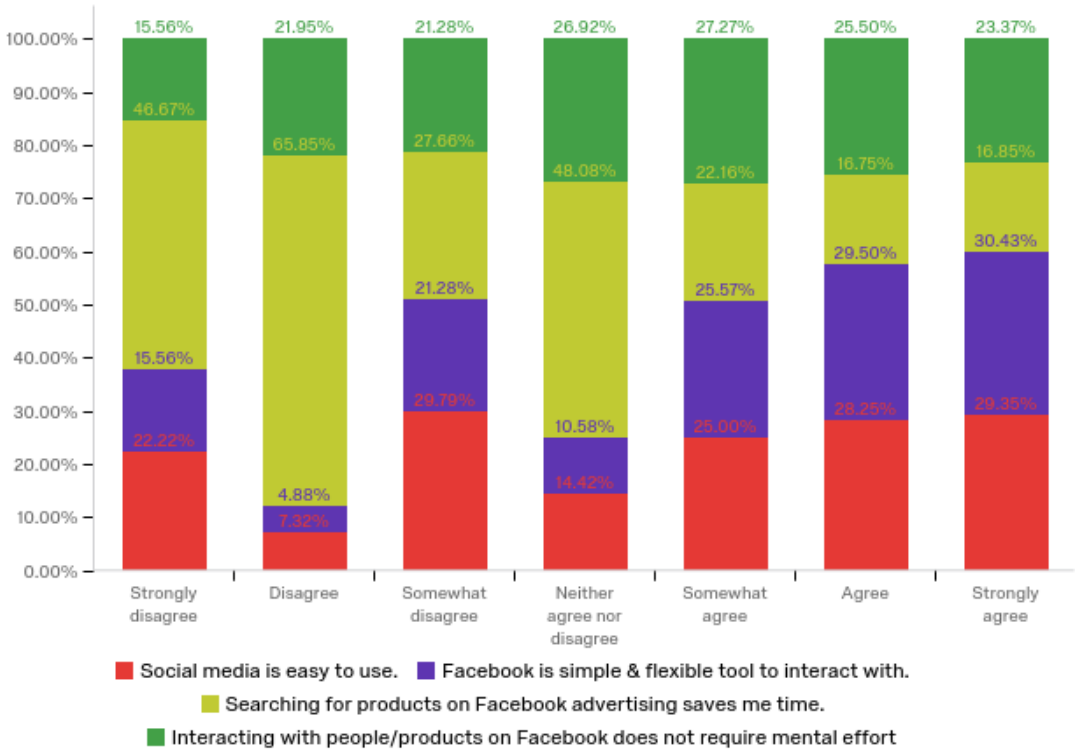


Figure 14: Effort expectancy on Facebook usage

As depicted in the above figure, 29.79% of baby boomer respondents specified that they somewhat disagree that social media is easy to use with only 28% agreeing with this statement. 30% strongly agreed that Facebook is a simple and flexible tool to interact with 4.8% disagreeing with this statement. Majority of respondents disagree that searching for products through Facebook advertising saves them times with 46% strongly disagreeing. This strongly confirms that searching for products through Facebook does not save them time. The respondents are neutral on the statement that interacting with people and products on Facebook does not require mental effort. 26.9% neither agree or disagree while 27% somewhat agree with the statement.

4.3.4 Social expectancy

4.3.1.4 Social expectancy measurement scales

My family and friends encouraged me to get onto Facebook

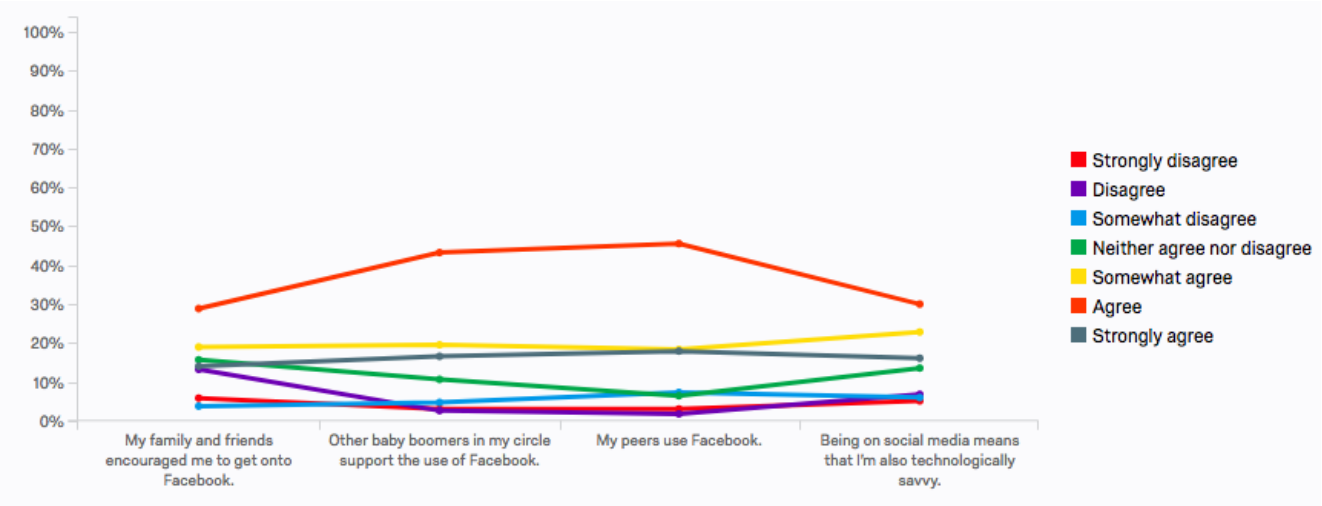


Figure 15: Social expectancy: friends and family

Figure 15 illustrates that 29% of respondents agree that their family and friends encouraged them to get on to Facebook. Only 6% disagree with the statement. This shows that majority of baby boomers who responded agree that their friends and family were an influence on them joining Facebook.

My peers know what Facebook is

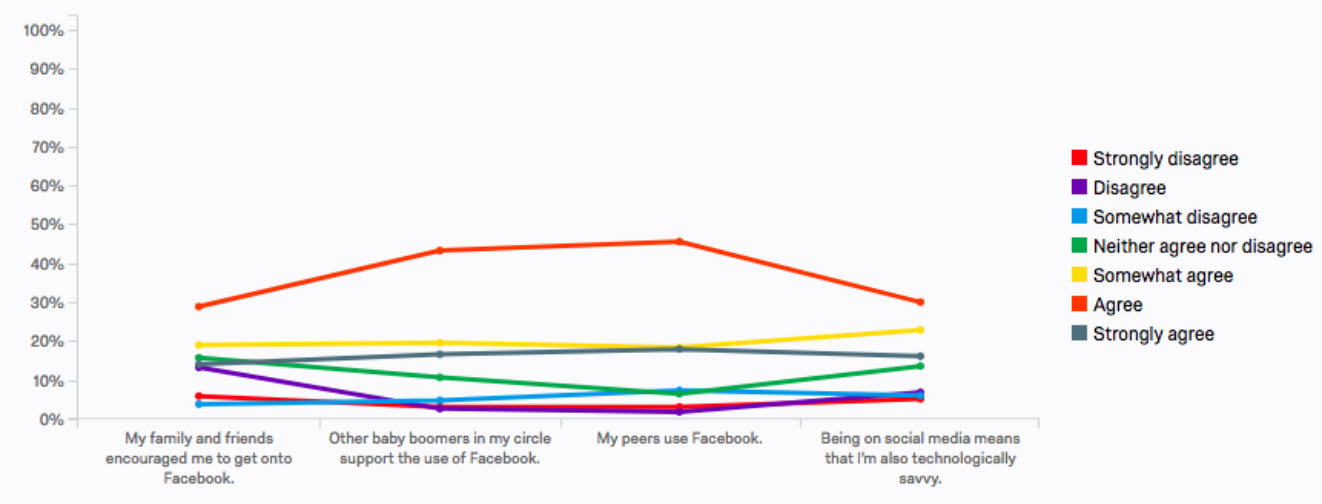


Figure 16: Social expectancy: Peer knowledge of Facebook

After watching a short video on what Facebook is, according to figure 16 above, an overwhelming majority of baby boomer respondents agree that they know what Facebook is. This sample accounted for 43% of respondents. 3% disagreed with the statement.

My peers in my circle support the use of Facebook to stay connected

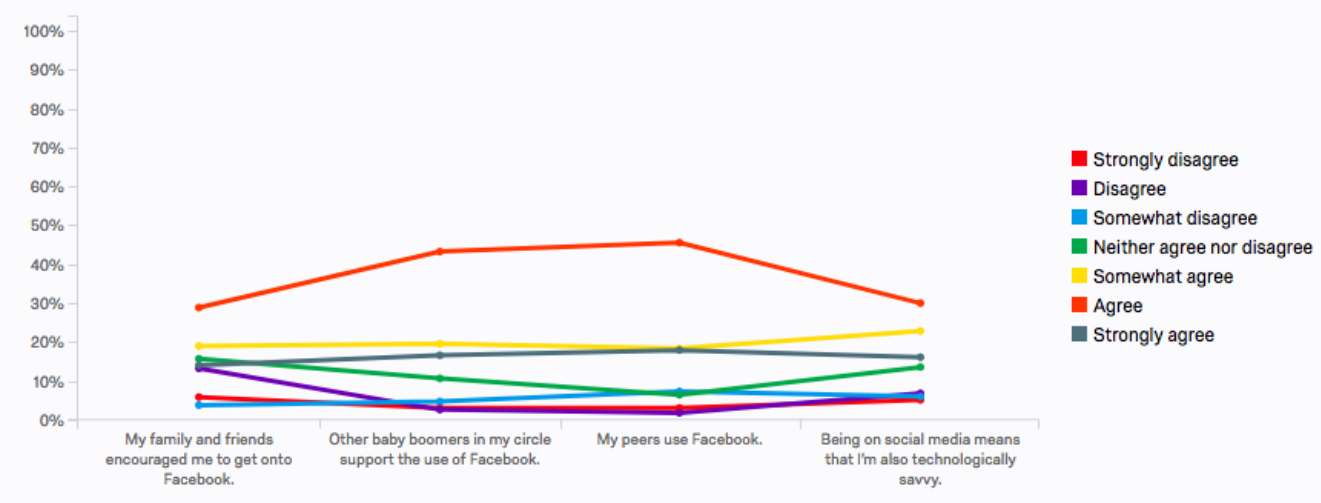


Figure 17: Social expectancy: Peers use of Facebook

Baby boomers who agree with the statement that the peers in their circle support the use of Facebook to stay connected account for 46% of the respondents. 3% disagree. This feedback strongly confirms that Facebook is used by baby boomers whose peers support the usage of the social media platform.

Being on social media means that I'm also technology savvy

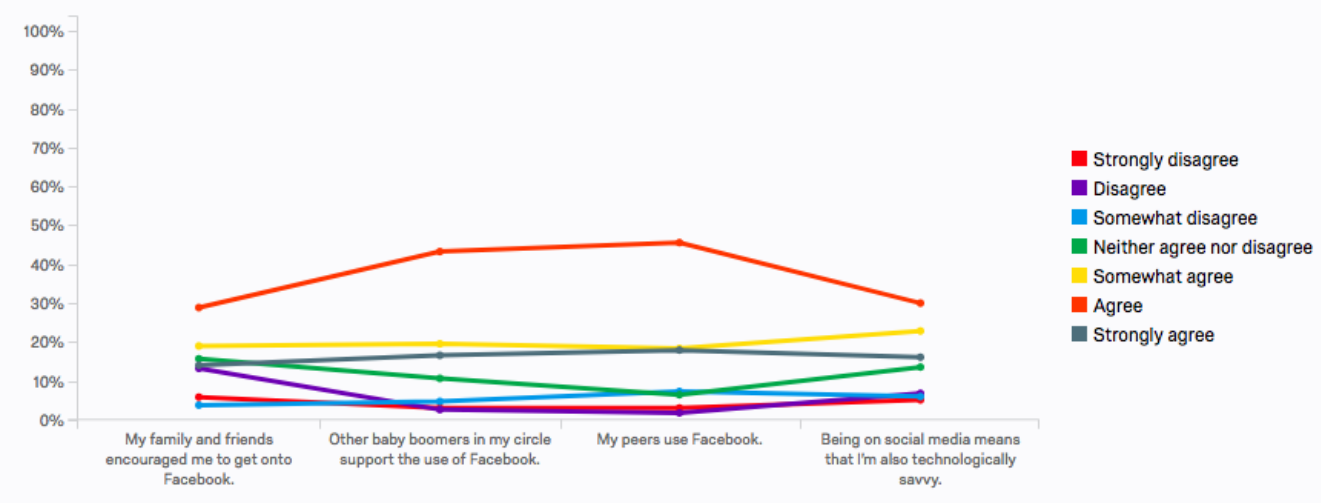


Figure 18: Social expectancy: Technologically savvy

Majority of baby boomer respondents, 30%, agreed that being on social media meant that they are technology savvy. Followed by 23% who somewhat agree and 14% who neither agree nor disagree. This demonstrates that majority of baby boomers feel that being on social media meant that they technologically savvy.

4.3.5 Purchase intent

4.3.1.5 Purchase Intent measurement scales

Would you say the Vodacom Meg-Your-Day Facebook in-application advertisement had a positive or negative influence on your buying decisions?

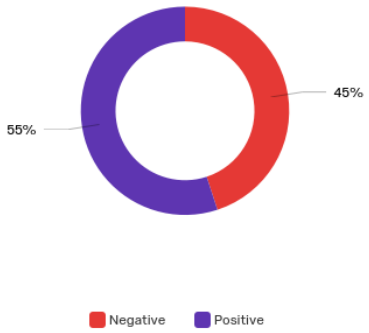


Figure 19: Positive and negative results of influence of campaign

Baby boomer respondents were requested to watch a short video of the Meg-Your Day campaign and asked whether the advertisement had a positive or negative influence on their buying decisions. 45% respondents said the advertisement had a negative influence while 55% said they were positively influenced.

4.3.1.6 Purchase Intent measurement scale

Table 5: Responses to effectiveness of in-application advertisement on purchasing

	Question	Strongly disagree	Disagree	Somewhat disagree	Neither agree nor disagree	Somewhat agree	Agree	Strongly Agree	Total
1	After seeing a banner advertisement on Facebook, do you go to the page and look for more information on the product you've seen advertised?	30	42	14	40	52	36	20	**234**
2	After seeing the Vodacom Mega-U banner, does this influence you to buy or play the Vodacom game?	46	54	17	28	31	31	20	**227**
3	After seeing the Vodacom Mega-U banner, does it encourage you to say positive things about the Vodacom brand?	32	49	9	43	27	42	18	**220**

Baby boomer respondents were requested to watch a short video of the Meg-Your Day campaign and view the static banners that were placed on the companies marketing campaign and asked whether, after seeing the banner advertisement, they looked for more information on the product they had seen. 52 out of 235 respondents somewhat agreed while 14% disagreed with this statement. This confirms that a reasonable number of baby boomers agree that they source more information on the product after seeing the advertisement. Respondents were asked whether, after seeing the advertisement, it influenced them to play the game. Majority (54 out 227) disagreed while 42 out of 227 agreed. This means the advertisement was not effective in driving consumers to engage with the game. Baby boomers were asked whether, after seeing the advertisement, it encouraged them to say positive things about the Vodacom brand. 22% disagree with the statement while 19.5%neither agree or disagree. It is concluded that most of the respondents would not say positive things about the brand.

4.4 Reliability and validity measurements

The next section presents the results and outcomes pertaining to the testing of reliability and validity measurement scales.

4.4.1 *Internal reliability of factors*

Each multi-item scale is first tested for reliability using the Cronbach Alpha measure, which is widely considered acceptable if the scale's score exceeds 0.70 (G. Lee, 2015). Table 6 below shows the Cronbach Alphas for all factors in the study and are deemed acceptable as all their scores exceed 0.07.

Table 6: The internal reliability of factors

	Factor	Alpha
1	Purchase intent	0.75
2	Effectiveness	0.87
3	Performance expectancy	0.82
4	Effort expectancy	0.86
5	Social expectancy	0.84

4.4.2 *Internal validity*

Confirmatory Factor Analysis

The second stage is to test factor validity (convergent and discriminant validity) using confirmatory factor analysis. To account for the scattering of remaining missing data, the full information maximum likelihood method is used. The model tested includes the multi-item scales for performance expectancy; effort expectancy; social expectancy; effectiveness of online advertising and purchase intention. Several items did not load well on their factors and had to be removed,

however sufficient items remain in all cases for a model. Table 5 below contains the final model fit values.

Table 7: Covariance Structure Analysis

Chi-square	117.29
Standardized RMR	0.067
Root Mean Square Error of Approximation (RMSEA)	0.08
RMSEA 90% confidence limit	0.064 – 0.107
Bentler Comparative Fit Index (CFI)	0.94
Non-Normed Fit index (NNFI)	0.915

In assessing and comparing the figures in table 7 above to the recommended composition of the SM global fit statistic figures in Table 2 in Chapter 3, it is noted that the model shows an acceptability fit across the frequently used indexes.
This research predominantly uses correlations and structural equation modelling with paths modelled between latent variables. As is conventional, the two-phase method used in SEM models (confirmatory factor analysis) forms the first stage with path effects thereafter modelled between the latent constructs (Hair et al., 2009).

Table 8: Correlation between factors

		Mean	SD	1.	2.	3.	4.	5.	6.	7.	8.
1.	**Purchase intent**	.94	.92	(.75)							
2.	**Clicking**	1.01	.99	.88	1.00						
3.	**4. Purchasing**	.78	1.00	.91	.67	1.00					
5.	**6. Word-of-mouth**	.93	1.03	.91	.66	.76	1.00				
7.	**8. Effectiveness**	1.15	.80	.66	.45	.44	.51	(.87)			
9.	**10. Performance expectancy**	1.72	.85	.43	.58	.32	.44	.63	(.82)		
11	**12. Effort expectancy**	1.76	.86	.30	.50	.21	.37	.48	.78	(.86)	
13	**14. Social expectancy**	1.61	.86	.93	.38	.22	.36	.50	.76	.74	(.84)

Note: all correlations are statistically significant at the p < .01 level.

4.5 Structural Equation Modelling

The following analytical section involves structural equation modelling path analysis to examine relationships between the main variables more completely. The structural equation path models compare and contrast two options to do with the treatment of the purchase intent items. One possible option was to treat these items as a single 'purchase intent' variable, which becomes the outcome of all antecedent variables, and as per the model discussed in the initial sections of the research report using perceived effectiveness of online advertising as a mediator variable. However, since the items of purchase intent seem feasibly to be inter-related, as discussed previously, a second option is to have clicking on the advert as the first stage of purchase intent, which in turn leads to actual purchasing and word-of-mouth as final outcomes.

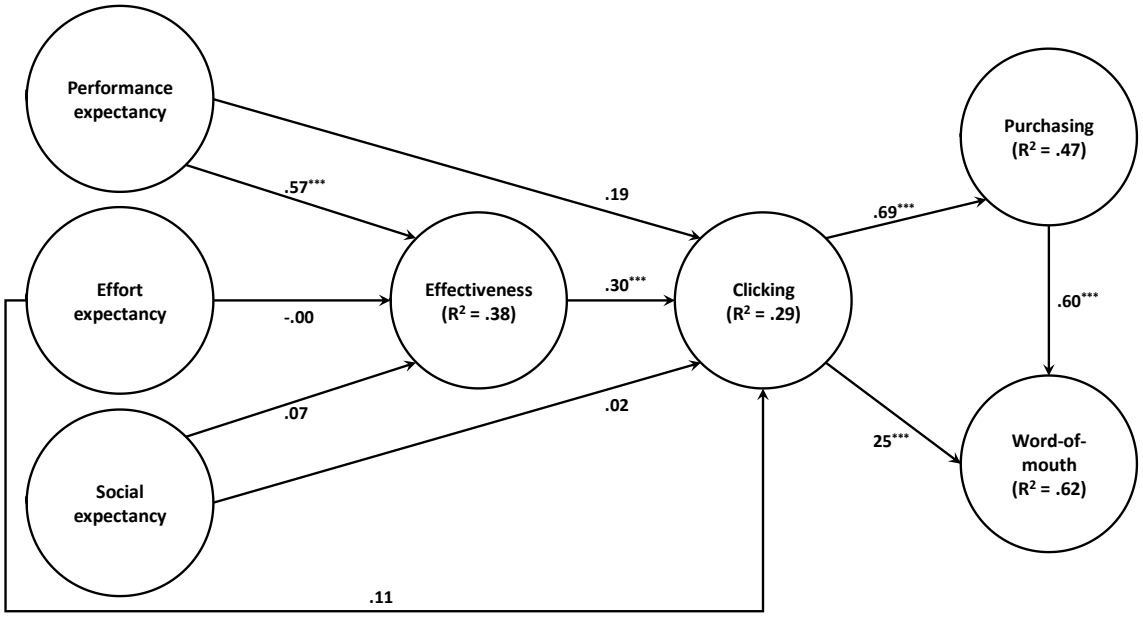
The fit of the model in which purchase intent is treated as a singular variable is presented in Table 9 below. As seen there, fit is marginal in some cases, but shows slightly below-acceptable fit in some measures (RMSEA is above .08, NNFI below .90).

Table 9: Fit comparison of two models

	Purchase Intent as a Single Variable	**Disaggregated Purchase Intent**
Chi-Square	181.46(80)***	147.65***
SRMR	.08	.08
RMSEA	.09(90%CI = .072-.108)	.08(90%CI = .070-.109)
CFI	.92	.93
NNFI	.89	.91
AIC	5331.96	4935.95
CAIC	5493.43	5093.39
SBC	5453.44	5054.39

In the course of executing the second model, initial fit is acceptable but Lagrange multipliers suggest strongly that a path be added between purchasing and word-of-mouth. This path makes theoretical sense; word-of-mouth has a powerful influence, whether positively or negatively, on consumer behaviour (East, Hammond, & Lomax, 2008) because consumers rely on information from virtual

communities such as consumer reviews, blogs and social media to make a purchase decision (Fan & Miao, 2012). The addition of this path leads to a model with acceptable fit, with all global fit statistics within acceptable ranges. In addition, all information criteria (Akaike Information Criterion (AIC), Consistent Akaike Informations (CAIC) and Schwarz's Bayesian Criterion (SBC) are lower for the second disaggregated model, which suggests it is superior in fit to the first model. Therefore it is this model which is discussed further.



*Notes: *** = p < .01. All paths are standardized.*

Figure 20: Path Model

As can be observed in the path model represented in Figure 20, the separation of the outcome elements leads to a variety of interesting results. Clicking through to the advertisement acts as a mediator for the antecedent variables, which makes sense since it is physically an intermediate action in the process. Clicking in turn is associated strongly with purchasing (*β* = .69, p < .01), and modestly but significantly with word-of-mouth in its direct effect (β = .25, p < .01), i.e. the effect for customers who only see the advert *without* buying. Importantly, there is also a strong positive association between purchasing and word-of-mouth (*β* = .60, p < .01), suggesting an additional indirect word-of-mouth benefit of getting customers to click *and* buy.

This makes sense in terms of consumer behaviour theory that a consumer's decision behaviour is informed by opinions of family and friends based on their experiences. Product information and referrals are conveyed by word-of-mouth rather than by television and radio advertisements, print media and billboards and to an extent even company websites (Kotler & Armstrong, 2010; Mothersbaugh et al., 2007).

Pertaining to the antecedent variables, as expected, perceived effectiveness of online advertising has a moderate positive association with clicking (β = .30, p < .01), and is itself positively associated mostly with performance expectancy (β = .57, p < .01). Effort and social expectancy have no significant associations with any of the other variables, contrary to expectations. Performance expectancy has a modestly sized but non-significant association with clicking directly (β = .19, p < .01).

Since indirect effects are an important part of this model, Table 10 below supplies the full effects decomposition for the main path model.

Table 10: Effects decomposition for final model

Antecedent variables	Endogenous Variables			
	Effectiveness	**Clicking**	**Purchasing**	**Word-of-mouth**
Purchasing				
Direct	-	-	-	.60***
Indirect	-	-	-	.00
Total	-	-	-	.60***
Clicking				
Direct	-	-	.69***	.25***
Indirect	-	-	-	.41***
Total	-	-	.69***	.66***
Effectiveness				
Direct	-	.30***	-	-
Indirect	-	-	.20***	.19***
Total	-	.30***	.20***	.19***
Effort expectancy				
Direct	.00	.11	-	-
Indirect	-	.00	.08	.07
Total	.00	.11	.08	.07
Performance expectancy				
Direct	.57***	.19	-	-
Indirect	-	.17*	.24**	.23**
Total	.57***	.35**	.24**	.23**
Social expectancy				
Direct	.06	.02	-	-
Indirect	-	.02	.03	.03
Total	.06	.04	.03	.03

*Note: *** = p < .01, ** = p < .05, * = p < .10. All paths reported are standardized.*

As can be seen in Table 10, indirect effects have important roles in many cases. Beginning with word-of-mouth, clicking has a substantial indirect effect through purchasing as discussed before (β = .41, p < .01), summing with the direct effect to a considerable total effect of β = .66, p < .01. Effectiveness has a modest but significant direct effect on WOM (β = .19, p < .01), as does performance expectancy (β = .23, p < .05), due to their knock-on effects through clicking and purchasing.

Similarly, purchasing enjoys similar total effects from effectiveness and performance expectancy as WOM (β = .20 and .24 respectively, p < .01 and 05 respectively).

Finally, clicking has a moderate total association with performance expectancy (β = .35, p < .01) due also to half of its effect being mediated through perceived effectiveness.

4.6 Hypothesis Testing

The study was aimed at testing the below hypothesis

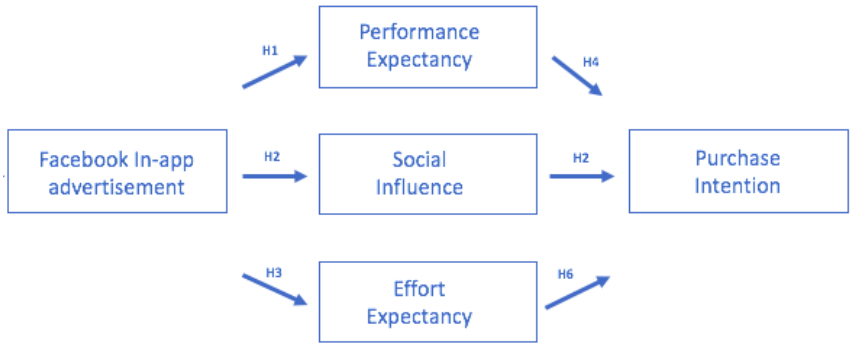


Figure 21: Original conceptual Model

The hypothesis results are shown in table 11 below:

Table 11: Correlation between the variable

Path Coefficients	Hypothesis	Estimates	P-Value	Rejected or Supported
Facebook in-app ➡ Performance expectancy	H1	0.57	***	Supported
Social influence ➡ Facebook advertisement on purchase intent	H2	0.07	***	Supported
Facebook in-app ➡ Effort expectancy	H3	0.00	***	Rejected
Performance expectancy ➡ Purchase intent	H4	0.00	***	Rejected
Effort expectancy ➡ Purchase intent	H5	0.00	***	Rejected

The results of the hypotheses are as follows:

4.6.1 Relationship between effectiveness of Facebook in-application and performance expectancy (H1)

The path coefficient estimate of H1 was 0.57, this confirms that there is a significant relationship between the effectiveness of Facebook in-application advertisements and performance expectancy. The P value demonstrates a 0.01 level of confidence which confirms that the hypothesis is supported. This hypothesis had the strongest relationship.

4.6.2 Relationship between effectiveness of Facebook in-application and social influence impacts purchase intention (H2)

The path coefficient estimate of H2 was 0.07, this confirms that there is a somewhat a relationship between the effectiveness of Facebook in-application advertisements and social influence. This means in-application advertisement has no significance on social influence and the purchase intention thereof. The P value demonstrates a 0.01 level of confidence which confirms that the hypothesis is supported. The relationship of the variables exists however are weak.

4.6.3 Relationship between effectiveness of Facebook in-application and effort expectancy (H3)

The path coefficient estimate of H3 was 0.00, this confirms that there is no relationship between the effectiveness of Facebook in-application advertisements and effort expectancy. This means in-application advertisement has no significance or relationship with effort expectancy. The P value demonstrates a 0.01 level of confidence which confirms that the hypothesis is rejected. The relationship of the variables is weak in this regard.

4.6.4 Relationship between performance expectancy and purchase intention (H4)

The path coefficient estimate of H4 was 0.00, this confirms that a relationship between performance expectancy and purchase intention does not exist. The P value demonstrates a 0.01 level of confidence which confirms that the hypothesis is rejected. The relationship of the variables is weak in this regard.

4.6.5 Relationship between effort expectancy and purchase intention (H5)

The path coefficient estimate of H5 was 0.00, this confirms that a relationship between effort expectancy and purchase intention does not exist. The P value demonstrates a 0.01 level of confidence which confirms that the hypothesis is rejected. The relationship of the variables is weak in this regard.

4.7 Summary of the results

To conclude the chapter, the data collected from 235 baby boomer respondents who completed the survey was analysed using SPSS. This was to determine the effectiveness of Facebook in-application advertisements on purchase intention of baby boomers.

The results demonstrated that contrary to expectation, effort and social had no significant relationship to any of the variables and performance expectancy had the strongest and most significant relationship. The unsupported variables only showed a relationship when a new mediator variable is introduced to the model.

Clicking and Word-of-Mouth are introduced as new mediators which make sense when the results are discussed in detail in the next chapter.
A path model and final model based on the results was presented. The test found that only two hypotheses were significant and supported.

The following chapter discusses these results further and Chapter 6 provides recommendations and conclusions

CHAPTER 5. DISCUSSION OF THE RESULTS

5.1 Introduction

This chapter will discuss the results emanating from the hypothesis and to make deductions from the data collected from respondents. The results will be discussed regarding the research problem and literature review discussed in Chapter 2.

The research experiment was facilitated using an online questionnaire system and placed on the Facebook platform. The respondents were required to watch a video and observe a banner advertisement before answering each question.

In this case, the Vodacom Meg-Your-Day campaign was used as the brand to integrated in-application advertisement on Facebook. Respondents were required to provide their insight in terms of brand recognition and the effectiveness of banner advertising by brands on Facebook.

The aim was to determine whether in-application advertisement on Facebook affects the purchase intent of black baby boomers.

5.2 Demographic profile of respondents

5.2.1 Race and Age

Majority of respondents are white people who represented a total of 156 from a total of 235 respondents. This equates to 65.8% of respondents. Second highest number of respondents by race are black people, representing 19.4%, followed by 7.5% coloureds, 4.6% Indians and 2% representing others. All the participants who completed the survey were born between 1946 and 1964.

5.2.2 Gender

The majority of the respondents are females, who represented a total of 77% of the total sample. Males accounted for 22.9% which is 54 from a total of 235 respondents.

5.2.3 Social media use, frequency and in- application advertisement recognition

Majority of the respondents can be considered to be moderate users of Facebook. The research revealed that all baby boomer who responded to the survey have an active Facebook account. The research found that most of the respondents spent between one (1) to three (3) hours on Facebook per day. 67% of them spent one (1) to three (3) hours on Facebook per day, while 24% spent four (4) to seven (7) hours and 8.4% spent more than seven (7) hours on Facebook per day.

Majority (46%) of baby boomers who responded use Facebook to stay connected to their friends and family while 40% found Facebook useful in their everyday lives.

Baby boomer respondents who found Facebook to be safe represented 25% of the total sample of respondents. This means, as much as there is adoption to the digital world by baby boomers, online safety is a reason for some to be resistant or have lagged in creating profiles and being active on social media, specifically, Facebook.

In terms of advertisement recognition on Facebook, 33% of respondents notice company branded advertisements on Facebook while 20% engage and interact with banner advertisements on Facebook. Although the percentage is not high, it represents most of the baby boomers who responded to the survey.

5.3 Overview of findings

The main problem was to identify the effectiveness of social media advertising on purchase decision and intention on black baby boomers. Five (5) hypotheses to test the study were examined. The study also sought to answer the first sub-problem which was to investigate whether age, specifically members of the population who are born between 1946 and 1964, affects the use of digital marketing platforms such as social media as a reference point when making any purchases. The interaction and engagement of baby boomers with Facebook, with reference to the Vodacom Meg-You-Day campaign, was used as a case study to investigate this.

The second sub-problem is to determine whether digital marketing influences purchasing motivation of a consumer. In the purchase intent process, effort expectancy and social influence were found to have no significant relationship with effectiveness of the an in-application advertisement and purchase intent. According to findings, performance expectancy has the strongest relationship to effectiveness of in-application advertisement while social and effort show minimum relationship.

A goodness of fit model, as proposed by SEM modelling, was applied to test the validity and reliability of the model. Statistical measures used to test the model comprised of chi-square, RMSEA, SMRSR and CFI. Standardised paths were also applied to assess elements of the model attributing to the models positive or negative fit.

Findings and in-depth discussion pertaining to the hypotheses are discussed below:

5.3.1 Effectiveness of Facebook in-application advertisement and performance expectancy

Performance expectancy is described as the degree to which using technology will provide benefits to a consumer's ability to perform activities (Venkatesh et al., 2012).

As consumers spend more of their money and time on the web, companies have also intensified their online advertisement efforts. This is mainly achieved by placing display banner in prominent positions to reach more customers through banner advertisements (Bleier & Eisenbeiss, 2015).

Online banner advertisement can cause a lot of noise thus encouraging banner advertisement avoidance by customers. Banner blindness is also an inhabitant to interacting with banners online. Banner blindness is referred to the defence mechanism, based on a users' marginal vision and past experiences, which is expressed through avoidance by users irrespective of whether or not it is in the format of the advertisement or looks like business-related content information (Margarida Barreto, 2013).

Companies such as Google and Facebook use personalised and customised banner advertisements based on customers' online behaviour and to target a specific market or audience. This makes the banner relevant and effective (Anand & Shachar, 2009; Ansari & Mela, 2003; Bleier & Eisenbeiss, 2015).

Personalised and customised information, in the context of performance expectancy, helps users attain benefits such as an increase in productivity, efficiency and time saving (Ansari & Mela, 2003; Sin Tan, Chong, & Lin, 2013; Srinivasan, Anderson, & Ponnavolu, 2002). Based on the findings, it is evident that baby boomers are engaging more and more on Facebook and are overcoming their challenges which hindered them from fully participating on Facebook as noted in studies by Nyemba et al., 2015.

Due to expected benefits perceived from online marketing, it is poised the performance expectancy will impact behavioural changes towards greater intention to use internet marketing (Sin Tan et al., 2013). The path coefficient for

H1 was 0.57 in this study and showed the strongest relationship. The hypothesis is supported.

5.3.2 Social influence of baby boomers and effectiveness of Facebook advertising on purchase intention

The study's first objective was to establish whether in-application advertisement has an effect of purchase intention. Social influence was tested to measure its effectiveness on Facebook advertisement and whether it leads to purchase intention. There are research studies available to attest that advertisement leads to purchase intention, however findings obtained from this study show that there is no relationship or association between social influence and effectiveness of in-application advertisement and its relationship to purchase intention.
The path coefficient for H2 was 0.07, however, in this study, it showed no significant relationship to any of the variables, contrary to expectation. The hypothesis is rejected.

Venkatesh et al., 2012 describes social influence as the extent with which people regard people of importance in their lives' opinion on which technology to use. Deutsch and Gerard, 1955 further elaborated that there are two distinct types of social influence, being informational and normative. Informational social influence is persuasion to accept information acquired from another person as substantiation of reality while normative social influence happens in group settings based on the need to preserve group harmony and agreement with other group members (Deutsch & Gerard, 1955; M. F. Kaplan & Miller, 1987; Li, 2013).

Based on the data collected and analysed for this study and in exploring the social influence on effectiveness of in-application advertisement, particularly on baby boomers, this proves that baby boomers are not necessarily engaging with branded in-application banners on Facebook because of their peers and seeing a banner will not persuade them to purchase the product that is being advertised. The only time there is a variable association is if we introduce clicking on an advertisement as a mediator variable which will then lead to purchase and word-of-mouth.

The outcomes tell us that, in for a baby boomer to engage and make a purchase based on a branded banner advertisement, the brands must have strong a credible presence and the advert must be engaging and easy to understand. Also, there is credibility with creating community for a segment the brands are targeting to encourage baby boomers to view what their peers have shared around the brand and product because that will encourage clicking on the advert, engaging, purchasing and word-of-mouth to their peers and back to the social virtual community.

5.3.3 Effectiveness of Facebook in-application advertisement and effort expectancy

Effort expectancy refers to level of simplicity related with consumers' use of technology (Venkatesh et al., 2012). In a similar study, it was determined that the ease of use is an imperative factor of use in the early stages of acceptance but becomes important only through perceived usefulness (Lallmahomed, Ab Rahim, Ibrahim, & Rahman, 2013).

Effectiveness of an advertisement is not only informed by its location but on the type of approach used and the graphical composition of website which services to influence its effectiveness (Margarida Barreto, 2013). Once users have been exposed to and engaged with internet marketing over some time, it is expected to apply less efforts because it would have been perceived to be easy to use and have few intricacies (Sin Tan et al., 2013).

The limitation of banners is that customers are usually involuntarily confronted with banners thus paying low attention to them, however factors, such as design, messaging, special characters and features can capture the attention of customers and encourage clicking (De Vries, Gensler, & Leefglang, 2012). The path coefficient for H3 was 0.000 and showed no sign relationship to any of the variables, contrary to expectation. A relationship is realised once a mediating variable such as clicking is introduced. The hypothesis is rejected.

5.3.4 Performance expectancy and purchase intention

The purpose of this section is to understand the second sub-problem which is to determine whether digital marketing influences purchasing motivation of a consumer. Purchase intent refers to the psychological state that reflects a consumers' decision to take ownership of a product or service immediately (Nirmala & Dewi, 2011). Research has established that consumers who preferred online purchasing are price sensitive and people who spent more time online buy more items (Akar & Nasir, 2015).

A study by Gaitan, Peral & Jeronimo 2015, that investigated the influence of using technology on internet banking, found that performance and effort expectancy were important antecedents for behavioural intention.

The capacious use of inventive products would affect amplified performance expectancy and effort expectancy and that would lead to behavioural intention of older and mature consumers (Arenas-Gaitán, Peral-Peral, & Ramon-Jeronimo, 1970; Badowskaa, Zamojskab, & Rogalac, 2016).

To encourage baby boomers to engage on an innovative and digital platform, it is imperative for marketing personnel to highlight the significance of engaging on the platform, such as an advertisement banner, and to reward them with gift that has meaning, has high value and will encourage repeat visit and engagement.
The Vodacom Meg-Your-Day campaign was segment agnostic so baby boomers could possibly have been involuntary swallowed by the messaging around the campaign and not seen the campaigns added benefits such as free data and airtime because it did not speak to them, as a segment or cohort, directly.

Although performance expectancy is a strong variable and is noted as being a key construct in influencing adoption of mobile services (Park & Kim, 2014; Park & Ohm, 2014), the study revealed that there was no significant relationship between performance expectancy and purchase intent.

The path coefficient for H4 was 0.00 and showed no sign of relationship to any of the variables. A relationship is realised once a mediating variable such as clicking and word-of-mouth is introduced. The hypothesis is thus rejected.

5.3.5 Effort expectancy and purchase intention

The relevance of this section is to understand the second sub-problem which is to determine whether digital marketing influences purchasing motivation of a consumer. Effort expectancy is noted as being an important factor in the mobile technology realm and mobile phones which are easy to use when directly associated with purchasing intent (Agrebi & Jallais, 2015; Badowskaa et al., 2016). Venkatesh (2000) noted that the perception of effort expectancy is usually determined after practical experience because users' perception about ease of use would be an anchor to general philosophies about the use of computers.

Effort expectancy has a positive influence on intent in addition to its indirect effect through attitude (Venkatesh, Thong, Chan, Hu, & Brown, 2011). Although Venketesh et al., 2011 found strong impact on purchase intention, this was however not reflected in the findings of the study.

A variable linking effort expectancy to purchase intention is somewhat realised when effectiveness (path coefficient 0.30) acts as a mediator between effort and purchasing. Clicking (path coefficient 0.11) is introduced as a mediator to purchasing (path coefficient 0.69), clicking also develops a relationship with word-of-mouth (path coefficient 0.25).

The path coefficient for H4 was 0.00 and showed no sign of a relationship to any of the variables. A relationship is realised once a mediating variable such as clicking and word-of-mouth is introduced. The hypothesis is thus rejected.

5.3.6 Supporting variables: Clicking and Word of Mouth

The intention of this section is to discuss the new variables which were discovered during data analysis.

Clicking

Respondents from the survey were asked whether they interact (click, watch video, observe content) with in-application banners placed on Facebook, 22% of respondents agree and confirm that they have interacted with advertisements on Facebook while 18% strongly disagree with this statement.

Noting that online advertising has grown exponentially over the years, a critical issue for marketers is to attract individuals' attentions and persuade them (Low, 2000; Yoo, Kim, & Stout, 2004). Animated online advertisements, instead of static advertisements, is an innovation widely used by practitioners as an attempt to capture individuals' limited attention which also enhances the effectiveness of persuasion. It is believed that dynamic and responsive images have greater attention grabbing potential over traditional non-responsive images on advertisements (Beattie & Mitchell, 1985; Cleland & Carmichael, 1997; Deuze, 2006; Sundar, Narayan, Obregon, & Uppal, 1998) (Ellsworth & Ellsworth, 1995).

The purpose of banners on social networking platforms is to attract social media users and to stimulate them to click on the branded banner to view its content and ultimately encouraging an action such as clicking to view or clicking to purchase (De Vries et al., 2012; Rauschnabel, Praxmarer, & Ivens, 2012). An indicator of the effectiveness of a banner advertisement is the click-through-rate. This is a central factor in the online environment because there is a billing mechanism based on the clicks generated by the advertisement rather than the traditional cost-per-thousand exposure model used to measure traditional advertisement effectiveness. Click-through, in the advertising environments, means the behavioural response of customer to an advertisement (Yoo et al., 2004). Coherent with the discoveries of the study, clicking on an advertisement can lead to purchase intention. A new mediator variable which has been observed.

The limitation of banners is that customers are usually involuntarily confronted with banners thus paying low attention to them, however factors, such as design, messaging, special characters and features can capture the attention of customers and encourage clicking (De Vries et al., 2012).

Although it has been noted in previous study (B. Lee et al., 2011) that functional anxiety is an inhabitant for baby boomers, it's important for marketers to find innovative yet practical advertisement means to still engage this cohort without introducing visually overwhelming rich media which will discourage them from clicking on your advertisement while they are on Facebook.

Word-of-Mouth

Social media is progressively providing a platform for consumers to share opinions and personal experiences of their product purchases which then facilitates word-of-mouth (Sin Tan et al., 2013). Social media platforms have become a trusted and dominant digital communications channel used by 67% of internet users (Chappuis, Gaffey, & Parvizi, 2011; Hudson, Roth, Madden, & Hudson, 2015).

In the new century, digital communications and social media tools have become one of the most impactful and largest advertising channel used by businesses and consumers for real time interaction, access and sharing of information and sharing information with your peers in the virtual world, thus leading to word-of-mouth.

It is worth noting that word-of-mouth is an integral component to the success of a company because evidence exists to support the notion that companies that use word-of-mouth for marketing are more successful (Mason, 2008; Pfeffer, Zorbach, & Carley, 2014; Solis, 2011). Businesses have moved from push-based advertisement to having trust-based advertisement in which advertisers engage their consumers with their brands and stimulate word-of-mouth promotion (Dehghani & Tumer, 2015). Businesses develop word-of-mouth through Facebook, which positions Facebook advertisements as an effective means of

enhancing the brands image of goods and services(Dehghani & Tumer, 2015; A. M. Kaplan & Haenlein, 2010).

The Meg-Your-Day campaign was a social media driven campaign where customers were encouraged to play the game and buy more credits to increase their chances of winning various prizes such as airtime and data. Based on the findings of this study, when baby boomer respondents were asked whether, after seeing the advertisement, it influenced them to say positive things about the Vodacom brand, 22% of baby boomers disagreed with the statement while 19.5% neither agree or disagree. This poses as a negative impact because it means majority of the respondent might share their negative experiences with their peers. Therefore, it's important to segment your marketing efforts to monitor and respond tactically to concerns experienced by the specific segment you have tailored your marketing towards. A blanket marketing approach in the social media age means not all segments or cohorts would respond to marketing efforts the same way and it has become easy to share dissatisfaction of brands online thus leading to word-of-mouth

Based on the results of the study, the following was deduced:

- Clicking on an advertisement acts as a mediator for the original variables.
- Clicking has a strong association with purchasing ($\beta = .69$, $p < .01$), and reasonably but significantly with word-of-mouth in its direct effect ($\beta = .25$, $p < .01$), i.e. the effect for customers who only see the advert and don't act on it (*without* buying).
- There is a positive association between purchasing and word-of-mouth ($\beta = .60$, $p < .01$). Click and buy becomes a benefit of word of mouth.

A study (Nielson, 2007) established that consumers perceive online reviews to be as credible as a business' website. Another study proposed that businesses should use their online communities rather than relying on advertisements on the internet (Rowley, 2001).

These studies attest to how impactful word-of-mouth has on a consumer's decision process.

5.4 Conclusion

The results discussed in both Chapter 4 and 5 used responses from 235 baby boomers who completed the questionnaire to determine the effect of in-application advertisement on purchase intention of baby boomers – case in retail in South Africa. Initial findings of the research indicated that Facebook in-application advertisement is effective as a marketing tool. The results further show that although social and effort expectancy do not directly lead to purchasing intention, the introduction of mediating variables produce positive relationship between variables. Performance expectancy has a consistently strong relationship between most variables.

CHAPTER 6. CONCLUSIONS & RECOMMENDATIONS

6.1 Introduction

The purpose of this study was to investigate and interrogate the impact of in-application advertising in Facebook on the purchasing habits of black baby boomers in South Africa. Further investigation was done to determine baby boomers' attitudes, perceptions and engagement on social media and whether in-application banner advertising on Facebook affects this cohort's decision-making.

This last chapter will focus on summarising the findings from the study, suggest recommendations based on findings and areas to research further.

6.2 Conclusions of the study

Chapter 1 highlighted the purpose of the study which was to determine whether baby boomers in South Africa are persuaded by in-application advertisement, placed on Facebook, in their purchase behaviour of goods and services.

The first sub-problem was to determine whether age affects people born between 1946 and 1964 in their engagement or use of social media as a reference point when making service or product purchases. The second sub-problem was to determine whether digital marketing, as a below-the-line channel, influences the purchasing motivation of a consumer.

The hypothesis was designed to analyse the effect of Facebook in-application advertisement on purchase intent, highlighting the Vodacom Meg-Your-Day campaign as a retail case. The outcome was consistent with the hypotheses that baby boomers' engagement on Facebook leads to purchase intent. Baby boomers form part of the generation that has started embracing social media as a communication channel and platforms such as Facebook have helped this cohort to use alternative new media to communicate and source information or stay in contact with friends and family. A study by (Leist, 2013) refers to this cohort

as a growing market segment in the online social networking space. The study found that when baby boomers were exposed to banner advertising on Facebook, or interacted on social media, it had a bearing on performance expectancy but not on effort expectancy. This supports the hypothesis that there is a relationship between advertisements on Facebook and performance but there is no relationship with effort expectancy which in turn leads to purchase intent. The study found that there is effectiveness of in-applications advertisement on Facebook on performance expectancy.

There is an opportunity for brand and marketing managers to better position their advertisements on social media to be targeted specifically at this segment and to display advertisements in graphical formats that are easy to understand and engaging to baby boomers without making them longwinded which can easily make baby boomers lose interest. The study further noted that baby boomers spent between one (1) to three (3) hours on Facebook a day with 32% agreeing that they do notice branded Facebook advertisement and 22% engage with in-application advertisement which presents an opportunity to brands, focused at baby boomers needs, to channel and grow their marketing efforts on Facebook to tap into this audience which is likely grow and share information with their peers using Facebook as a preferred social media tool. The proposed new model shows that social expectancy positively leads to clicking of advertisement on Facebook which directly leads to purchase intent and word-of-mouth.

6.3 Managerial implications

Todays' dynamic and ever changing digital world has forced businesses to understand the rapidly growing digital landscape and to explore additional communication channels to reach both traditional and online consumers. Facebook has been included in most businesses marketing plan for its reach, effectiveness and interactive advertisement ability. Advertising on social media is one of the most cost effective and targeted forms of advertising (Curran et al., 2011).

Although the study focused on the Vodacom Meg-Your-Day campaign as a case study, the study suggests different segment marketing approaches for managers who are interested in targeting the older generation using social media as marketing tool.

An important implication, based on the findings of the study, is that companies should not follow a blanket approach in their digital advertisement, especially where videos are concerned. Younger generations can stay engaged a little longer and are able to watch a campaign video advertisement to the end. This is not the case with older citizens. Concertation, visual impediments and interest in advertisement play a huge role in how effective an advertisement is to this cohort and if they don't resonate with the advertisement they simply stop watching midway or not engage at all. A two (2) minute video campaign will not draw the same interest and engagement from the younger generation compared to the older generation. Detailed yet concise online videos with simple static banners should be considered when targeting baby boomers.

The study also revealed that seeing in-application advertisement on Facebook did not necessarily encourage them to purchase the good or service that was advertised. This is an opportunity for managers to have segment specific advertisement by using Facebook targeting tools to ensure that the right people are seeing the right advertisement accordingly, and that the shared product information reaches its intended market segment. Companies should invest in data mining which involves analysing consumers' online behaviour, social network activities, online word of mouth and conversation patterns. This reactive approach will assist in packing content and having very targeted campaigns and driving specific marketing efforts to the correct cohort.

The study was intended for black baby boomers however results showed that white female baby boomers interacted and engaged more, and longer, with Facebook advertisement content. It is worth exploring and researching further why black boomers show little interest in Facebook in-application advertisement and for managers to identify ways to tap into the black baby market by interrogating and understanding their needs on social media.

In the study, it was revealed that baby boomers preferred traditional in-store forms of purchasing rather than online. The preferred “bricks and mortar” brought a sense on familiarity, safety and customer service element which does not physically exist when purchasing online. The issue of trust and being able to touch and feel products was also revealed.

Managers need to be careful in how and what they communicate with baby boomer and ensure that there is a safe and transparent online customer journey to avoid the negativity towards online purchasing that is currently expressed by this cohort.

6.4 Recommendations

The purpose of this study was to determine whether black baby boomers are affected by Facebook in-application banner advertising placed by brands. It is worth noting that although the younger generation adapt to digital media quicker and require less education, there is a visible shift in the older generation.

Based on the findings, white female baby boomers are more responsive and reactive to Facebook advertising than any other race and gender. Although the study was focused on black baby boomers, this race show very little interaction, engagement or interest on Facebook advertisement. Digital adaption is slow yet steady in black baby boomer community, however this is worth exploring how the divide can be bridged so ensure all races across this cohort are adapting, embracing and using digital to its full capacity. This is an opportunity for brands who target this market to speak directly to this sector. Elements such as use of smartphone features, data cost, privacy concerns and digital web literacy could be assumed to be factors that see very little response or activity from other races within the same cohort.

6.5 Suggestions for further research

The study focused on effectiveness of in-application advertisements on Facebook and its influence on purchase intention. Futures studies should focus on other social networking sites, such as Twitter and Instagram, which are more visually driven platforms and do not have the same popularity, in terms in numbers, that Facebook has. Future studies should be focused on multiple brands and brand categories in different sectors of business that speak to the needs of baby boomers. Be that as it may, the study somewhat provides insights into online purchasing habits of baby boomers due to exposure to online banner advertisement.

It would be of interest to assess the effectiveness of brand advertisements on multiple social networking sites and exploring other business sectors such FMCG, car manufactures and insurance sector because advertisement effectiveness, trust and word-of-mouth could be thoroughly tested with goods and services that require longer decision making. Findings could be used to tailor make online messaging according to the correct segments based on the specific brand or business sector and ensure placement is appropriate to the intent audience.

6.6 Conclusion

Chapter 6 presented closing statements and conclusion of the study through the confirmation of supported hypothesis and recommendations on the rejected hypothesis.

The chapter provided recommendations for future research studies that can contribute towards the study of generational cohort behavioural and marketing science.

REFERENCES

Agarwal, R., & Prasad, J. (1998). The antecedents and consequents of user perceptions in information technology adoption. *Decision support systems, 22*(1), 15-29.

Agrebi, S., & Jallais, J. (2015). Explain the intention to use smartphones for mobile shopping. *Journal of retailing and consumer services, 22*, 16-23.

Ajzen, I., & Fishbein, M. (1975). Belief, attitude, intention and behavior: An introduction to theory and research: Reading, MA: Addison-Wesley.

Akar, E., & Nasir, V. A. (2015). A review of literature on consumers' online purchase intentions. *Journal of Customer Behaviour, 14*(3), 215-233.

Al Qudah, D., Cristea, A. I., Shi, L., Al-Sayyed, R. M., & Obeidah, A. (2014). MyAds: a social adaptive system for online advertisement from hypotheses to implementation.

Alkhunaizan, A., & Love, S. (2012). What drives mobile commerce? An empirical evaluation of the revised UTAUT model. *International Journal of Management and Marketing Academy, 2*(1), 82-99.

Alwahaishi, S., & Snásel, V. (2013). Acceptance and use of information and communications technology: a UTAUT and flow based theoretical model. *Journal of technology management & innovation, 8*(2), 61-73.

Anand, B. N., & Shachar, R. (2009). Targeted advertising as a signal. *QME, 7*(3), 237-266.

Ansari, A., & Mela, C. F. (2003). E-customization. *Journal of marketing research, 40*(2), 131-145.

Arenas-Gaitán, J., Peral-Peral, B., & Ramon-Jeronimo, M. A. (1970). Elderly and internet banking: an application of UTAUT2. *The Journal of Internet Banking and Commerce, 20*(1), 1-23.

Badowska, S., Zamojska, A., & Rogala, A. (2015). Baby boomers' attitudes toward innovations: empirical research in Poland. *Procedia-Social and Behavioral Sciences, 213*, 1050-1056.

Badowskaa, S., Zamojskab, A., & Rogalac, A. (2016). Impact of performance expectancy and effort expectancy on elderly consumers' behaviour regarding acceptance and use of technological products: and empirica; research in. *Preparation for the Future Innovative Economy*, 174.

Beattie, A. E., & Mitchell, A. A. (1985). The relationship between advertising recall and persuasion: An experimental investigation. *Psychological processes and advertising effects*, 129-155.

Becker, S., Bryman, A., & Ferguson, H. (2012). *Understanding research for social policy and social work: themes, methods and approaches*: Policy Press.

Beneke, J., Frey, N., Chapman, R., Mashaba, N., & Howie, T. (2011). The grey awakening: a South African perspective. *Journal of Consumer Marketing, 28*(2), 114-124.

Blackwell, R. D., Miniard, P., & Engel, J. (2006). Consumer behaviour, (International student edition). *Thomson Higher Education, Mason, OH*.

Bleier, A., & Eisenbeiss, M. (2015). Personalized online advertising effectiveness:: The interplay of what, when, and where. *Marketing science, 34*(5), 669-688.

Bondad-Brown, B. A., Rice, R. E., & Pearce, K. E. (2012). Influences on TV viewing and online user-shared video use: Demographics, generations, contextual age, media use, motivations, and audience activity. *Journal of Broadcasting & Electronic Media, 56*(4), 471-493.

Bonsón, E., Torres, L., Royo, S., & Flores, F. (2012). Local e-government 2.0: Social media and corporate transparency in municipalities. *Government information quarterly, 29*(2), 123-132.

Brosdahl, D. J., & Carpenter, J. M. (2011). Shopping orientations of US males: A generational cohort comparison. *Journal of retailing and consumer services, 18*(6), 548-554.

Brown, I., & Jayakody, R. (2008). B2C e-commerce success: A test and validation of a revised conceptual model. *The Electronic Journal Information Systems Evaluation, 11*(3), 167-184.

Browne, M. W. (1987). Robustness of statistical inference in factor analysis and related models. *Biometrika, 74*(2), 375-384.

Bryman, A. (2012). *Social research methods*: Oxford university press.

Bryman, A., Becker, S., & Ferguson, H. (2012). *Understanding research for social policy and social work: themes, methods and approaches*: Policy Press.

Bryman, A., & Bell, E. (2015). *Business research methods*: Oxford University Press, USA.

Bryman, A., & Hardy, M. A. (2004). *Handbook of data analysis*: Sage.

Celik, I., & Schoreels, C. (2014). *Use of social media across different generations in higher education in a developing country.* Paper presented at the European Conference on Technology Enhanced Learning.

Chan, C. (2011). Using online advertising to increase the impact of a library Facebook page. *Library Management, 32*(4/5), 361-370.

Chappuis, B., Gaffey, B., & Parvizi, P. (2011). *Are your customers becoming digital junkies?* Retrieved from

Cheung, W., & Huang, W. (2005). Proposing a framework to assess Internet usage in university education: an empirical investigation from a student's perspective. *British Journal of Educational Technology, 36*(2), 237-253.

Chin, J. P., Diehl, V. A., & Norman, K. L. (1988). *Development of an instrument measuring user satisfaction of the human-computer interface.* Paper presented at the Proceedings of the SIGCHI conference on Human factors in computing systems.

Cleland, K., & Carmichael, M. (1997). Banners that move make a big impression. *Advertising Age, 68*(2), 26-27.

Colby, S. L., & Ortman, J. M. (2014). The baby boom cohort in the United States: 2012 to 2060. *Population estimates and projections*, 1-16.

Collis, J., & Hussey, R. (2013). *Business research: A practical guide for undergraduate and postgraduate students*: Palgrave macmillan.

Cooper, D., & Schindler, P. (2001a). Business research methods. *The Irwin/McGraw-Hill series, Operations and decision sciences Show all parts in this series*.

Cooper, D., & Schindler, P. (2001b). Business Research Methods, McGraw Hill/Irwin. *Cowen, PB, & and Tynan*(1999).

Cooper, D., & Schindler, P. (2014). Business research methods.

Cooper, D., & Schindler, P. (2014). Business Research Methods, © The McGraw− Hill Companies.

Creswell, J. W. (2013). *Research design: Qualitative, quantitative, and mixed methods approaches*: Sage publications.

Creswell, J. W., & Creswell, J. D. (2017). *Research design: Qualitative, quantitative, and mixed methods approaches*: Sage publications.

Curran, K., Graham, S., & Temple, C. (2011). Advertising on Facebook. *International Journal of E-business development, 1*(1), 26-33.

Cyr, D., & Bonanni, C. (2004). *Design and e-loyalty across cultures in electronic commerce.* Paper presented at the Proceedings of the 6th international conference on Electronic commerce.

Davenport, S. W., Bergman, S. M., Bergman, J. Z., & Fearrington, M. E. (2014). Twitter versus Facebook: Exploring the role of narcissism in the motives and usage of different social media platforms. *Computers in Human Behavior, 32*, 212-220.

Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS quarterly*, 319-340.

Davis, F. D., Bagozzi, R. P., & Warshaw, P. R. (1989). User acceptance of computer technology: a comparison of two theoretical models. *Management science, 35*(8), 982-1003.

De Vries, L., Gensler, S., & Leefglang, P. S. (2012). Popularity of Brand Posts on Brand Fan Pages: Effects of Social Media Marketing. *Marketing, 26*(2), 83-91.

Dehghani, M., & Tumer, M. (2015). A research on effectiveness of Facebook advertising on enhancing purchase intention of consumers. *Computers in Human Behavior, 49*, 597-600.

Dennison, G., Bourdage-Braun, S., & Chetuparambil, M. (2009). Social commerce defined. *White paper, 23747*.

Deutsch, M., & Gerard, H. B. (1955). A study of normative and informational social influences upon individual judgment. *The journal of abnormal and social psychology, 51*(3), 629.

Deuze, M. (2006). Participation, remediation, bricolage: Considering principal components of a digital culture. *The information society, 22*(2), 63-75.

Dhanapal, S., Vashu, D., & Subramaniam, T. (2015). Perceptions on the challenges of online purchasing: a study from “baby boomers”, generation “X” and generation “Y” point of views. *Contaduría y Administración, 60*, 107-132.

Dickey, I. J., & Lewis, W. F. (2010). The evolution (revolution) of social media and social networking as a necessary topic in the marketing curriculum: a case for integrating social media into marketing classes. *Advances in Marketing: Embracing Challenges and Change-A Global Perspective*.

Duffett, R. G. (2015). Facebook advertising’s influence on intention-to-purchase and purchase amongst Millennials. *Internet Research, 25*(4), 498-526.

Duggan, M., Ellison, N. B., Lampe, C., Lenhart, A., & Madden, M. (2015). Social media update 2014. *Pew Research Center, 19*.

Dumbrell, D., & Steele, R. (2014). Privacy perceptions of older adults when using social media technologies. *Healthcare Informatics and Analytics: Emerging Issues and Trends: Emerging Issues and Trends*, 67.

East, R., Hammond, K., & Lomax, W. (2008). Measuring the impact of positive and negative word of mouth on brand purchase probability. *International Journal of Research in Marketing, 25*(3), 215-224.

Ellsworth, J. H., & Ellsworth, M. V. (1995). *Marketing on the Internet: Multimedia strategies for the world wide web*: John Wiley & Sons.

Equacions Estructurals Bollen, K. (1989). Structural Equations with Latent Variables: New York: John Wiley & Sons, Inc. Wiley, DE (1973) The Identification Problem for Structural Equation Models with Unmeasured Variables in Goldberger AS and Duncan, OD eds. Tructural Equation Models in the Social Sciences-New York: Academic Press.

Fan, Y.-W., & Miao, Y.-F. (2012). Effect of electronic word-of-mouth on consumer purchase intention: The perspective of gender differences. *International Journal of Electronic Business Management, 10*(3), 175.

Fietkiewicz, K. J., Lins, E., Baran, K. S., & Stock, W. G. (2016). *Inter-Generational Comparison of Social Media Use: Investigating the Online Behavior of Different Generational Cohorts.* Paper presented at the 2016 49th Hawaii International Conference on System Sciences (HICSS).

García-Murillo, M. (2004). Institutions and the adoption of electronic commerce in Mexico. *Electronic Commerce Research, 4*(3), 201-219.

Gilleard, C., & Higgs, P. (2002). The third age: class, cohort or generation? *Ageing and Society, 22*(03), 369-382.

Glass, A. (2007). Understanding generational differences for competitive success. *Industrial and commercial training, 39*(2), 98-103.

Goyal, A. (2017). A study of consumer perceptions and purchase behaviour trends towards digital online buying behaviour of customers from different age-groups. *International Education and Research Journal, 3*(1).

Gruzd, A., Staves, K., & Wilk, A. (2012). Connected scholars: Examining the role of social media in research practices of faculty using the UTAUT model. *Computers in Human Behavior, 28*(6), 2340-2350.

Hair, J., Black, W., Babin, B., & Anderson, R. (2009). Multivariate Data Analysis 7th Edition Pearson Prentice Hall.

Hampton, K., Goulet, L. S., Rainie, L., & Purcell, K. (2011). Social networking sites and our lives. *Retrieved July 12, 2011 from*.

Hanna, R., Rohm, A., & Crittenden, V. L. (2011). We're all connected: The power of the social media ecosystem. *Business Horizons, 54*(3), 265-273.

Hawkins, D. I., Mothersbaugh, D. L., & Best, R. J. (2013). *Consumer behavior: Building marketing strategy*: McGraw-Hill Irwin.

Hogeboom, D. L., McDermott, R. J., Perrin, K. M., Osman, H., & Bell-Ellison, B. A. (2010). Internet use and social networking among middle aged and older adults. *Educational Gerontology, 36*(2), 93-111.

Howe, N., & Strauss, W. (2007). The next 20 years. *Harvard business review, 85*, 41-52.

Hsu, C.-L., & Lin, J. C.-C. (2016). Effect of perceived value and social influences on mobile app stickiness and in-app purchase intention. *Technological Forecasting and Social Change, 108*, 42-53.

Hu, L.-t., Bentler, P. M., & Kano, Y. (1992). Can test statistics in covariance structure analysis be trusted? *Psychological bulletin, 112*(2), 351.

Hudson, S., Roth, M. S., Madden, T. J., & Hudson, R. (2015). The effects of social media on emotions, brand relationship quality, and word of mouth: An empirical study of music festival attendees. *Tourism Management, 47*, 68-76.

Hughes, D. J., Rowe, M., Batey, M., & Lee, A. (2012). A tale of two sites: Twitter vs. Facebook and the personality predictors of social media usage. *Computers in Human Behavior, 28*(2), 561-569.

Hung, K., Li, S. Y., & Tse, D. K. (2011). Interpersonal trust and platform credibility in a Chinese multibrand online community. *Journal of Advertising, 40*(3), 99-112.

Hutton, J. (2011). Mobile phones dominate in South Africa: USC Annenberg School for Communication & Journalism.

Im, I., Hong, S., & Kang, M. S. (2011). An international comparison of technology adoption: Testing the UTAUT model. *Information & management, 48*(1), 1-8.

Jackson, V., Stoel, L., & Brantley, A. (2011). Mall attributes and shopping value: Differences by gender and generational cohort. *Journal of retailing and consumer services, 18*(1), 1-9.

Jobodwana, Z. N. (2009). E-Commerce and Mobile Commerce in South Africa: Regulatory Challenges. *J. Int'l Com. L. & Tech., 4*, 287.

Jonck, P., Van der Walt, F., & Sobayeni, N. C. (2017). A generational perspective on work values in a South African sample. *SA Journal of Industrial Psychology, 43*(1), 1-9.

Jöreskog, K. G. (1969). A general approach to confirmatory maximum likelihood factor analysis. *Psychometrika, 34*(2), 183-202.

Jr Longino, C. (2005). The future of ageism: Baby boomers at the doorstep. *Generations, 29*(3), 79-83.

Jurkiewicz, C. L., Massey Jr, T. K., & Brown, R. G. (1998). Motivation in public and private organizations: A comparative study. *Public productivity & Management review*, 230-250.

Kaplan, A. M., & Haenlein, M. (2010). Users of the world, unite! The challenges and opportunities of Social Media. *Business horizons, 53*(1), 59-68.

Kaplan, M. F., & Miller, C. E. (1987). Group decision making and normative versus informational influence: Effects of type of issue and assigned decision rule. *Journal of Personality and social psychology, 53*(2), 306.

Karisto, A. (2008). Finnish baby boomers and the emergence of the third age. *International journal of ageing and later life, 2*(2), 91-108.

Kiel, J. M. (2005). The digital divide: Internet and e-mail use by the elderly. *Medical Informatics and the Internet in Medicine, 30*(1), 19-23.

Kiesler, S., Siegel, J., & McGuire, T. W. (1984). Social psychological aspects of computer-mediated communication. *American psychologist, 39*(10), 1123.

Kietzmann, J. H., Hermkens, K., McCarthy, I. P., & Silvestre, B. S. (2011). Social media? Get serious! Understanding the functional building blocks of social media. *Business Horizons, 54*(3), 241-251.

Kim, A. J., & Ko, E. (2012). Do social media marketing activities enhance customer equity? An empirical study of luxury fashion brand. *Journal of Business Research, 65*(10), 1480-1486.

Kim, B., Choi, M., & Han, I. (2009). User behaviors toward mobile data services: The role of perceived fee and prior experience. *Expert Systems with Applications, 36*(4), 8528-8536.

Kotler, P., & Armstrong, G. (2010). *Principles of marketing*: pearson education.

Koufaris, M. (2002). Applying the technology acceptance model and flow theory to online consumer behavior. *Information systems research, 13*(2), 205-223.

Koufaris, M., & Ajit Kambil, P. A. L. (2001). Consumer behavior in web-based commerce: an empirical study. *International Journal of Electronic Commerce, 6*(2), 115-138.

Kowske, B. J., Rasch, R., & Wiley, J. (2010). Millennials'(lack of) attitude problem: An empirical examination of generational effects on work attitudes. *Journal of Business and Psychology, 25*(2), 265-279.

Kuisma, J., Simola, J., Uusitalo, L., & Öörni, A. (2010). The effects of animation and format on the perception and memory of online advertising. *Journal of Interactive Marketing, 24*(4), 269-282.

Kumar, A., & Lim, H. (2008). Age differences in mobile service perceptions: comparison of Generation Y and baby boomers. *Journal of services marketing, 22*(7), 568-577.

Kuo, Y.-F., & Yen, S.-N. (2009). Towards an understanding of the behavioral intention to use 3G mobile value-added services. *Computers in Human Behavior, 25*(1), 103-110.

Lallmahomed, M. Z., Ab Rahim, N. Z., Ibrahim, R., & Rahman, A. A. (2013). Predicting different conceptualizations of system use: Acceptance in hedonic volitional context (Facebook). *Computers in Human Behavior, 29*(6), 2776-2787.

Lee, B., Chen, Y., & Hewitt, L. (2011). Age differences in constraints encountered by seniors in their use of computers and the internet. *Computers in Human Behavior, 27*(3), 1231-1237.

Lee, G. (2015). *Business statistics made easy in SAS*: Sas Institute.

Lee, J.-H., & Song, C.-H. (2013). Effects of trust and perceived risk on user acceptance of a new technology service. *Social Behavior and Personality: an international journal, 41*(4), 587-597.

Lee, Y. E., & Benbasat, I. (2004). A framework for the study of customer interface design for mobile commerce. *International Journal of Electronic Commerce, 8*(3), 79-102.

Leist, A. K. (2013). Social media use of older adults: a mini-review. *Gerontology, 59*(4), 378-384.

Leung, L. (2013). Generational differences in content generation in social media: The roles of the gratifications sought and of narcissism. *Computers in Human Behavior, 29*(3), 997-1006.

Lewis, S., & Ariyachandra, T. (2011). Seniors and social networking. *Journal of Information Systems Applied Research, 4*(2), 4.

Li, C.-Y. (2013). Persuasive messages on information system acceptance: A theoretical extension of elaboration likelihood model and social influence theory. *Computers in Human Behavior, 29*(1), 264-275.

Lin, C.-F. (2002). Segmenting customer brand preference: demographic or psychographic. *Journal of Product & Brand Management, 11*(4), 249-268.

Lissitsa, S., & Kol, O. (2016). Generation X vs. Generation Y–A decade of online shopping. *Journal of retailing and consumer services, 31*, 304-312.

Logan, K., Bright, L. F., & Gangadharbatla, H. (2012). Facebook versus television: advertising value perceptions among females. *Journal of Research in Interactive Marketing, 6*(3), 164-179.

Loroz, P. S., & Helgeson, J. G. (2013). Boomers and their babies: An exploratory study comparing psychological profiles and advertising appeal effectiveness across two generations. *Journal of Marketing Theory and Practice, 21*(3), 289-306.

Low, G. S. (2000). Correlates of integrated marketing communications. *Journal of advertising research, 40*(3), 27-39.

Lu, B., Fan, W., & Zhou, M. (2016). Social presence, trust, and social commerce purchase intention: an empirical research. *Computers in Human Behavior, 56*, 225-237.

Lu, J., Yao, J. E., & Yu, C.-S. (2005). Personal innovativeness, social influences and adoption of wireless Internet services via mobile technology. *The Journal of Strategic Information Systems, 14*(3), 245-268.

Mackey, T. K., & Liang, B. A. (2013). Global reach of direct-to-consumer advertising using social media for illicit online drug sales. *Journal of medical Internet research, 15*(5), e105.

Margarida Barreto, A. (2013). Do users look at banner ads on Facebook? *Journal of Research in Interactive Marketing, 7*(2), 119-139.

Maslow, A. H. (1943). A theory of human motivation. *Psychological review, 50*(4), 370.

Mason, R. B. (2008). Word of mouth as a promotional tool for turbulent markets. *Journal of Marketing Communications, 14*(3), 207-224.

McDonald, R. P., & Ho, M.-H. R. (2002). Principles and practice in reporting structural equation analyses. *Psychological methods, 7*(1), 64.

McLeod, E. (2009). The use (and disuse) of mobile phones by baby boomers. *International Journal of Emerging Technologies and Society, 7*(1), 28.

McLeod, S. (2007). Maslow's hierarchy of needs. *Simply Psychology, 1*.

Mothersbaugh, D., Best, R., & Hawkins, D. (2007). Consumer Behaviour: Building Marketing Strategy: Boston: McGraw-Hill.[Links].

Neuman, W. L. (2013). *Social research methods: Qualitative and quantitative approaches*: Pearson education.

Nielson, A. (2007). Trust in advertising: A global Nielsen consumer report. *Nielsen Media Research, New York*.

Nirmala, R. P., & Dewi, I. J. (2011). The Effects of Shopping Orientations, Consumer Innovativeness, Purchase Experience, and Gender on Intention to Shop for Fashion Products Online. *Gadjah mada international journal of business, 13*(1).

Nyemba, E. S. F., Mukwasi, C., Mhakure, S., Mosiane, S., & Chigona, W. (2011a). Golden baby boomers' perceptions of online social networking sites. *Int. J. Comp. Tech. App, 2*(3), 695-703.

Nyemba, E. S. F., Mukwasi, C. M., Mhakure, S., Mosiane, S., & Chigona, W. (2011b). Golden baby boomers' perceptions of online social networking sites. *Int. J. Comp. Tech. App, 2*(3), 695-703.

O'Keeffe, G. S., & Clarke-Pearson, K. (2011). The impact of social media on children, adolescents, and families. *Pediatrics, 127*(4), 800-804.

Ogawa, M., Inagaki, H., & Gondo, Y. (2006). Usage of IT and electronic devices, and its structure, for community-dwelling elderly *Computers Helping People with Special Needs* (pp. 752-758): Springer.

Papasolomou, I. (2014). Consumerism: Some Fundamental Insights. *Handbook of Research on Consumerism in Business and Marketing: Concepts and Practices: Concepts and Practices*, 1.

Park, E., & Kim, K. J. (2014). An integrated adoption model of mobile cloud services: exploration of key determinants and extension of technology acceptance model. *Telematics and Informatics, 31*(3), 376-385.

Park, E., & Ohm, J. (2014). Factors influencing users' employment of mobile map services. *Telematics and Informatics, 31*(2), 253-265.

Parment, A. (2013). Generation Y vs. Baby Boomers: Shopping behavior, buyer involvement and implications for retailing. *Journal of retailing and consumer services, 20*(2), 189-199.

Patterson, A. (2012). Social-networkers of the world, unite and take over: A meta-introspective perspective on the Facebook brand. *Journal of Business Research, 65*(4), 527-534.

Pfeffer, J., Zorbach, T., & Carley, K. M. (2014). Understanding online firestorms: Negative word-of-mouth dynamics in social media networks. *Journal of Marketing Communications, 20*(1-2), 117-128.

Phua, J., Jin, S. V., & Kim, J. J. (2017). Gratifications of using Facebook, Twitter, Instagram, or Snapchat to follow brands: The moderating effect of social comparison, trust, tie strength, and network homophily on brand identification, brand engagement, brand commitment, and membership intention. *Telematics and Informatics, 34*(1), 412-424.

Pitta, D., Eastman, J. K., & Liu, J. (2012). The impact of generational cohorts on status consumption: an exploratory look at generational cohort and demographics on status consumption. *Journal of Consumer Marketing, 29*(2), 93-102.

Quan-Haase, A., & Young, A. L. (2010). Uses and gratifications of social media: A comparison of Facebook and instant messaging. *Bulletin of Science, Technology & Society, 30*(5), 350-361.

Rauschnabel, P. A., Praxmarer, S., & Ivens, B. S. (2012). Social media marketing: How design features influence interactions with brand postings on Facebook *Advances in Advertising Research (Vol. III)* (pp. 153-161): Springer.

Roberts, J. A., & Manolis, C. (2000). Baby boomers and busters: an exploratory investigation of attitudes toward marketing, advertising and consumerism. *Journal of Consumer Marketing, 17*(6), 481-497.

Roberts, K. K. (2010). Privacy and perceptions: How Facebook advertising affects its users. *The Elon Journal of Undergraduate Research in Communications, 1*(1), 24-34.

Rogers, E. (1983). Difi 'usion of Innovations, 3rd edn (1st edn in 1963): New York: The Free Press.

Rosen, L. D. (2011). Teaching the iGeneration. *Educational Leadership, 68*(5), 10-15.

Rowley, J. (2001). Remodelling marketing communications in an Internet environment. *Internet Research, 11*(3), 203-212.

Ryder, N. B. (1985). The cohort as a concept in the study of social change *Cohort analysis in social research* (pp. 9-44): Springer.

Sa, M. L. L., & Chai, Y. K. (2016). A Pilot Study on the Success Factors for Small and Medium Accommodation Enterprises in Malaysia: An Exploratory Factor Analysis Approach. *The International Journal of Business & Management, 4*(2), 65.

Sabate, F., Berbegal-Mirabent, J., Cañabate, A., & Lebherz, P. R. (2014). Factors influencing popularity of branded content in Facebook fan pages. *European Management Journal, 32*(6), 1001-1011.

Salancik, G. R., & Pfeffer, J. (1978). A social information processing approach to job attitudes and task design. *Administrative science quarterly*, 224-253.

Schermelleh-Engel, K., Moosbrugger, H., & Müller, H. (2003). Evaluating the fit of structural equation models: Tests of significance and descriptive goodness-of-fit measures. *Methods of psychological research online, 8*(2), 23-74.

Schewe, C. D., & Meredith, G. (2004). Segmenting global markets by generational cohorts: determining motivations by age. *Journal of consumer behaviour, 4*(1), 51-63.

Schramm-Klein, H., Swoboda, B., & Morschett, D. (2007). Internet vs. brick-and-mortar stores-analysing the influence of shopping motives on retail channel choice among internet users. *Journal of Customer Behaviour, 6*(1), 19-36.

Shim, S., Eastlick, M. A., Lotz, S. L., & Warrington, P. (2001). An online prepurchase intentions model: The role of intention to search: Best Overall Paper Award—The Sixth Triennial AMS/ACRA Retailing Conference, 2000☆ 11☆ Decision made by a panel of Journal of Retailing editorial board members. *Journal of retailing, 77*(3), 397-416.

Shin, D.-H. (2009). Towards an understanding of the consumer acceptance of mobile wallet. *Computers in Human Behavior, 25*(6), 1343-1354.

Sin Tan, K., Chong, S.-C., & Lin, B. (2013). Intention to use internet marketing: A comparative study between Malaysians and South Koreans. *Kybernetes, 42*(6), 888-905.

Solis, B. (2011). *The end of business as usual: Rewire the way you work to succeed in the consumer revolution*: John Wiley & Sons.

Solomon, M., Russell-Bennett, R., & Previte, J. (2012). *Consumer behaviour*: Pearson Higher Education AU.

Srinivasan, S. S., Anderson, R., & Ponnavolu, K. (2002). Customer loyalty in e-commerce: an exploration of its antecedents and consequences. *Journal of retailing, 78*(1), 41-50.

Sundar, S. S., Narayan, S., Obregon, R., & Uppal, C. (1998). Does web advertising work? Memory for print vs. online media. *Journalism & Mass Communication Quarterly, 75*(4), 822-835.

Sundaram, S., Schwarz, A., Jones, E., & Chin, W. W. (2007). Technology use on the front line: how information technology enhances individual performance. *Journal of the Academy of Marketing Science, 35*(1), 101-112.

Suter, V., Alexander, B., & Kaplan, P. (2005). Social Software and The Future of Conferences Right Now. *Educause Review, 40*(1).

Thompson, D. V., Hamilton, R. W., & Rust, R. T. (2005). Feature fatigue: When product capabilities become too much of a good thing. *Journal of marketing research, 42*(4), 431-442.

Tim, O. (2005). What is web 2.0? design patterns and business models for the next generation of software.

Tosun, L. P. (2012). Motives for Facebook use and expressing “true self” on the Internet. *Computers in Human Behavior, 28*(4), 1510-1517.

Uzoka, F.-M. E., Shemi, A. P., & Seleka, G. G. (2007). Behavioral influences on e-commerce adoption in a developing country context. *EJISDC, 31*(4), 1-15.

Van Slyke, C., Belanger, F., & Comunale, C. L. (2004). Factors influencing the adoption of web-based shopping: the impact of trust. *ACM Sigmis Database, 35*(2), 32-49.

Venkatesh, V., Davis, F. D., & Morris, M. G. (2007). Dead or alive? The development, trajectory and future of technology adoption research. *Journal of the association for information systems, 8*(4), 267.

Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS quarterly*, 425-478.

Venkatesh, V., Thong, J. Y., Chan, F. K., Hu, P. J. H., & Brown, S. A. (2011). Extending the two-stage information systems continuance model: Incorporating UTAUT predictors and the role of context. *Information Systems Journal, 21*(6), 527-555.

Venkatesh, V., Thong, J. Y., & Xu, X. (2012). Consumer acceptance and use of information technology: extending the unified theory of acceptance and use of technology.

Wahba, M. A., & Bridwell, L. G. (1976). Maslow reconsidered: A review of research on the need hierarchy theory. *Organizational behavior and human performance, 15*(2), 212-240.

Waldron, K. A. (2012). The iGeneration: Technology guidelines for parents and teachers.

Walsham, G. (2008). Icts and global working in a non-flat world *Information technology in the service economy: Challenges and possibilities for the 21st century* (pp. 13-25): Springer.

Wang, C., & Zhang, P. (2012). The evolution of social commerce: The people, management, technology, and information dimensions. *CAIS, 31*, 5.

Wang, K. H., Chen, G., & Chen, H.-G. (2017). A model of technology adoption by older adults. *Social Behavior and Personality: an international journal, 45*(4), 563-572.

Yoo, C. Y., Kim, K., & Stout, P. A. (2004). Assessing the effects of animation in online banner advertising: Hierarchy of effects model. *Journal of interactive advertising, 4*(2), 49-60.

Zhou, T. (2011). Understanding mobile Internet continuance usage from the perspectives of UTAUT and flow. *Information Development, 27*(3), 207-218.

Zikmund, W. G., Babin, B. J., Carr, J. C., & Griffin, M. (2013). *Business research methods*: Cengage Learning.

APPENDIX A

Dear Sir/Madam,

RE: COMPLETION OF QUESTIONNAIRE

Thank you for your attention to this academic questionnaire.

My name is Neo Makgalong Radise and I am studying towards a Master of Management in Strategic Marketing at the Witwatersrand Business School, Johannesburg. I am required to conduct research as part of fulfilling the requirements of my Masters degree.

I would like to invite you to take part in this study by first viewing the video advertisements, and supporting static advertisement, attached to each question in the attached survey. Please be assured that your responses will be used for this academic research only

Should you have any queries relating to the research, please feel free to e-mail me
(761865@students.wits.ac.za). Alternatively, you may contact my thesis supervisor, Dr. Yvonne Saini (yvonne.saini@wits.ac.za).

10 randomly selected participants who successfully complete the survey will be given R100 worth of airtime. Please send your details to my student email address stated above if you would like to be considered for this giveaway.

Section A: General information

A1: Were you born between the year 1946 and 1964?

Yes	No

A2: Do you have an active Facebook profile?

Yes	No

If no, please do not proceed with this survey.

<u>Section B: Questionnaire</u>

Effectiveness of In-application advertisements





Please watch the above short video and view the banner advert before you proceed

Regarding the Vodacom Mega Your Data Facebook video advertisement above, (On a scale of 1 – 7 where 1 is strongly disagree and 7 is strongly agree) Please indicate to what extent you agree or disagree with the following statements regarding In-application Advertisements on Facebook:

		Strongly disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree
		1	2	3	4	5	6	7
1	I do notice company branded advertisement campaigns on Facebook?							
2	I interact (click on link or watch video) with any banner advertisements on Facebook?							
3	Vodacom has strong presence on Facebook?							
4	I have seen the Vodacom Mega-U campaign banners and videos on Facebook?							

(Duffett, 2015)

Performance expectancy



Please watch the short above video and view the banners before you proceed

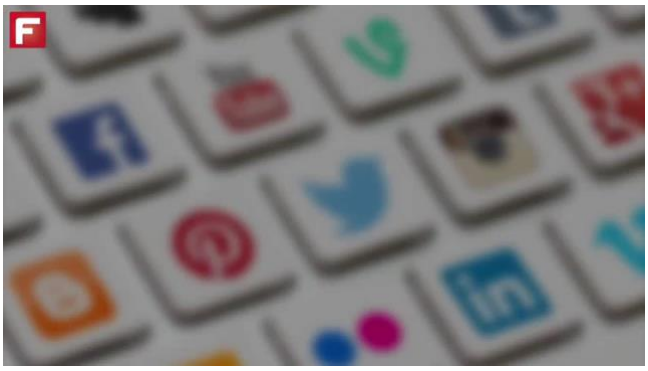
Please indicate to what extent you agree or disagree with the following statements.

		Strongly disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree
		1	2	3	4	5	6	7
1	I find Facebook useful in my everyday life							
2	If I use Facebook I'll be able to connect with friends and family							

3	If I use Facebook it will increase my chances of sourcing information on product and services							
4	Facebook is safe and it monitors what companies post (E.g.: advertisements) on the platform to maintain quality							

(Gruzd, Staves, & Wilk, 2012; Hung, Li, & Tse, 2011)

Effort Expectancy





Please watch the above short video and view the banners before you proceed

Please indicate to what extent you agree or disagree with the following statements.

		Strongly disagree	**Disagree**	**Slightly Disagree**	**Neutral**	**Slightly Agree**	**Agree**	**Strongly Agree**
		1	**2**	**3**	**4**	**5**	**6**	**7**
1	I know what social media is							
2	Social media sites are easy to use, simple and flexible to interact with							
3	Searching for products through Facebook advertising saves me time and effort							
4	Interacting with products on Facebook does not require a lot of my mental effort							

(Chin, Diehl, & Norman, 1988; Davis, Bagozzi, & Warshaw, 1989; Im, Hong, & Kang, 2011; Thompson, Hamilton, & Rust, 2005)

Social Expectancy



Please watch the above short video before you proceed

Please indicate to what extent you agree or disagree with the following statements.

		Strongly disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree
		1	2	3	4	5	6	7
1	My family and friends encouraged me to get onto Facebook							
2	My peers know what Facebook is							
3	My peers in my circle support the use of Facebook to stay connected							
4	Being on social media means that I'm also technologically savvy							

(Im et al., 2011)

Purchase Intent

Would you say that advertisements above, that was on Facebook, has had a positive or negative influence on your buying decisions?

Negative	Positive





Please watch the above 2 short videos and view the banners before you proceed





Have you seen these static adverts on Facebook?

On a scale of 1 – 7 (where 1 is strongly disagree and 7 is strongly agree) Please indicate to what extent you agree or disagree with the following statements regarding In-application Advertisements.

		Strongly disagree	Disagree	Slightly Disagree	Neutral	Slightly Agree	Agree	Strongly Agree
		1	2	3	4	5	6	7
1	After seeing a banner advertisement, do you go to the page and look for more information on the product you've seen advertised?							
2	After seeing the Vodacom Mega-U banner advertisement, does this							

	influence you to buy or play the Vodacom game?							
3	After seeing the Vodacom Mega-U campaign banner advertisement, does it encourage you to say positive things about the Vodacom brand?							

(Shim, Eastlick, Lotz, & Warrington, 2001)

Section C: Demographic

C1: Please indicate your gender

Male	**Female**

C2: Please indicate your race

Black	**Coloured**	**Indian**	**White**	**Other**

C3: On average, how much time do you spend on Facebook a day?

1-3 hours,	**4 -7 hours**	more than **7 hours**

C4: What is your highest level of education achieved?

Primary school	**High School**	**Matric**	**Tertiary Education**

APPENDIX B

Consistency matrix

Research problem stated here					
Sub-problem	**Literature Review**	**Hypotheses or Propositions or Research questions**	**Source of data**	**Type of data**	**Analysis**
Information technology innovations are rapidly changing and creating variety of new applications and features online, little attention is given to how seniors adopt and use these technologies and features.	(B. Lee et al., 2011; Lewis & Ariyachandra, 2011). (Leist, 2013). (Hampton, Goulet, Rainie, & Purcell, 2011). (Gilleard & Higgs, 2002). (Fietkiewicz et al., 2016). (Kiel, 2005)	H1: Performance expectancy has a positive effect on purchase intent among back baby boomers H2: Effort expectancy has a positive effect on purchase intent among black baby boomers H3: Social influence has a positive effect on purchase intent among black baby boomers H4: Risk expectancy has a positive effect on purchase intent among black baby boomer H5: Credibility expectancy has a positive effect on	Self-administrated questionnaires Journal directory: Emerald Research (Duffett, 2015)	Ordinal	Structural model equation and confirmatory factor analysis Path modelling

Research problem stated here					
Sub-problem	**Literature Review**	**Hypotheses or Propositions or Research questions**	**Source of data**	**Type of data**	**Analysis**
Establishing the relationship between innovative technology and consumer purchasing patterns and behaviour and to establish with variable holds the strongest relationship in advertising for baby boomers		H1: Performance expectancy has a positive effect on purchase intent among back baby boomers H2: Effort expectancy has a positive effect on purchase intent among black baby boomers H3: Social influence has a positive effect on purchase intent among black baby boomers H4: Risk expectancy has a positive effect on purchase intent among black baby boomer H5: Credibility expectancy has a positive effect on	Data collected from self-administrated questionnaire	Ordinal	Path coefficient strength

End of research report