The Influencers of Consumption Frequency Intention in the Sparkling Soft Drinks Category amongst South African youth.

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A research report submitted to Wits Business School, Faculty of Commerce, Law and Management, University of the Witwatersrand, Johannesburg, in partial fulfilment of

the Degree of Master of Management in Strategic Marketing

November 2015
DECLARATION

I, Neo Phiri, 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 at the University of the Witwatersrand, Johannesburg. It has not been submitted before for any degree or examination in this or any other University.

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November 2015
ABSTRACT

Building, maintaining and measuring consumption frequency over a specific period of time has become the primary driver of success for nonalcoholic beverage organisations; however, there is limited research on youth consumption frequency within South Africa. Using the Theory of Planned Behaviour, the study aimed to investigate the impact of brand association, flavour variety, peer influence and perceived value on consumption frequency intention in the sparkling soft drink (SSD) category amongst youth in South Africa. A quantitative research design was followed and data collected from 300 research participants aged between 16 and 24 years in Soweto, Gauteng Province in South Africa. The collected data was analyzed using SPSS 22 and AMOS 21 statistical packages for structural equation modelling.

All four hypotheses are supported, with results indicating a positive relationship between brand association, flavour variety, peer influence, perceived value and consumption frequency intention. Peer influence and perceived value have a significantly stronger influence on consumption frequency intention. The results also indicate that flavour variety “ambiguous SSD flavour names” scored higher amongst 16 to 18 years olds. Ambiguous flavour naming strategies have proven to be successful in other beverage categories. Quantity-frequency (QF), a consumption frequency measurement instrument has been used, with consumption skewed towards “sharing” with friends or family. This study contributes significant new knowledge to the existing body of marketing literature in Africa and consumer behaviour in emerging markets. This study has implications for practitioners, academicians and public policy makers.

Key words: Brand Association, Consumption, Emerging Markets, Flavour Variety, Peer Influence, Perceived Value, Soft Drinks.
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CHAPTER 1. INTRODUCTION

1.1 Introduction

This chapter introduces the research topic by focusing on the purpose of the study, the context of the study, the problem statement and sub-problems, the research questions and research objectives, the significance of the study, the delimitations of the study, the definition of terms and the assumptions. The chapter concludes with the report structure.

1.2 Purpose of the study

The purpose of this study is to investigate the influence of brand association, flavour variety, peer influence and perceived value, on consumption frequency intention in the sparkling soft drink category amongst South African youth.

1.3 Context of the study

Globally, Sparkling Soft Drinks (SSDs), also referred to as carbonates, are under pressure due to competitor rivalry from smaller local regional players driving SSDs/Carbonates flavour innovation and competing on price (BMI, 2014; MarketLine, 2014). Global SSDs contribute 34.4% to soft drinks; in China, SSDs contribute 17.4% to soft drinks, and in South Africa 56.6% to soft drinks (MarketLine, 2014). Substitutes of non SSDs such as juices, bottled water and energy drinks, have also put pressure on SSDs (MarketLine, 2014).

In South Africa, SSD flavours now contribute 52% and SSD colas contribute 48% (BMI, 2014). Flavour contribution has surpassed that of colas. Competition within SSDs is increasing and beverage manufacturers must offer high-quality products that are relevant to consumers, distribute them efficiently, ensure safety, while keeping prices low (MarketLine, 2014). Figure 1-1 is an illustration of SSD purchases during
2015 showing a decline and a trending increase in non-purchase trends within a Western developed market (Fajardo, 2015).

![Soda purchases](image)

**Figure 1-1: Percentage of purchases vs non purchases**

*Source: (Fajardo, 2015)*

South Africa is a flavour driven market with consumer’s dominant trend being flavour variety (BFAP, 2013). China and South Africa SSD market is dominated by flavours, while, in the USA, Europe and some parts of Asia, the SSD market is dominated by colas. Perhaps the time has come for discovering unique emerging market characteristics to which Sheth (2011), as well as Chikweche and Fletcher (2014), referred. In his seminal work “Impact of emerging markets on marketing: rethinking existing perspectives and practises”, Sheth (2011) states that the Africa setting brings unique characteristics of emerging markets with which marketers will need to contend and question existing practices and perspectives that have been previously contextualised for developed markets.

Recently, the global SSD growth has been driven by emerging markets (Datamonitor, 2010). The rise of the emerging markets is less than three decades old (Sheth, 2011). By 2035, emerging markets GDP is expected to surpass that of advanced markets (Wilson & Purunshothaman, 2003). Burgess and Steenkamp (2006)
challenge the existing Western marketing theory and practices, and propose a four stage process for this transformation. In support of this, Sheth (2011, p. 166) asserts the need to “rethink marketing theory, strategy, policy and practice in light of the unique nature of emerging markets”. According to Sheth (2011), advanced countries are aging rapidly, stagnant or growing slowly, with future growth predicted to come from emerging markets. SSD manufacturers are now investing heavily in Africa. M. Kent, The Coca-Cola Company chief execution officer, has singled out Africa as a key growth continent for SSDs (Datamonitor, 2010).

By 2050, Africa’s population is expected to have doubled to 1.9 billion, meaning that in 2050 Africa’s predicted population will be double that of Europe’s population (Datamonitor, 2010) and manufacturers are aiming to capitalise on the predicted rapid growth. A significant population growth is forecast for 2050. A leader in African marketing literature has echoed that this rise in emerging markets needs rethinking of existing practices as it will disrupt both existing marketing theory and current practice in marketing, as emerging markets will drive future marketing practice and discipline (Sheth, 2011).

South Africa and Brazil rank in the World’s top 20 SSDs per capita consumption, while China, India, Russia, Nigeria, Kenya and Egypt rank in the top 35. The SSD per capita consumption for South Africa has improved from 136 in the year 1991 to 247 in the year 2012 (The Coca-Cola Company, 2012). This growth is in line with the SA economic growth of 3.2% per annum, on average, from 1994 to 2013 with the largest sectoral contributors to overall GDP growth between 1994 and 2013 being financial services 1.0%; manufacturing 0.5%; trade sector 0.5%; transport sector 0.48%, as well as agriculture and electricity and mining sectors (IDC, 2014). Figure 2-1 is an illustration of SA Sectoral contribution to overall GDP growth of 3.2% (IDC, 2014).
In support of the SSD predicted future growth, KPMG Africa (2014) has singled out geographies within Africa that are believed will have strong growth in the Fast Moving Consumer Goods industry over the next ten years; some of these geographies are Angola, Kenya, Nigeria and Zambia. The main drivers of growth in these key regions are expected to be an increase in population, growth in middle class, urbanisation and a large youthful population. South Africa’s population living on less than $US 2 a day is 26.2% (The World Bank, 2015); this is indicative of the spending power of a quarter of the population. Relative to other African countries, South Africa has a lower base percentage of people living on $US 2 per day. In comparison to BRICS, India and South Africa have a higher base percentage of people living on $US 2 per day.

In the SSD category, consumption frequency, also known as frequency of drinking, includes consumer consumption/drinking patterns like; ‘less than once a week’, ‘once a week’, ‘2–4 times a week’, ‘5–6 times a week’, ‘once a day, every day’ and ‘more than once a day, every day’ (Grimm et al., 2004; Vereecken, Inchley, Subramanian, Hublet & Maes, 2005).
Empirically based evidence on consumption frequency in Africa, whilst growing, is still very limited, with studies conducted in Nigeria, Kenya, Ghana and South Africa (Ukegb, Onimawo, Ukegbu, 2007; Ansa, Anah & Ndifon, 2008; Mise, Nair, Odea & Ogutu, 2013; Fadupin, Ogunkunle & Gabriel, 2015). Empirical evidence in the Western markets has indicated that taste, price, brand name, advertising, packaging have been viewed as some of the factors influencing consumption of soft drinks (Sdrali, Anisiadou, Goussia-Rizou & Costarelli, 2010). However, most of the empirical evidence in the Western markets has researched the consequences of consumption frequency (French & Hannan, 2004; James, Thomas & Cavan, 2004; Malik, Schulze & Hu, 2006; Shi, Dal Grande, Taylor, Gill, Adams, Wittert 2010; Eshak, Iso, Kokubo, Saito, Yamagishi, Inoue & Tsugane, 2012; Tabas & Glass CK, 2013), and not necessarily the influencers of consumption frequency intention.

Prior research by Pettigrew, Jongenelis, Chapman and Miller (2015), in the area of consumption behaviour, indicates that consumption frequency was primarily influenced by parents’ attitudes to soft drinks, children’s pestering behaviours, and perceived social norms relating to children’s consumption of these products. This study focuses on youth consumption frequency.

Patterns of alcohol and sugar sweetened products consumption amongst youth in Nigeria have been studied by Fadupin, Ogunkunle and Gabriel (2015); the results from Nigeria are crucial for this study, as the health concerns of Western markets are not as strong, SSDs are viewed from a social angle versus a consequence angle that has been highlighted in Western markets literature. In a study on South African children and adolescents, the results indicate that the average number of servings consumed is two to three servings per day. Limited studies have been found on consumption frequency in the SSD category in South Africa (Louwrens, Venter & Otty, 2010).

There is a gap in understanding the impact of brand association, flavour variety, peer influence and perceived value on consumption frequency in the sparkling soft drink category amongst youth in South Africa. In view of the identified gap, the objectives of this study were as follows:
Firstly, the current study sought to investigate how brand association influences consumption frequency intention amongst South African youth. Brand associations consist of “all brand-related thoughts, feelings, perceptions, images, experiences, beliefs, attitudes that become linked to the brand note” (Kotler & Keller, 2015, p. 193). Young consumers strongly and actively use knowledge in evaluating products during purchasing decisions (Mohd Suki, 2013).

Secondly, this study sought to investigate how flavour variety influences consumption frequency intention amongst South African youth. Childhood consumption of a flavour can result in preference for the flavour for a lifetime (Mennella & Beauchamp, 2005). The study by Louwrens et al., (2010) indicates that children and adolescents in South Africa ranked taste as the main reason for soft drink consumption. Results from a study conducted in India amongst children and adolescents ranked taste as the leading factor that influences consumption of sparkling soft drinks (Arora & Anand, 2012).

Thirdly, this study sought to establish how peer influence impacts consumption frequency intention amongst South African youth. Reference groups are also known as peer groups. Kotler and Armstrong (2015, p. 171) state that “reference groups serve as indirect points of comparison or reference in forming a person’s attitudes or behaviour”. Reference groups often seek peer social acceptance, with consumption patterns being influenced by their peers.

Lastly, the study investigated how perceived value influences consumption frequency intention amongst South African youth. According to Parasuraman and Grewal (2000), perceived value is an important indicator of repurchase intention. Fiol, Alcaniz, Tena and García (2009) indicate that perceived value can be viewed as a two-path construct, a benefit gets received, while the other makes a sacrifice. Perceived value is a mutually beneficial relationship, if one party considers that they do not receive benefits, they will seek an alternative.

The research intends to give insights that could ensure that South Africa’s SSD category contribution does not decline below the current SSD 56.6% contribution to
soft drinks. Based on the context of the SSD category, the next step discusses the research problem.

1.4 Problem statement

The SSD category is under pressure due to smaller local regional players driving SSD flavour innovation and competing on price. Further pressure on SSDs is coming from substitutes, such as juices, bottled water, energy drinks and ready-to-drink ice teas (BMI, 2014; MarketLine, 2014). A significant amount of research has been conducted in the USA, Europe, Asia and some parts of Africa and possible determinants of consumption have been identified as taste, advertising, brand name, price, packaging, peer pressure, thirst, celebration, friend’s and parent’s consumption habits, the availability of a soft drink at school or at home and viewing of television (Loewen & Pliner, 2000; Grimm et al., 2004; Sdrafi, Anisiadou, Goussia-Rizou & Costarelli, 2010; Dehdari & Mergen, 2012; Fadupin, Ogunkunle & Gabriel, 2015; Pettigrew, Jongenelis, Quester, Chapman & Miller, 2015).

Limited studies in Africa; Nigeria, Kenya and Ghana (Ukegb, Onimawo, Ukegbu, 2007; Ansa, Anah & Ndifon, 2008; Mise, Nair, Odea & Ogutu, 2013; Fadupin, Ogunkunle & Gabriel, 2015), have attempted to investigate the influence of brand association, flavour variety, peer influence and perceived value on consumption frequency intention in the sparkling soft drink category amongst youth. The National Youth Development Agency, (NYDA, 2014) has indicated that youth contribute significantly to the population of South Africa. Understanding the influencers of youth consumption frequency intention within the SSD category provides justification for this study.

The intent of this study was to investigate the influence of each predictor variable on the outcome variable. In his seminal work, Sheth (2011) states that the Africa setting brings unique characteristics of emerging markets with which we will need to contend and question our existing practices and perspectives which have been previously contextualised for developed markets. In this study, the influencers helped to develop
and discover new perspectives and practices of consumption frequency intention in the SSD category amongst South African youth.

1.4.1 Main problem

To understand the impact of brand association, flavour variety, peer influence and perceived value, on consumption frequency intention of SSDs amongst South African youth.

1.4.2 Sub problem 1

To investigate how each predictor variable influences consumption frequency intention of SSDs amongst South African youth.

1.4.3 Sub problem 2

To determine which predictor variable holds the strongest relationship with consumption frequency intention of SSDs amongst South African youth.

1.5 Research Objectives and Research Questions

1.5.1 Research objectives

The aim of the study was to achieve the following research objectives:

1. To investigate the influence of brand association on consumption frequency intention of SSDs amongst South African youth
2. To investigate the influence of flavour variety on consumption frequency intention of SSDs amongst South African youth
3. To investigate the influence of peer influence on consumption frequency intention of SSDs amongst South African youth
4. To investigate the influence of perceived value on consumption frequency intention of SSDs amongst South African youth
1.5.2 Research questions

The research aimed to answer the following research questions:

a) How does brand association affect consumption frequency intention of SSDs amongst South African youth?

b) How does flavour variety affect consumption frequency intention of SSDs amongst South African youth?

c) How does peer influence affect consumption frequency intention of SSDs amongst South African youth?

d) How does perceived value affect consumption frequency intention of SSDs amongst South African youth?

1.6 Significance of the study

The study aimed to add value to the field of marketing. The significance thereof can be categorized into the following areas; managerial, theoretical and contextual contribution.

1.6.1 Managerial contribution

Findings from this study provide consumption frequency insights that can be used to craft marketing strategies and develop more relevant marketing plans; these will benefit brand managers, agencies, research organisations, creative advertising agencies, media agencies and youth strategists. The research intends to also make a contribution to retail trade category managers and buyers with regards to flavour insights. Findings from the study will assist managers when crafting health well-being programmes related to consumption frequency amongst the youth.

The results of the research could be used in reviewing existing policies that government have put in place regarding sugary products like SSDs. Manufacturers will need to comply with regulations and can also assist in the joint development of
policies that can benefit organisations, government (including health department and schools) and consumers regarding mindful consumption of SSDs. Globally, regulation of responsible marketing to children has remained at the top of the agenda, as empirical evidence from the USA and Europe highlighted increasing concerns of the consequences of high consumption on health risks and obesity amongst children and the youth.

1.6.2 Theoretical contribution

The research adds to the existing academic literature in South Africa and emerging markets, thereby enabling other scholars to conduct research in other geographies, across age groups and other product categories using the identified constructs.

1.6.3 Contextual contribution

The research adds unique perspectives relating to the fast moving consumer good (FMCG) industry, regarding youth consumption behaviour in South Africa SSD category. Sheth (2011) proposes that marketers need to scrutinise some of the assumptions that have been previously made about emerging markets. According to Hund (1991), context matters in marketing, as marketing is a contextual discipline. Potentially, this study could guide practitioners, public policy makers and academicians who wish to understand the influence of brand association, flavour variety, peer influence and perceived value, on consumption frequency intention of South African youth.

1.7 Delimitations of the study

The study is limited to:

- The youth between the ages of 16 and 24 residing in Soweto, South Africa
- The SSD Category
- Respondents who have consumed SSDs over the past three months or past four weeks or past seven days or past 24 hours
- Respondents who are aware of the SSD Category
1.8 Definition of terms

It is necessary to understand the key concepts that are referred to in the study. The following are definitions of some of the key concepts used in the study.

- **Brand association**
  “All brand-related thoughts, feelings, perceptions, images, experiences, beliefs, attitudes that become linked to the brand node” (Kotler & Keller, 2015, p. 193).

- **Flavour variety**
  Within the context of SSDs, SSD flavour variety is defined as “a flavoured beverage that is sweetened, either naturally or artificially which is carbonated with carbon dioxide” (BMI, 2014, p. 2).

- **Peer influence**
  “The extent to which peers exert influence on an individual’s attitudes, thoughts and behaviours” (Mokgosa & Mohube, 2007, p. 65).

- **Perceived value**
  “Consumer’s overall assessment of the utility of a product based on perceptions of what is received and what is given” (Zeithaml, 1988, p. 14).

- **Consumption frequency**
  Defined as frequency of drinking “every day,” “5-6 times a week,” “3-4 times a week,” “1-2 times a week,” and “less than once a week or never” (Grimm, Harnack & Story, 2004, p. 1245).

- **Consumption frequency intention**
  Defined as “individuals’ intention to perform a particular behavior…the extent to which individuals are willing to try, or are planning to make an effort when performing the behaviour” (Duarte & Krajsic, 2015, p. 97)
1.9 Assumptions

The study has the following assumptions:

- It is assumed that respondents have enough understanding of the SSD category to be able to answer the questions asked.
- It is assumed that respondents have consumed a SSD in the past three months or past four weeks or past seven days or past 24 hours/daily.
- It is assumed that feedback from n=300 respondents is representative of South Africa youth.

1.10 The Research flow of the study

The research flow of this study is depicted in Figure 3-1 below:

![Figure 3-1: Research flow](Author's own compilation)
1.11 Outline of the study

The flow of the study and the chapter outline is depicted in Table 1-1 below:

**Table 1-1: Outline of the study**

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**Source:** (Author's own compilation)
1.12 Summary

This chapter outlined an overview of the study undertaken. The introduction was outlined, including the context in which the study was conducted. The chapter also included the problem statement and the research gap that forms the motive for having conducted the study. Moreover, the research questions and research objectives were presented. It can be expected that this study will contribute to marketing literature. Lastly, the outline of the study is presented that highlights the framework of the study. The next chapter includes a comprehensive review of the literature.
CHAPTER 2. LITERATURE REVIEW

2.1 Introduction

This chapter assesses previously published studies on which the study is based, the Theory of Planned Behaviour (TPB) which underpins this study is first discussed; then followed by an empirical review of brand association, flavour variety, peer influence and perceived value. It incorporates an assessment of the SSD category and the youth market. This is followed by the conceptual model and hypotheses statements. Then, in concluding, the key learnings acquired in the literature reviewed are summarised. In compiling a literature review “researchers may become aware of inconsistencies and gaps that may justify further research” (Welman, Kruger & Mitchell, 2012).

2.2 The Theoretical Framework

![Theoretical model of the Theory of Planned Behaviour](image)

Figure 4-1: Theoretical model of the Theory of Planned Behaviour

Source: (Fishbein & Ajzen, 1975; Ajzen, 1985; Ajzen, 1991; Balian, 2009)
2.2.1 Theory of Planned Behaviour

2.2.1.1 Overview and definition of the Theory of Planned Behaviour

The Theory of Planned Behaviour (TPB), was developed as an extension of the Theory of Reasoned Action (TRA) (Lee, 2009). TPB argues that both behavioural attitude and subjective norms affect behavioural intention, TPB adds to TRA a third factor – perceived behavioural control – that affects behavioural intention (Fishbein & Ajzen, 1975; Ajzen, 1985; Ajzen, 1991). The addition of perceived behavioural control to the original TRA is meant to add knowledge about the potential constraints on performing an action (Armitage & Conner, 200; Balian, 2009). Figure 4-1 above is an illustration of TPB.

The aim of this study is to investigate the influencers of consumption frequency intention. The TPB therefore facilitates in predicting the influencers of intention to either consume or purchase.

TPB is a social psychology theory that attempts to understand and predict one’s behaviour, as it is concerned with individuals’ intention to perform a particular behaviour. TRA was said to have performed poorly in explaining behaviours where there are constraints such as e.g. availability and cost of SSDs (Sparks et al., 1992; Petrovici et al., 2004; Balian, 2008; Balian, 2009; Montano & Kasprzyk, 2008; Riebl, et al., 2015). The TRA took non-economic factors into account (Petrovici et al., 2004), while The TPB is a micro level theory derived from expectancy-value theory (Balian, 2009).

According to Ajzen (1991) the TPB framework is based on three predictors of intention that are independent, yet have an impact on individuals’ intention to perform a certain behaviour, these predictors of intention include: attitude, subjective norm and perceived behavioural control. TPB states that attitudes (A), can be positive or negative evaluations of the behaviour, secondly, subjective norm (SN) is the degree to which an individual is influenced by those around them - family/friends and thirdly, perceived behavioural control (PBC) is the perceived ease or difficulty of completing
the behaviour (Fishbein & Ajzen, 1975; Ajzen, 1985; Riebl, et al., 2015). TPB believes that attitude (A), subjective norms (SN), and perceived behavioural control (PBC) are determinants of behavioural intention as illustrated in Figure 4-1.

2.2.1.2 Application of the Theory of Planned Behaviour

TPB has been applied by numerous researchers who support the usefulness of TPB in explaining behaviours, prediction of intention, as well as performance (Shepherd & Farleigh, 1986; Shepherd & Towler, 1992; Stafleu, de Graaf, van Staveren & de Jong, 1994; Brewer, Blake, Rankin and Douglass, 1999).

TPB has been applied successfully in a number of studies for explaining behaviour; for milk consumption intention (Tuorila, 1987); for intake of salt (Shepherd & Farleigh, 1986); for intake of fat (Shepherd & Towler, 1992; Stafleu, de Graaf, van Staveren & de Jong, 1994); for purchase of organic foods (Maria et al., 2001); for predicting consumption of SSDs among male adolescents (Kassem & Lee, 2004); for online purchasing behaviour (George, 2004); for consumer food choice studies (Karijin et al., 2007); for fruit and vegetable consumption (Gratton, Povey & Clark-Carter, 2007); for intention to play online games (Lee, 2009); for intention to use a handheld or hands-free mobile phone when driving (Zhou, Wu, Rau & Zhang, 2009); for predicting halal food purchase intention among consumers in Malaysia (Alam & Sayuti, 2011); and for predicting breakfast consumption frequency (Mullan, Wong, Kothe & Maccann, 2013).

2.2.1.3 Relevance of the Theory of Planned Behaviour

The main aim of this study is to investigate the influencers of consumption frequency intention. The TPB therefore facilitates in predicting the intention to either consume or purchase SSDs, as the TPB is based on three predictors of intention that are independent, yet have an impact on individuals’ intention to perform a certain behaviour TPB allows for investigation of (A), (SN) and (PBC) which may enable further understanding of factors influencing intention (Balian, 2009).
Karijin et al., (2007)’s study on attitude towards meat purchasing found that (A) attitude, (SN) subjective norm, and (PBC) perceived behavioural control had significance for intention to consume meat. TPB framework and the three predictors of intention have an impact on individuals' behaviour to perform a specific behaviour.

Firstly, attitude (A) towards the behaviour has an important role in influencing consumer intention. Duarte and Krajsic (2015) indicated that attitude towards the behaviour, which denotes the degree to which individuals have either unfavourable or favourable evaluations of the behaviour. In this study, these evaluations are based on flavour variety and brand association. Empirical evidence by Alam and Sayuti (2011, p. 16), indicates that “those with high positive attitudes appeared to have greater intentions to intent to purchase food products”. Attitude toward a behaviour is determined by accessible behavioural beliefs linking the behaviour to various outcomes and attributes.

Secondly, subjective norm (SN) has an important role in influencing consumer intention. Zou et al., (2009) indicated that subjective norms result from normative beliefs about the normative expectations of others and motivation to comply with these expectations. In this study, subjective norm is the perceived social pressure that influences consumers’ decision to consume SSDs, and is referred to as peer influence. Bonne et al., (2007) and Alam and Sayuti (2011)’s studies both indicated that subjective norm was positively and significantly related to intention. TPB allows for inclusion of social influence as consumption behaviours take place in a social context where peers, siblings or parents are visible (Birch & Fisher, 1998; Balian, 2009).

Thirdly, perceived behavioural control (PBC) has an important role in influencing consumer intention. Ajzen (1991) indicated that perceived behavioural control is the extent to which a person feels able to engage in the behaviour. In this study, perceived behavioural control is the ability to purchase SSDs and referred to in the context of perceived value. Based on (PBC), Alam and Sayuti (2011)’s study indicated that the more the control an individual feels about making food purchases, the more likely he or she will do so.
2.3 Brand association

The American Marketing Association defines brand as “name, term, sign, symbol, design or combination, intended to identify goods and services and to differentiate them from the competition”. In his seminal work on “Customer based brand equity”, Keller (1993) conceptualizes brand knowledge as those associations about a brand recalled from memory.

Brand association has been defined as the thoughts that are linked to the brand in a consumer’s memory which consist of consumer brand experiences that influence perceptions, preferences and choices that ultimately become linked to a brand in memory (Aaker, 1991; Chang & Chieng, 2006; Romaniuk & Gaillard, 2007; Boisvert & Burton, 2011; Ilicic & Webster, 2015; Sasmita & Mohd Suki, 2015).

Memory researchers define brand association as accumulated knowledge that has been organized in the memory and forms a network of associative connections (Murdock, 1982; Hintzman, 1986). Keller (1998)’s definition is based on memory concept as information neurons series transferring information to a central neuron where information and meaning about the brand is stored. Aaker (1991)’s definition referred to anything “linked” to the brand in the memory. In light of this, various authors (Park, Millberg & Lawson, 1991; Morton, 1994; Krishnan, 1996; Keller, 1998; Río, Vazquez & Iglesias, 2001) indicate that this “anything linked” that was referred to by Aaker (1991), can be associated with thoughts towards the image, spokesperson or a symbol that has no relationship with the actual product performance.

For the purpose of this study, brand association is defined as “all brand related thoughts, feelings, perceptions, images, experiences, beliefs, attitudes that become linked to the brand node” (Kotler & Keller, 2015, p. 193).

Brand association is related to information on what is in the customer’s mind about the brand, either positive or negative, connected to the node of the brain memory (Emari et al., 2012; Sasmita & Mohd, 2015). Knowledge and understanding of brand associations is crucial for marketers to better differentiate their brands from
competitors through strategic positioning, creating a positive brand image and aiding in the retrieval of brand information (Aaker, 1991; Low & Lamb, 2000; Ilicic & Webster, 2015). Brand association acts as an information collecting tool to execute brand differentiation and brand extension (Osselaer & Janiszewski, 2001).

When consumers make a purchase decision, it is assumed that reference is made to the brand associations stored in the memory (Aaker, 1991). According to Keller (1993), consumers need to be reminded using contextual cues, as the information in the memory needs reminders; this is supported by Schmitt and Dube (1992) as well as Punj and Moon (2002), who indicate that contextual cues can have an effect on consumer judgment. Cues can increase content retrieval during a purchase decision (Keller, 1987). Boisvert and Burton (2011) suggest that awareness and brand strategy influence the extent of transfer of associations. Cohen (1982) also stipulates that contextual cues can positively influence consumers to purchase. A clear and unique positioning can lead to strong brand associations. At the time of judgment, the consumer's attitude tends to rely on the favourable information stored in the memory (Keller 1987; Río, Vazquez & Iglesias, 2001).

The challenge for marketers is to have marketing programmes that drive favourability (Río, Vazquez & Iglesias, 2001; Wang & Tsai, 2014). This can be done through using various communication elements working together with a unified message, referred to as integrated marketing communication (IMC). Copley (2014, p. 445) defines IMC as “the cohesive mix of marketing communications activities, tools and techniques that deliver a coordinated and consistent message to target customers and consumers synergistically in order to achieve organisational goals”. Advertising, sales promotion, social media, publicity and PR, sponsorships, as well as inducing customers to spread positive word of mouth (WOM and eWOM) can be used to promote brand associations (Copley, 2014; Keller & Armstrong, 2015; Kotler & Keller, 2015).

Continuous focus on building product intrinsics (great taste, smell) and positive brand experiences is important in the SSD category. Availability of SSDs as well as good supply chain, good segmentation and good relationships with customers is also important.
2.4 Flavour variety

Flavour continues to be the main reason consumers choose to consume certain product types (Wismer et al., 2005; Altisent, Jaeger, Johnston & Harker, 2013). According to Hughes (1991), flavour is the sensation elicited by a foodstuff when the taste and odour receptors are stimulated.

For the purpose of this study, SSD flavour variety is defined as “a flavoured beverage that is sweetened, either naturally or artificially which is carbonated with carbon dioxide” (BMI, 2014, p. 2)

Jaeger and Macfie (2001) have indicated that taste is an important factor when consumers choose fresh fruits. Wismer et al., (2005) have also indicated that development of improved and novel flavours continues to remain a primary focus in fruit breeding. DuBose, Cardello and Maller (1980) previously indicated that colour is an important attribute for food products, as it “influences consumers first judgement of the product and also provides sensory information and texture cues that can determine overall acceptability”. It is critical for marketers to remain knowledgeable about both beverage and food quality attributes that can determine consumer purchase intention.

Various types and flavours of SSDs are available in South Africa. These are grouped into the cola, diets and flavoured segments. South Africa is a flavour driven market with consumer’s dominant trend being flavour and variety, followed by health (BFAP, 2013). The SSD market growth is driven by flavours. In South Africa, regular flavoured SSDs sales increased from 42.4% in 2010 to 52% in 2014. The 52% flavour contribution constitutes of 49% regular flavour and 2% diet flavour (BMI, 2014).

In terms of current SSD flavour variants, there is an estimated count of fifteen SSD flavour options (Aztec, 2014). In a recent study, 43% of respondents indicated that novel interesting flavours, flavour combinations, fun/excitement is important to them (BFAP, 2014). This is in line with the SSD contribution in SA of 52% flavour and 48%
colas. The BFAP (2013) study indicates that the consumer’s dominant trend is flavour and variety.

Local regional players have become aggressive and are innovating new SSD flavours beyond the fruit name into “ambiguous flavour naming strategies”. These ambiguous flavour naming strategies have proven to be successful in other beverage categories. Miller and Khan (2005) indicate that consumers tend to react favourably to unusual names which they refer to as conversational implicature, based on Grice’s (1975) theory. In “ambiguous flavour naming strategies” consumers are not able to interpret the meaning of the names, but focus on their own underlying reason of the communication.

Empirical evidence by Miller and Khan (2005) indicates some of the successes of the strategies of ambiguous naming. In their study, they classified names according to “common (a typical, unspecific; e.g., dark green, light yellow), common descriptive (typical, specific; e.g., pine green, lemon yellow), unexpected descriptive (a typical, specific; e.g., Kermit green, rainslicker yellow), and ambiguous (a typical, unspecific; e.g., friendly green, party yellow)” they continued to explain how these names can influence perceptions and lead to purchase intentions. Gollety and Guichard (2011) indicate that 27 of the 62 respondents chose favourite flavour as more influential than favourite colour, however the younger children in the study indicated that colour is more influential to them, compared to flavour. Roedder-John (1999) previously indicated that younger children are driven by perceptual criteria of shape and colour. According to Grossman and Wisenblit (1999), the use of colour can differentiate product.

The above literature review indicates that names affect purchase. In South Africa, some of the local regional SSD players are already implementing ambiguous flavour naming strategies. Empirical evidence by Miller and Khan (2005) indicates that over time, familiarity to the ambiguous name reduces.

There is therefore a gap in literature regarding flavour, flavour names, as well as ambiguous naming (Miller & Khan, 2005). This study fills this gap by providing
insights. Both taste preferences and ambiguous naming raise very interesting questions, as studies have indicated that naming strategies can lead to purchase intent, as the consumer is left to make a meaningful connection regarding the message the ambiguous name communicates. Marketers need be knowledgeable on flavours and have a flavour strategy that includes flavour naming insights, especially within consumable brands. Colour, fruity flavour names, ambiguous names as well as the taste of a product can be used as SSD points of product differentiation.

2.5 Peer influence

Various scholars have defined peer influence within the context of peer groups as peers who regularly interact with each other, a best friend, closest five friends, cliques or groups, current acquaintances and friends (Akers et al., 1979; Kandel, 1985; Chassin et al., 1986; Ritter, 1988; Ryan, 2001; Opoku, 2012).

For the purpose of this study, peer influence is defined as “the extent to which peers exert influence on an individual’s attitudes, thoughts and behaviours” (Mokgosa & Mohube, 2007, p. 65).

This study looks at peer influence within the context of peer groups. According to Kotler and Armstrong (2015), behaviour of consumers is influenced by social networks, family, small groups to which consumers belong. The words reference group and peer group/influence are often used interchangeably; Bearden and Etzel (1982) refer to this as a person or people who influence one’s behaviour significantly.

As outlined by Kotler and Armstrong (2015), a person belongs to many groups. This is also evident in “the Asian Brand Strategy” by Roll (2005), based on the independent versus the dependent self. The influence of culture cannot be ignored in the context of peer influence; the hierarchy of needs between different cultural groups differs between the West and Asia. The Western self-actualization need is classified in the Asian context by social needs of status, affiliation and admiration (Roll, 2005).

As peers spend more time with their peers, they tend to have a greater influence on each other, the influence tends to be higher than that of parents, as acceptance from

Personal image is important amongst peers, and their consumption pattern is usually that of their desired image or that of their peers (Roper & Shah, 2007; Stead, McDermott, MacKintosh & Adamson, 2011). Roper and Laniene (2009) indicate that as children grow into adolescence, so does the level of peer pressure and their social status increases as they consume well-known brands compared to unbranded brands.

Norgaard, Hansen and Grunert (2013) suggest that snack consumption and peer influence differed from young adolescents to older adolescents, with both indicating that they expressed their self-image through their snacking consumption behaviour, as they consumed snacks that assisted them to define their social status among their peers. The study also revealed that the older adolescents were more concerned about expressing their self-image and how they are perceived, indicating that there is a link between how they want to be perceived and their consumption of snacks. Newman et al., (2007)’s study indicates that girls are more influenced by peers than boys - and that girls are generally more health conscious.

The youth is a key strategic market segment and organisations that have clear marketing plans that take into account the importance of peer influence, will gain a sustainable competitive advantage. Marketers can help create positive conversations about their brands by reaching opinion leaders or student leaders who are influencers of groups. Marketers need to closely monitor how buying behaviour is influenced by peers. Programmes targeted toward peer influence will benefit marketers. Peer influence has been seen to vary across various product categories (Bachmann, John & Rao, 1993; Mokgosa & Mohube, 2007). Learnings from Norgaard, Hansen and Grunert (2013) indicate that the attributes where peer influence is large, are those that are visible in the social interaction with peers and that these may support the self-image enhancing function. For marketers, attributes like positioning, pack design, colours, taste and novelty are becoming increasingly important as they positively affect consumer perception. Marketers can use advertising that encourages group purchasing with emphasis on security and acceptability of choice and companionship.
Marketers can also sponsor events that are youth related, as well as designing marketing programs or selling products to young adult consumers.

2.6 Perceived value

The Utility theorist, Lancaster (1971), gives the theoretical foundation for the value construct, saying that consumers do not buy a product, but buy attributes at a certain price. Numerous authors have indicated that value is given when a product/service has the ability to satisfy the consumer needs and wishes (Zeithaml, 1988; Sinha & DeSarbo, 1998; Sweeney & Soutar, 1999; Snoj, Pisnik Korda & Mume, 2004; Morar, 2013). According to Monroe (1990, p. 46), perceived value is “a tradeoff between the quality or benefits they perceive in the product relative to the sacrifice they perceive by paying the price”. Fornell et al., (1996, p. 9) defines perceived value as “perceived level of product quality relative to the price paid”, while Stevens (1992, p. 44) defines perceived value as “the notion of value for money refers primarily to the relationship between price, quality and quantity”.

For the purpose of this study, perceived value is defined as “consumer’s overall assessment of the utility of a product based on perceptions of what is received and what is given” (Zeithaml, 1988, p. 14). Thus, this study refers to the perceived value of SSDs as a potential customer’s overall perception based on their benefits and sacrifices.

Keller (1998, p. 178) believes that “consumers combine perception of quality with perception of cost in order to reach to an assessment of perceived value”. The theoretical definitions of the value of construct have led to problems and restraints in operationalizing the construct (Bolton & Drew, 1991; Caruana, Money & Berthon, 2000). The literature shows that the concept of “value” has been used as multidimensional with dimensions of both functional character and emotional or affective nature (Morar, 2013). Functional character dimensions include monetary value, versatility, quality of services, non-monetary sacrifices and price, while affective dimension includes feelings or emotions generated by services (Morar, 2013).
Researchers mainly consider perceived value as being multidimensional, with types of dimensions. Various authors have used the following dimensions; Zeithaml (1988) uses four dimensions, namely intrinsic attributes, extrinsic attributes, quality, price (monetary and nonmonetary) to measure CPV; Sheth et al., (1991) uses five dimensions, namely social, emotional, functional, epistemic, and conditional value, to measure CPV; Kantamneni and Coulson (1996) proposed a four-dimensional model to measure CPV, namely societal value, experiential value, functional value, and market value, and Grewal, Monroe and Krishnan (1998) proposed a two dimensions model to measure CPV, namely, perceived acquisition and perceived transaction value; Parasuraman and Grewal (2000) have a four dimensional model acquisition value, transaction value, in-use value, and redemption value to measure CPV.

In addition, Sweeney and Soutar's (2001) customer perceived value model, termed PERVAL has shown how the four dimensions of emotional value, social value, quality/performance value, and price/value for money have power on consumer attitudes and purchase behaviour. Table 2-1 below depicts the four dimensions:

**Table 2-1: Four-value dimensions**

<table>
<thead>
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<th>1. Emotional Value</th>
<th>The utility derived from the feelings or affective states that a product generates</th>
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<tr>
<td>2. Social value (enhancement of social self-concept)</td>
<td>The utility derived from the product's ability to enhance social self-concept</td>
</tr>
<tr>
<td>3. Functional value (price/value for money)</td>
<td>The utility derived from the product due to the reduction of its perceived short term and longer term costs</td>
</tr>
<tr>
<td>4. Functional value performance/quality</td>
<td>The utility derived from the perceived quality and expected performance of the product</td>
</tr>
</tbody>
</table>

*Source: (Sweeney & Soutar, 2001)*

The PERVAL measures have been proven to be one of the best tools. Most scholars have used the PERVAL measures in empirical studies of customer perceived value (Petrick, 2004; Tam, 2004; Pura, 2005; Cheng, Wang, Lin, Vivek, 2009; Dahlén, Granlund & Groenroos, 2009), this shows that the amount of literature on customer perceived value is increasing. Based on the customer perceived model, empirical evidence by Chi and Kilduff (2011), indicated that price had the most significant
relationship to customer perceived value. This finding is evident in their study as they indicated that consumers would buy and recommend a product if it delivers the desired value. According to Treadgold (1999), consumers in Asia are more value conscious than ever, while the most compelling Asian retail opportunities are at the value end of the market.

Empirical evidence by Voss et al., (1998) indicates that price affects satisfaction in a hotel check-in scenario. According to Woodruff (1997), delivering value or perceived value can lead to a competitive advantage. Marketers need to ensure that marketing communication and in-store execution are addressed to meet this market place advantage. Value driven customers are most likely to buy value products and frequent the stores that sell value products. Marketers need to adopt strategies related to the value expected by the consumer, in order to ensure long term success (Woodruff, 1997; Morar, 2013; Jamal & Sharifuddi, 2015).

2.7 Consumption frequency intention

According to Alam and Sayuti (2011, p. 12) “Intention reflects future behavior”. Consumption frequency intention has been defined within the context of behavioural intention as “a person’s intentions to perform various behaviors…the degree of conscious effort that a consumer will exert in order to conduct a monetary transaction” (Thakur & Srivastava, 2013, p. 58). Consumption frequency intention has also been defined as a consumption pattern towards one or more brands over a specific period of time (Goodhart, Ehrenberg & Chatfield, 1984; Keller, 2001; Uncles, Wang & Kwok, 2010), whilst, consumption frequency has been defined as frequency of drinking “every day,” “5-6 times a week,” “3-4 times a week,” “1-2 times a week,” and “less than once a week or never” (Grimm, Harnack & Story, 2004, p. 1245).

For the purpose of this study, consumption frequency intention is defined as “individuals' intention to perform a particular behavior…the extent to which individuals are willing to try, or are planning to make an effort when performing the behaviour” (Duarte & Krajsic, 2015, p. 97).
Consumption frequency can be influenced by personal, stimulating, cultural and psychological factors (Kotler & Armstrong, 2015; Kotler & Keller, 2015). Further literature indicates that satisfaction, perceived quality, service quality, trust and preference may lead to repeat purchase behaviour (Aaker 1991; Chiang Dhlolakia 2003; Limayen, Hirt & Cheung 2007; Tsai & Huang 2007; Ahmed & Nawaz 2010; Chinomona, Mahlangu & Pooe, 2013). When consumers become missionaries and evangelists of a brand, they spread the good news as they themselves also become regular users, this leads to consumption frequency as it can drive bottom line profit for the organization (Keller, 2008). Consumers who form a bond with a brand are less likely to be vulnerable to disruption, meaning that the profits from consumers who have a bond with the brand are more rooted in loyalty; it is therefore important that brands establish strong consumer attachments to realise devoted and profitable repurchasing (Jacoby & Chestnut, 1978; Dick & Basu, 1994; Oliver, 1999; Kotler & Keller, 2012).

Numerous studies in the mobile data services continue to empirically assess factors that drive consumer intentions to continue usage of mobile data services (Hong, Thong, Moon & Tam, 2008). As both the mobile sector and SSD categories penetrate all aspects of consumer’s life, the ways that consumers use them and the reasons behind the usage will vary depending on the many different contexts of daily life (Hong et al., 2008).

Various instruments are used to measure frequency; according to Rehm (1998), this can be done in four ways, namely, quantity-frequency (QF), graduated frequency (GF), diary methods and short-term recall methods. Frequency measures ask for frequency of consumption within different categories like, 1 to 3 times a day, once per day or 1 to 2 times per week. Volume consumed may be included. In this study, quantity frequency is used to measure consumption by youth between 16 and 24 years.

In South Africa, SSD family packs/sharing packs contribute 68.5%, (BMI, 2014), meaning that the sharing occasion is most dominant. In the context of SSD consumer consumption, the consumption frequency is more relevant than repeat purchase intention, as repeat purchase is shopper focused. Empirical evidence indicated that
daily consumption of students was 26% (Vereecken et al., 2005), another study also indicated a large number of daily soft drink usage at 30% and 18% in less than once per week (Grimm et al., 2004).

Marketing literature has indicated what the benefits of consumption frequency are to the organisation (Aaker, 1991; Aaker 1996; Reichheld, 1996; Kotler & Armstrong 2015; Kotler & Keller 2015), these include repeat purchases and retaining existing consumers that could lead to an increase in the organisation’s bottom line results. Empirical studies conducted by scholars such as, Onimawo and Ukegbu (2007) and Ansa, Anah and Ndifon (2008) have demonstrated the benefits of consumption and consumption frequency of sparkling soft drinks, they have demonstrated that SSDs are refreshing, great for social occasions, are thirst quenching, have good taste and go well with food. SSDs have been found to be associated with obesity risk (French & Hannan, 2004; James, Thomas & Cavan, 2004; Malik, Schulze & Hu, 2006), and a range of other chronic diseases including diabetes (Malik, Popkin, Bray, Després, Willett & Hu, 2010), cardiovascular diseases (Eshak, Iso, Kokubo, Saito, Yamagishi & Inoue, 2012), asthma and mental health problems (Shi, Dal Grande, Taylor, Gill, Adams, Wittert 2010), metabolic syndrome (Malik, Popkin, Bray, Després, Willett & Hu, 2010). Some chronic diseases share some common physiological characteristics such as increased inflammation (Tabas & Glass CK, 2013) or obesity. In Japan, SSD consumption has been associated with strokes in women (Eshak, Iso, Kokubo, Saito, Yamagishi, Inoue & Tsugane, 2012).

Tampah-Naah and Amoah (2015) indicated in a recent survey conducted amongst women in Ghana that women who were unemployed consumed fewer alcoholic beverages than those employed, this means affordability and value are critical factors that can be a barrier to consumption frequency.

In the United States of America (USA), Europe and some parts of Asia, major concerns about the increasing consumption of SSDs, specifically in schools have been raised (American Academy of Pediatrics, Committee on School Health, 2004). Similar studies have been conducted in Africa, and the results of these did not mirror the global concerns of high consumption of SSDs (Heller, Burt & Eklund, 1990;
Bellisle & Cachera, 2001; Ukegb, Onimawo, Ukegbu AU, 2007; Ansa, Anah & Ndifon, 2008). Despite concerns from both Western and some Eastern markets, sugar-sweetened beverages consumption has over the past few decades increased in Mexico and in the USA (Duffey & Popkin, 2007; Barquera, Hernandez-Barrera & Tolentino, 2008). The focus of this study is based on the predictor variables, with consumption frequency intention being the outcome variable.

2.8 Sparkling soft drink (SSD) category

SSDs are defined as beverages that are sweetened, either naturally or artificially, which are carbonated with carbon dioxide (BMI, 2014). According to MarketLine (2014), these can also be called carbonated soft drinks and consist of colas, diet colas, fruit-flavoured carbonates, other carbonates and mixers. Globally, colas contribute 41.3% while fruit-flavoured carbonates contribute 32% to market. The Coca-Cola Company is the leader globally at 47.9% contribution of volume, and PepsiCo at 20.7% of the market. In the Western markets, both the USA and Europe have experienced weak growth over the past few years in both value and volume. USA contributes 29.1% to the global SSD market value. Europe has been affected by the competitor pressure of four key players. France is experiencing weak volume and value growth. Germany is enjoying growth from fruit flavoured sparkling beverages contributing 53% to Germany’s sparkling beverage market value, while the cola sparkling contributes 27% of the market. Just like Germany, China and South Africa also have the fruit flavoured segments as the largest contributor to market. China’s fruit flavoured sparkling soft drinks contribute 41.4% to market value; this is quite significant as 33.6% of Asia-Pacific is from China (MarketLine, 2014).

In South Africa, competition from local regional brands is increasing and consumer preferences are changing, providing new opportunities for manufacturers of SSDs. The local competitors are innovating unique flavour variants and challenging the mystique of historic global brands; consumers are gaining confidence in the local competitors. In South Africa, local smaller SSD players like Jive, Twizza, Kingsley, Coo-ee and Refresh, continue to compete on price (BMI, 2014). These local smaller regional SSD players are both flavour and price driven. Although this market is very
price sensitive (BMI, 2014), the African consumer has previously been assumed to always be looking for cheaper, lower quality brands and home brands that are unbranded, however a McKinsey & Company (2012) report indicates that the African consumer places a higher importance on quality when making a purchase decision, and only after this, considers price. In South Africa, new flavours continue to keep the consumers interested in the SSD drinks market. Consumers seek interesting flavours and variety, as well as healthier offerings (BFAP, 2013). Bottom end retail continues to see good growth due to the focus on distribution strategies that have been targeted towards the informal sector (BMI, 2014). Manufacturers need to ensure that their brands are available within easy access to consumers (Chikweche & Fletcher, 2014).

2.9 Youth segment

The African Youth Charter refers to “Youth” as those between 15 and 35 years (African Union Commission, 2006). The United Nations state that “Youth” can be understood as a period that an individual is in transit from childhood dependence to adulthood independence, which is ages 15 to 35 years. However, for UN statistical consistency across regions, the United Nations definition is based on those between the ages of 15 and 24, but for activities at national level they adopt the definition based on the particular member state, being between the ages of 15 and 35 years, as given in the African Youth Charter (UNESCO, 2015). Various scholars have defined and quoted the ages thereof and lifestyle behaviours (Chrysochou, Krystallis & Giraud, 2012) and lifestyle segmentation (Herbison & Boseman, 2009) with the aim of describing this segment. Because of their spending power and potential, they have become lucrative to marketers.

Globally, the Population Reference Bureau (2013) classifies youth as those between 10 and 24 years. By 2050, youth in the World will be 20% of total population, in South Africa it is expected to be 23% of total population. According to Census (2011), 66.8% of South Africans are below the age of 35 years, with 56.3% of South Africans being between the ages of 14 and 34 years.
For the purpose of this study, youth is defined in the context of the African Youth Charter, as “those who are 15 to 35 years”. This study focuses on 16 to 24 year olds.

Globally, the youth, being those born between 1977 and 1999 are known as millennial or digital generation (Herbison & Boseman, 2009; Chuah, Lazarevic, 2012; Moore, 2012; Meyers & Morgan, 2013; Grotts & Johnson, 2013; Marimuthu & Ramayah, 2014). According to Meyers and Morgan (2013) and Moore (2013), the millennial generation are children and descendants of baby boomers and Generation X.

They mainly use internet and mobile technologies, they are more technologically savvy and visit multiple websites per day (Kumar & Lim, 2008; Hamid, 2011; Meyers & Morgan, 2013). Cellphones and laptops are their main means of communication. They are purposeful with their time and careers, they are optimistic, confident and motivated. They were born between 1977 and 1994 and make up 20% of the world’s population and are also known as the millennial group. They are racially and ethnically diverse, they are optimistic about the future. They are always in a hurry and influenced by peers and media. According to Chuah, Marimuthu and Ramayah (2014), they have a high rate of brand switching. In this study, they are referred to as Youth, although they are broadly referred to as millennials.

The youth “millennials” are said to influence trends (Grotts & Johnson, 2013), they are expressive, and they are prepared to spend a little bit more on brands that are in line with their aspirations, although they are value seekers. They are conscious of price. They are opinionated, liberal, and driven by innovation. According to BMI (2014), “millennials will influence brands, social media, politics, and religion in a new powerful way”. Image is important to them, they are optimistic and expressive, yet sceptical, they were born into technology and this has made them impatient. However, because they are technologically minded, they are efficient and do things quicker, they adapt well to different environments (BMI, 2014). Marketers will need to ensure that positioning of brands develop positive brand associations. Digital media, personalised packs, innovation, and value are amongst some of the things they seek (Prinsloo, 2014).
According to Peterson (2014), 41% of teen’s money is spent on food and clothing, with food being 20%. A recent South Africa study by HDI (2015), a youth agency in South Africa, indicates a similar spending pattern to the global pattern, as 19% of the youth in SA spend their money on clothes and 12% on food.

2.10 Conceptual/Research model and hypotheses statement

![Conceptual model diagram]

**Figure 5-1: Conceptual model**

*Source: (Author's own compilation based on data collected through literature review)*

The research model conceptualized in this study is shown in Figure 5-1 above. This model is derived from the concepts discussed earlier. In this conceptualized research model, brand association; flavour variety; peer influence and perceived value are the predictor variables; and consumption frequency intention is the outcome variable.

The model has been formulated in order to explain the influence of the four influencers on consumption frequency intention in the SSD category amongst South African youth. The four hypotheses are examined with regard to the research model.

2.10.1 Brand association and consumption frequency intention

Empirical evidence from a youth alcohol study indicated that brand association has a high influence on consumption intention amongst individuals between the ages of 18
and 25 years. It also indicated that advertising cues led to brand recall which exerts influence of alcohol consumption intention amongst the youth (Manuel, Jose & Aldás 2011). Numerous authors highlight the role that advertising has on brand recall and alcohol consumption (Collins et al., 2007; Smith & Foxcroft, 2009).

Further empirical evidence demonstrated that brand association plays a prominent role in shaping consumer intention (Low & Lamb, 2000; Belén, Vazquez & Iglesias, 2001; Boisvert & Burton, 2011; French & Smith, 2013; Ilicic & Webster, 2015; Sasmita & Mohd Suki, 2015).

Based on the literature and empirical evidence investigated, the following hypothesis is proposed:

\[ H_1 \Rightarrow \text{there is a positive relationship between brand association and consumption frequency intention amongst South African youth.} \]

2.10.2 Flavour variety and consumption frequency intention

Dehdari and Mergen (2012) indicated that flavoured SSDs influenced consumption intention of secondary school students in India. Loewen and Pliner (2000)’s study indicated that adolescents are often more willing to taste novel foods than younger children. Consumers continue to make consumption choices based on flavour (Hughes, 1991; Jaeger & Macfie, 2001; Wismer et al., 2005; Altisent et al., 2013). In addition, Grimm et al. (2004)’s study on soft drink consumption indicated that taste was the strongest construct, with those who reported taste as the strongest construct mentioning that they are more likely to consume soft drinks five or more times per week. Hence the following hypothesis is proposed:

\[ H_2 \Rightarrow \text{there is a positive relationship between flavour variety and consumption frequency intention amongst South African youth} \]
2.10.3 Peer influence and consumption frequency intention

Mauel et al. (2011, p. 196)’s study indicated that "the higher the frequency of alcohol consumption by peers, the higher the alcohol consumption intention of the individual, reflecting the individuals need to be accepted by the group". According to Dotson and Hyatt (1994), peer groups tend to exert influence amongst the youth, based on the fact that they want to be accepted by the peer group.

Empirical evidence indicated that social factors such as peers, can be a power influence on food choices and consumption (Wouters, Larsen, Kremers, Dagnelie & Geenen, 2010; Norgaard, Hansen & Grunert, 2013).

Makgosa and Mohube (2007) state that peer groups tend to influence product selection, information processing, attitude formation and shopping behaviour.

Based on the literature and empirical evidence investigated, the following hypothesis is proposed:

\[ H_3 \Rightarrow \text{there is a positive relationship between peer influence and consumption frequency intention amongst South African youth} \]

2.10.4 Perceived value and consumption frequency intention

According to Zeithaml (1988), perceived value is an important influencer of consumer decision making, further stating that behavioural intentions are a result of perceived value. Empirical evidence by Jamal and Sharifuddin (2015) indicated that obtaining value is an important factor for consumers. A study by Parasuraman and Grewal (2000) indicated that perceived value was the most important indicator of consumer intention.

Based on the literature and empirical evidence investigated, the following hypothesis is proposed:

\[ H_4 \Rightarrow \text{there is a positive relationship between perceived value and consumption frequency intention amongst South African youth} \]
2.11 Summary

The above chapter discussed the literature on the influencers of consumption frequency intention for SSDs. The literature review points to a conclusion that the collective factors of brand association, flavour variety, peer influence and perceived value seem to influence consumption frequency intention in the SSD category. The chapter also discussed the theoretical framework of this study, being the Theory of Planned Behaviour (TPB).
CHAPTER 3. RESEARCH METHODOLOGY

3.1 Introduction

This chapter identifies and describes the methodology—defined by Wagner, Kalluwich and Garner (2012, p. 271) as “the study of procedures for carrying out research”—that is employed in this research. Specifically, it has four objectives; namely, to identify and describe the research paradigm, the research strategy, the research design, as well as the research procedure and methods. The chapter also describes the reliability and validity measures this research applied to make it credible, the limitations of the research procedure and methods, as well as ethical considerations.

3.2 Research paradigm

3.2.1 Positivist approach

The study follows a positivist approach. The positivist approach is objective in nature. The study is based on “what the researcher can observe and measure objectively” (Welman et al., 2012). The founder of this approach, Auguste Cote, believed that scientific knowledge is far more representative of truth, than that derived from speculation (Wagner et al., 2012).

The researcher is in need of tangible results that establish truth and objective reality (Wagner et al., 2012). This approach has been viewed as being objective (Crotty, 1998; Schwandt, 2001; Bogdan & Biklen, 2003; Wagner et al., 2012). The conflicting theorists, being the anti-positivists, believe in experiencing of human behaviour relative to observable human behaviour that the positivist approach support (Welman & Kruger, 2000).

According to Cohen and Grabtree (2006), the positivist approach research is evaluated using validity, reliability and generalizability; Bogdan and Biklen (2003) are in support of this as they believe that the positivist approach emphasises facts and causes of behaviour.
3.3 Research strategy

3.3.1 Quantitative method

Bryman (2012), Creswell (2014) and Neuman (2014) define research strategy as a procedure that involves the orientation of conducting the study, the focus being developing a strategy for the research process, including how the researcher intends to proceed with the research process, as well as plans and procedures from the broad assumptions to data collection, through to data analysis and interpretation. There are three types of research strategies being qualitative, quantitative, and mixed method research strategy. In this study, the researcher employed a quantitative research strategy.

Quantitative research strategy is the best fit for the study, as the researcher needs to understand the best influencers of outcomes, it identifies variables to study, uses unbiased approaches and observes and measures information numerically, furthermore, it allows for structural equation models that incorporate causal paths and the identification of collective strength of multiple variables (Creswell, 2014). However quantitative method has a number of disadvantages, it is often carried out in unnatural or artificial environments, relies on numerical options rather than narratives, it pre-sets answers and does not necessarily indicate how people feel, a study could be misguided based on wrong questions, and it does not give people a chance to talk about their opinions (Creswell, 2003; Malhotra & Peterson, 2006; Malhotra, 2010).

Since the researcher is looking for findings that can be generalized and used as recommendations in the SSD market, “quantitative methodology will give conclusive evidence as the data gathered from the sample will be quantified and statistical analysis applied” (Malhotra, 2010, p. 104). This study determines, evaluates and selects the best course of action, and is therefore conclusive in nature (Malhotra, 2010). In quantitative method, numeric data is gathered from the sample and the learnings, thereafter generalized to the universe under study (Maree, 2007). Table 3-1 below outlines the major advantages and disadvantages of quantitative method.
Table 3-1: Advantages and disadvantages of quantitative research method

<table>
<thead>
<tr>
<th>Advantages</th>
<th>Disadvantages</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Large sample sizes increase generalizability of results.</td>
<td>1. Difficulty of developing accurate survey instruments.</td>
</tr>
<tr>
<td>2. Surveys are much better in generating data volume than in-depth data structures</td>
<td>2. Limits to the in-depth detail of data structures.</td>
</tr>
<tr>
<td>3. Ability to distinguish small differences.</td>
<td>3. The ability of surveys to meet the criteria of randomness allows the use of sophisticated statistical methods of analysis</td>
</tr>
<tr>
<td>4. Ease of administering and recording questions and answers.</td>
<td>4. Difficulty in assessing respondent truthfulness.</td>
</tr>
<tr>
<td>5. Ability of using advanced statistical analysis</td>
<td>5. Problems of timeliness and potentially low response rates</td>
</tr>
</tbody>
</table>

*Source: (Hair, Bush & Ortinau, 2003, p. 256)*
3.4 Research design

3.4.1 Cross sectional design

Malhotra (2010), Bryman (2012) and Creswell (2014) define research design as a framework that provides direction for procedure of data collection and analysis to structure and solve a research problem. The choice of a research design inquiry reflects decisions of the priority being given to dimensions in the research process. There are five generic research designs, being cross-sectional design, longitudinal design, case study design, comparative design, and experimental design. In this study, the researcher employs cross-sectional design.

The study is over a single point in time, allowing for the researcher to collect data at a defined single point in time and to have a temporal view of the social phenomena of the SSD category. Cross sectional design technique is used to gain insights regarding the influencers of consumption frequency intention in the sparkling soft drinks category amongst South African youth at a single point in time on more than one case. A cross sectional design involves collecting data from more than one case, at a single point in time (Malhotra, 2010; Bryman 2012; Neuman 2014 and Babbie 2015). According to Bryman (2012, p. 58) “a cross sectional design entails the collection of data on more than one case (usually quite a lot more than one) and at a single point in time in order to collect a body of quantitative or quantifiable data in connection with two or more variables (usually many more than two), which are then examined to detect patterns of association.”

The researcher collected data between 01 August and 30 August 2015. The main advantage of the cross-sectional design that the researcher followed is that it costs less, it is also simple to select a representative sample, it allows for different respondents to be selected each time and response bias is eliminated (Malhotra, 2010). The cross-sectional design however, does not detect change and does not allow for large amount of data collection and is open to lower levels of accuracy (Malhotra, 2010). This method is appropriate as this study is for a defined period.
3.5 Sampling design

3.5.1 Target population and sampling

When conducting research, a six step target population and sampling process can be followed, as illustrated in Figure 6-1 below:

![Diagram of sampling process]

**Figure 6-1: Target population and sampling procedure**

*Source: (Churchill, 1999, p. 536; Chinomona, 2011, p. 85)*

Malhotra (2010), Bryman (2012) and Neuman (2014) define target population as the universe of units from which a sample is to be selected, this includes a specified large group about which information is wanted, and it involves the collection of elements or groups that contains information sought by the researcher of which the results of the sample or elements are generalized.
The target population is based on the research goals. The research targeted 300 participants who reside in South Western townships (Soweto) area in Johannesburg, which is situated in Gauteng Province in South Africa.

### 3.5.2 Sampling frame

Bryman (2012), Wagner et al., (2012) and Neuman (2014) define sampling as a small segment that is selected from a population for participation in research, of which the sampling frame lists the units in the population from which samples are selected. Wagner et al., (2012, p. 274) further define sampling as “the selection of a sample for participation in research”.

The sampling unit is Soweto. Soweto has a population of 1.3 million (Census, 2011). National Youth Development Agency (2011) and UNFPA (2013) indicate that 24% of South Africans are between the age of 15 and 24. It is therefore assumed that the target population is 312,000. The extent “refers to the geographical area” (Malhotra & Peterson, 2006, p. 326); this is the geographical area of Soweto, targeting three sub places; namely Dobsonville, Meadowlands and Orlando; marked in Figure 7-1 below:

![Map of Soweto, Gauteng](Gauteng Maps/Soweto Map, 2015)

**Figure 7-1: Map of Soweto, Gauteng**

*Source: (Gauteng Maps/Soweto Map, 2015)*

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3.5.3 Sample size

The target sample size was 300. The researcher distributed 380 questionnaires. 350 respondents contributed to the study. 50 were put aside as a result of incomplete responses. A total of 300 questionnaires were used for the final data analysis. As a result, this yielded a 100% response rate based on the initial target sample size of 300.

This sample size is large enough to account for incidence rates and completion rates (Malhotra, 2010). This sample is able to “estimate a proportion near 0.5 with 95 percent confidence level and 5 percent precision level” (Malhotra & Peterson, 2006, p. 405).

3.5.4 Sampling method

According to Bryman (2012) and Neuman (2014) snowball sampling is a non-probability sampling method in which the researcher makes initial contact with a small group of people who are relevant to the research topic and then uses these to establish contacts with others. The data was collected through three initial respondents based in the three Soweto sub places; namely Dobsonville, Meadowlands and Orlando. These initial respondents were able to identify the target of interest, as this study follows snowball sampling method.

Snowball sampling is utilised when it is not easy to identify the target of interest (Malhotra & Peterson, 2006). This is applicable for this study as groups of “16 to 24 year old youth who are aware of SSDs and have consumed SSDs over the past 3 months or past 4 weeks or past 7 days or past 24 hours” were not easily identifiable. Snowball technique increases “the likelihood of locating the desired characteristics in the population, it also results in relatively low sampling variance and costs” (Malhotra & Peterson, 2006, p. 334). During the fieldwork, snowball method allowed for a high response rate, as the respondent selection was targeted.

The researcher did not provide incentives to the initial respondents, due to budget limitations; this means that the researcher verbally thanked the initial respondents for
their participation. Table 3-2 outlines the major advantages and disadvantages of snowball method.

Table 3-2: Data collection techniques; snowball method

<table>
<thead>
<tr>
<th>Advantages</th>
<th>Disadvantages</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Ability to identify units to be included in sample as there may be not obvious list</td>
<td>1. Could include an over-representation of certain respondents which could lead to sampling bias.</td>
</tr>
<tr>
<td>2. Individuals are able to recruit others who might have a common characteristics</td>
<td>2. It makes it impossible to determine possible sampling error and make statistical inferences from the sample to the population.</td>
</tr>
<tr>
<td>3. Makes it easier to identify sub-groups within a population such as age or gender</td>
<td></td>
</tr>
<tr>
<td>4. Can be the most viable access to a specific sample of respondents</td>
<td></td>
</tr>
</tbody>
</table>


3.5.5 Ethical considerations when collecting data

Bryman (2012), Wagner et al., (2012), and Newman (2014) emphasise that ethics need to be considered in each phase of the research process and that ethical research needs to be conducted as participants could be easily harmed emotionally or physically, researchers must protect participants against loss of dignity, democratic freedom, privacy or self-esteem. Bryman (2012) further stipulates that the main areas of ethical concern relate to harm to participants, lack of informed consent, invasion of privacy and deception.

The researcher has attached a consent letter in Appendix 3 on the first page of the measurement instrument. The researcher did not harm the respondents physically or developmentally, nor induce stress or loss of self-esteem, nor entice them to perform reprehensible acts, nor deceive them or invade their privacy. The researcher obtained informed consent of the participants before interviewing them. The researcher protected the participants, including securing the data obtained from the interview and not revealing identity of participants.
3.6 Measurement instrument design

3.6.1 Measurement instrument and items

Bryman (2012), Wagner et al., (2012) and Babbie (2015) define measurement instrument as a tool that contains questions that are designed to solicit information appropriate for analysis, the researcher establishes the broad themes of what the research needs in order to answer the research questions. The measurement instrument allows for data to be collected in a manner that answers the research questions. The content thereof includes the purpose of the study, it also allows fewer restriction on the kinds of things that can be investigated. The researcher designs the measurement instrument based on what needs to be known.

Measurement instruments are either unstructured, semi-structured, or fully structured. In this study, the researcher employs the fully structured measurement instrument. According to Bryman (2012) and Wagner et al., (2012), in a fully structured interview, all respondents are asked exactly the same questions in the same precise wording order with the aid of a measurement instrument.

The measurement instrument of this study is attached in Appendix 3 and the measurement scales and items are attached in Appendix 4. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The ranking scale used is ordinal; this is “a ranking scale in which numbers are assigned to objects to indicate the relative extent to which some characteristic is possessed” (Malhotra & Peterson, 2006, p. 242). The measurement instrument comprised two sections; Section A and B. Section A required background information of respondents. Sections B measured brand association, peer influence, perceived value, flavour variety, and consumption frequency intention.

The measurement items included in the data were adapted from many sources as follows, brand association was adapted from Río, Vazquez and Iglesias (2001); peer influence was adapted from Jamal and Sharifuddin (2015); perceived value was adapted from Sweeney and Soutar (2001); consumption frequency intention was
adapted from Hong, Thong, Moon and Tam (2008); while flavour (Author’s own compilation, based on literature review from Miller & Kahn, 2005; Aztec Retail data, 2014).

According to Hair et al., (2010), three or four items per factor at a minimum, can provide adequate identification for the construct. In this study, seven items were used to measure brand association. Flavour variety was measured using nine items, peer influence used five items, perceived value was measured using five items and consumption frequency intention consisted of three items.

### 3.6.2 Pre-testing

The measurement instrument was pre-tested on a sample of 20 respondents. According to Cresswell (2003), pre-testing assists in identifying and eliminating potential problems.

Based on the feedback from the pre-test, the researcher edited the measurement instrument as problems were identified and corrected thereafter. The data collected was used to test validity and reliability. Once this was completed, the measurement instrument was distributed. According to Hair et al., (2010), validity and reliability is used to reduce measurement error.
3.7 Data analysis approach

3.7.1 Data processing and analysis procedure

In order to understand the patterns of correlation/covariance among a set of variables and to explain as much of their variance as possible with the model specified, structural equation modelling was used (Kline, 1998). The research adopted the multivariate analysis approach. A multivariate analysis involves the simultaneous analysis of three or more variables (Bryman, 2012).

The researcher used SPSS 22 and AMOS 21 statistical packages for structural equation modelling. Figure 8-1 below represents the data analysis procedure the researcher has followed.

![Data analysis procedure diagram]

**Figure 8-1: Data analysis procedure**

*Source: (Author’s own construction; adapted from (Mhlophe, 2015, p. 183)*
The procedure in Figure 8-1 above illustrates the data analysis and interpretation procedure from data coding and cleansing on Excel followed by the use of SPSS 22 and AMOS 21 using the statistical packages. For structural equation modelling: a two stage approach was used; CFA and Path Modelling.

### 3.7.2 Data coding using Excel spreadsheet

According to Malhotra (2006, p. 407), “coding means assigning a code, usually a number to each possible response to each question, with the code including an indication for the column position and data record it will occupy”. The data collected was coded on an Excel spreadsheet with rows representing sampling units and column constructs before analysis and verified before being imported on SPSS 22 for initial analysis. According to McLeod (2011) and Polkinghorne (2005), the collected data reflects the phenomenon of study.

According to Camp (2003); Khothari (2004); Lethbridge, Sim and Singer (2005), coding communicates ideas and provides meaning through condensing huge volumes of data in a comprehensive format that can be assessed. Chinomona (2015) states that data can be coded in an Excel spreadsheet and transformed into descriptive statistics.

In this study, descriptive statistics have been analysed using SPSS 22 while inferential statistics have been analysed using AMOS 21.

### 3.7.3 Descriptive analysis using SPSS 22

In order to understand the dimensions of each variable, the researcher utilised SPSS 22 statistical package to analyse the descriptive statistics. SPSS 22 program allows for data entry and analysis of graphs and tables. SPSS 22 can handle large data (Kline, 2011; Blunch, 2013).

Descriptive statistics for demographics and other variables have been performed based on categorical data using frequency, crosstab and means procedures. SPSS 22 requires data coding in a row by column (Byrne, 2010; Hair et al., 2010). As soon
as the descriptive statistics of data were generated, the next procedure involved assessing the reliability and validity of the measurement scales.

3.7.4 Inferential analysis using AMOS 21 for SEM

Structural Equation Modelling (SEM) is “a family of statistical techniques used for the analysis of multivariate data to measure latent variables and their interrelationships” (Violato & Hecker, 2007, p. 362). According to Bollen (1989), it is a framework that allows researchers to translate theory into a testable model. Structural equation model is a family of statistical models that seek to explain the relationships among multiple variables (Violato & Hecker, 2007; Hair et al., 2010).

In this study, the two-step SEM approach was followed, namely confirmatory factor analysis (CFA) and path modelling (Hair, Black, Babin & Anderson, 2010). According to Byrne (2010), the SEM takes a confirmatory (i.e., hypotheses testing) approach to the analysis of structural theory bearing some phenomenon (Byrne, 2010). Table 3-3 outlines the Basics of SEM, while Table 3-4 outlines strengths and weaknesses of SEM.

Table 3-3: Basics of SEM

<table>
<thead>
<tr>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Is a comprehensive statistical approach to testing hypotheses about relations among observed and latent variables (Hoyle, 1995)</td>
</tr>
<tr>
<td>• Is a methodology for representing, estimating, and testing a theoretical network of (mostly) linear relations between variables (Rigdon, 1998)</td>
</tr>
<tr>
<td>• Tests hypothesized patterns of directional and non-directional relationships among a set of observed (measured) and unobserved (latent) variables (MacCallum &amp; Austin, 2000)</td>
</tr>
</tbody>
</table>

Source: (Hoyle, 1995; Rigdon, 1998; MacCallum & Austin, 2000)
### Table 3-4: Strengths and weaknesses of SEM

<table>
<thead>
<tr>
<th>Strengths</th>
<th>Weaknesses</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Allows for the analyses of hypothesized interrelationships between latent constructs.</td>
<td>1. Requires large samples that may be difficult to get</td>
</tr>
<tr>
<td>2. Allows for a higher level of abstraction, through the development of structural models of hypothesized constructs</td>
<td>2. Requires fundamental understanding of statistical methods and concepts</td>
</tr>
<tr>
<td>3. Allows for structural model to be created between latent variables</td>
<td>3. Requires well-developed theory and empirical evidence and therefore is limited in its applicability.</td>
</tr>
<tr>
<td>4. SEM subsumes CFA in that CFA is the measurement model of SEM outlining the relationships between indicators and underlying hypothetical constructs</td>
<td>4. If the model is mis-specified due to weak theory, unclear hypotheses or poor study design, the causal relationships between the variables will be misinterpreted.</td>
</tr>
<tr>
<td>5. It supersedes other multivariate analyses because it can model the relationships between “error free” latent variables by partialing out measurement error from multiple, imperfectly reliable indicators</td>
<td>5. Cannot compensate for unreliable measures.</td>
</tr>
<tr>
<td>6. Path analysis has sometimes been referred to as causal modeling. Because path analysis forms the structural model in SEM, it can provide evidence for causality among variables</td>
<td>6. If measuring instruments with poor reliability are employed, the SEM will be laden with error.</td>
</tr>
<tr>
<td>7. Well-designed, theory strong studies, however, can provide powerful evidence for the effect of one variable on another.</td>
<td>7. SEM cannot compensate for instruments with poor reliability and validity, poorly specified theoretical models, inadequate sampling, or misinterpretation of the fit indexes.</td>
</tr>
</tbody>
</table>

Source: (Jöreskog, 1982; Anderson, 1987; Bollen & Long, 1993; Bentler, 2004; Violato & Hecker, 2007; Kline, 2011)

According to Violato and Hecker (2007), the development of a testing model occurs systematically and can be characterized through five steps being, model specification, identification, estimation, testing fit and re-specification, as illustrated in Figure 9-1.
They state that these are operational steps that are necessary to increase the likelihood that the predicted model will fit the observed data. Figure 9-1 below illustrates the main operational steps of developing and testing a structural equation model.

**Figure 9-1: Five steps for developing and testing a SEM**

![Diagram of five steps for developing and testing a SEM]

Source: (Violato & Hecker, 2007, p. 366)

### 3.8 Reliability and validity tests of measurement scales

#### 3.8.1 Confirmatory Factor Analysis (CFA)

For CFA; reliability, validity and model fit have been assessed. Reliability and validity measures are used to evaluate the quality of measurement tools or methods, thereby
ensuring overall quality of the research process and research findings (Bryman, 2012; Wagner at al., 2012; Neuman, 2014).

Reliability and validity are methodological and disciplinary standards meant to ensure that research output results from a rigorous process, is of high quality and results in a wide application. According to Wagner at al., (2012, p. 80) “measurement instruments must be both reliable and valid”. Malhotra (2010), Bryman (2012), Wagner at al., (2012), Creswell (2014) and Neuman (2014), as well as Babbie (2015), define reliability as the degree to which a scale produces consistent results every time if repeated measurements are made under the same conditions on the characteristic, meaning that it indicates that the research approach is consistent across different researchers and different projects. Bryman (2012), Malhotra (2010), Wagner at al. (2012), Neuman (2014) as well as Creswell (2014) and Babbie (2015) define validity as the degree to which a scale measures what it is supposed to measure and concerns the integrity of conclusions that are generated from the research.

3.8.1.1 Reliability

According to Maree (2007, p. 216) “reliability is the extent to which a measuring instrument is repeatable and consistent”, he continues to state that “there are a number of different types of reliability, being, test-retest reliability, equivalent form reliability, split-half reliability and internal reliability”.

Maree (2007, p. 216) mentions that “when a number of items are formulated to measure a certain construct, there should be a high degree of similarity among them since they are supposed to measure one common construct”. Goddard and Melville (2004, p. 41) also state that, “in reliability, if the same experiment is performed under the same conditions, the same measurements will be obtained”. Maree (2007, p. 216) continues to state that “the coefficient that is used to measure the internal reliability of an instrument is called Cronbach’s alpha coefficient and is based on inter-item correlations”. In doing this, the researcher looked for scores of 0.7 and above. Reliability coefficient assesses the consistency of the entire scale with Cronbach alpha (Hair et al., 2010).
This study uses Cronbach’s alpha and Composite Reliability (CR) to check and measure reliability.

a) Cronbach’s Alpha ($\alpha$)

Cronbach’s alpha is a measure of reliability that ranges from 0 to 1, with values of 0.60 to 0.70 deemed the lower limit of acceptability, while a higher level of Cronbach’s alpha indicates a higher reliability of the measurement scale (Hair et al., 2010; Chinomona, 2011).

b) Composite Reliability (CR)

Composite reliability examines the internal reliability of research constructs (Nunnally, 1967; Chinomona, 2011). “A composite reliability index that is greater than 0.5 signifies sufficient internal consistency of the construct” (Nunnally, 1967, p. 81).

According to Chinomona (2011), the value was later adjusted to 0.7 by Nunnally in 1978 and is also recommended by Hair et al. (2010). The composite reliability was examined using the following formula:

$$CR_{\eta} = \frac{(\Sigma \lambda y_i)^2}{(\Sigma \lambda y_i)^2 + (\Sigma \varepsilon_i)}$$

Composite Reliability = (square of the summation of the factor loadings)/(square of the summation of the factor loadings) + (summation of error variances)

3.8.1.2 Validity

Validity is defined as the extent to which an instrument measures what it is supposed to measure (Hair et al., 2010). In this study, validity has been assessed through convergent validity using factor loading, item-to total correlation values and average variance extracted (AVE). Validity has also been assessed through discriminant validity using inter-construct correlation matrix and average variance extracted vs shared variance.
a) Convergent Validity

The researcher has measured convergent validity using factor loading, item-to-total correlation values and average variance extracted (AVE). According to Hair et al., (2010), convergent validity assesses the degree to which two measures of the same concept are correlated. Malhotra and Peterson (2006, p. 275) define convergent validity as “the extent to which the scale correlates positively with other measures of the same construct”.

According to Anderson and Gerbing (1988, p. 411) “convergent validity can be assessed by checking if individual item loadings for each corresponding research construct is above 0.5”. The researcher has checked if the items that are indicators of a specific construct converge or share a high proportion of variance in common. In the case of high convergent validity, high loading on a factor would indicate that they converge on a common point, the latent constructs, while at a minimum, all factor loadings should be statistically significant (Hair et al., 2010). The average variance extracted (AVE) is a summary of convergence among a set of items representing a latent construct, it is the average percentage of variation explained among the items of a construct (Hair et al., 2010).

b) Discriminant Validity

The researcher has measured discriminant validity using inter-construct correlation matrix and average variance extracted vs shared. The researcher has checked if there is discriminant validity in order to assess if the correlation between the research constructs is less than 1.0. “Inter-correlation values for all paired latent variables should be less than 1.0 in order to confirm the existence of discriminant validity” (Chinomona, 2011, p. 110).

“Discriminant validity is the extent to which a measure does not correlate with other constructs from which it is supposed to differ” (Malhotra & Peterson, 2006, p. 275). Hair et al., (2010) defines it as “the extent to which a construct is truly distinct from other constructs”. For the researcher, high discriminant validity provides evidence that a construct is unique and captures some phenomena other measures do not. CFA
provides two common ways of assessing discriminant validity being inter-construct correlation matrix and average variance extracted vs shared. For the researcher, the variance-extracted estimates should be greater than the squared correlation estimate (Hair et al., 2010). According to Hair et al., (2010) the presence of cross-loadings indicates a discriminant validity problem, if high cross-loadings exist and they are not represented by the measurement model, the CFA fit should not be good.

### 3.8.1.3 Model fit

Determining model fit is complicated because several model fit criteria have been developed to assist in interpreting confirmatory factor analysis (CFA) and structural equation models (SEM) under different model-building assumptions (Chinomona, 2011).

According to Hair et al., (2010); Jenatabadi and Ismail (2014), the researcher comes to the most fundamental event in SEM testing: “Is the measurement model valid?”, or how well the conceptual model is represented by the sampled data. In this study, the researcher checks the model fit for CFA and path model using Chi-square value (>3), Comparative fit index (CFI) (>0.900), Goodness of fit index (GFI) (>0.900), Incremental fit index (IFI) (>0.900), Normed fit index (NFI) (>0.900), Tucker Lewis index (TLI) (>0.900), and Random measure of standard error approximation (RMSEA) (<0.08) (Blunch, 2013; Byrne, 2010; Kline, 2011; Hair et al., 2010).

#### a) Chi-square ($\chi^2$/DF)

The Chi-Square value is the traditional measure for evaluating overall model fit and, “assesses the magnitude of discrepancy between the sample and fitted covariances matrices” (Hu & Bentler, 1999, p. 2). The Chi-Square statistic is often referred to as either a ‘badness of fit’ (Kline, 2011) or a ‘lack of fit’ (Mulaik, James, Van Alstine, Bennet, Lind & Stilwell, 1989) measure. “A chi-square value over degree of freedom of value that is below 3 is an indication of acceptable model fit” (Chinomona, 2011, p.118).
b) Comparative Fit Index (CFI)

The Comparative Fit Index is an amended form of the NFI which accounts for the sample size (Byrne 2010; Hooper, Coughlan & Mullen, 2008) and functions well even when the sample size is small (Tabachnick & Fidell, 2007). According to Hu and Bentler (1999), a value equal to or greater than 0.9 is an indication of acceptable model fit, in order to ensure that mis-specified models are not accepted. CFI should be equal to or greater than 0.90 to accept the model, indicating that 90 percent of the covariation in the data can be reproduced by the given model (Kline, 2011; Chinomona, 2011).

c) Goodness of fit index (GFI)

According to Tabachnick and Fidell (2007), the Goodness-of-Fit statistic (GFI) was created by Jöreskog and Sorbom as an alternative to the Chi-Square test and calculates the proportion of variance that is accounted for by the estimated population covariance. GFI increases as the number of parameters increases (MacCallum & Hong, 1997) and also has an upward bias with large samples (Bollen, 1990; Shevlin & Miles, 1998). Traditionally an omnibus cut-off point of 0.90 has been recommended for the GFI, however, simulation studies have shown that when factor loadings and sample sizes are low, a higher cut-off of 0.95 is more appropriate (Shevlin & Miles, 1998). GFI should be equal to or greater than 0.90 to accept the model (Bollen, 1990; Chinomona, 2011).

d) Incremental Fit Index (IFI)

IFI indices, known as relative or comparative indices, are a group of indices that do not use the chi-square in its raw form but compare the chi square value to a baseline model (Shevlin & Miles, 1998; McDonald & Ho, 2002; Hooper, Coughlan & Mullen, 2008). IFI should be equal to or greater than 0.90 to accept the model. “IFI can also be greater than 1 under certain circumstances” (Chinomona, 2011, p. 105).
e) Normed Fit Index (NFI)

According to Bentler and Bonnet (1980), values greater than 0.90 indicate a good fit, while recent suggestions state that the cut-off criteria should be NFI ≥ .95 (Hu & Bentler, 1999). “Values for this statistic range between 0 and 1” (Hooper, Coughlan & Mullen, 2008, p. 55).

A major drawback to this index is that it is sensitive to sample size, underestimating fit for samples less than 200 (Mulaik et al, 1989; Bentler, 1990), and is thus not recommended to be solely relied on (Kline, 2005). However, in situations where small samples are used, the value of the NNFI can indicate poor fit despite other statistics pointing towards good fit (Bentler, 1990; Kline, 2005; Tabachnick & Fidell, 2007). “Recommendations as low as 0.80 as a cutoff have been preferred” (Hooper, Coughlan & Mullen, 2008, p. 55).

f) Tucker-Lewis Index (TLI)

“Tucker-Lewis index prefers simpler models and is known to address the issue of sample size associated with NFI” (Hooper et al., 2008, p. 55). TLI value needs to meet or exceed the recommended threshold of 0.9 (Chinomona, 2015).

g) Root Mean Square Error of Approximation (RMSEA)

The RMSEA tells us how well the model, with unknown but optimally chosen parameter estimates would fit the population's covariance matrix (Hooper et al., 2008; Byrne, 2013). There is a good model fit if RMSEA is less than or equal to 0.5 and an adequate fit if RMSEA is less than or equal to 0.8 (Browne & Cudeck, 1993; Hu & Bentler, 1999; Steiger, 2007; Chinomona, 2011; Chinomona, 2015).

3.8.2 Path modelling

The next phase of data analysis through the use of SEM involves path analysis (Beran & Violato, 2010; Stein, Morris & Nock, 2012). Path analysis allows one to examine the causal processes underlying the observed relationships and to estimate the relative importance of alternative paths of influence. “Given the complexity of
structural equation modelling, it is not uncommon to find that the fit of a proposed model is poor" (Hooper et al., 2008, p. 53). For path modelling, the researcher has checked the significance levels of the path coefficients. Path analysis calculates the significance and the strength of the relationships using only a correlation or covariance matrix as input.

Once a model fit has been evaluated using CFA, path modelling is performed using AMOS 21 (Byrne, 2010; Hair et al., 2010; Kline, 2011; Blunch, 2013). Researchers have an opportunity to improve model fit through the correlation of error terms, however, according to Jöreskog and Long (1993), this needs to be backed up by strong theoretical justification. Should the researcher be able to substantiate this decision, correlated error terms can be accepted with caution. As recommended by Matzler and Renzl (2006) and Mofokeng (2015), this study's structural model was evaluated by examining the p-values as well as standardized regression coefficients.

3.9 Demographic profile of respondents

The planned demographic profile of respondents had a fair mixture of gender, age, highest academic level, occupation status and average monthly income/spending power due to the make-up of youth in South Africa.

3.10 Limitations of the study

As the researcher used structured closed questions, this limited the results to number based descriptors. The information received is based on questions asked and not necessarily the feelings and thoughts of people, meaning that it ignores a very important human element. The selection of respondents is based on referrals of referrals, meaning that selection of respondents has been left to the referrer. The study is limited to the Soweto geographical region.

Structural equation modelling requires large samples which may become difficult to get, as it cannot run with a sample of less than 250 respondents. SEM requires the researcher to have a theoretical understanding of the process and statistical
procedures. SEM recommends a minimum three or four items per construct, therefore the researcher needed to ensure that appropriate scales were selected.

3.11 Ethical considerations

Ethics are applicable and should be complied with (Wagner et al., 2012). The researcher received permission from Wits Business School. The researcher approached initial respondents “referrer's/first line participants” based on snowball technique and got their permission. The researcher ensured that they are trained on the process of the snowball way of finding others who have specific characteristics, as defined by the researcher. Recruitment, selection and training remained the duty of the researcher (Malhotra & Peterson, 2006). The initial respondents “referrer's/first line participants” therefore knew what was expected of them, although they were volunteers, they participated without being deceived. The referrals of referrals respected the feelings and dignity of respondents and ensured that each respondent was left with a positive experience. Participant’s information should also be kept confidential, failure to do so can lead to harm (Maree, 2007).

3.12 Summary

In this chapter, the research methodology was outlined. This included the research paradigm, the research strategy, the research design, the sampling design, the measurement instrument design, the data analysis approach including a comprehensive discussion of SEM as well as SPSS 22 and AMOS 21 statistical packages. Reliability and validity and limitations were discussed. In the latter part of chapter, the ethical considerations were also discussed. The next chapter provides details of how data was analysed and includes the presentation results.
CHAPTER 4. DATA ANALYSIS AND PRESENTATION OF RESULTS

4.1 Introduction

The primary purpose of this chapter is to table the results of the research conducted and concluded. What this study intended to understand and contribute was analyzed through SPSS 22 and AMOS 21 statistical packages. It is important to validate and confirm the empirical outcomes of the study in order to meet the objectives as outlined in Chapter 1.

The chapter is structured with four main headings. Firstly, descriptive statistics are presented. This involves a description of the sampled population with corresponding statistics and accompanying tables. Thereafter, reliability and validity assessment, CFA results are tabled followed by path modelling results. Figure 10-1 demonstrates the procedures of statistical analysis as well as the key tasks that will be undertaken in this chapter.

Figure 10-1: Statistical analysis procedures

Source: (Chinomona, 2011, p. 95)
4.2 Descriptive statistics

The first task of the researcher involves explaining the demographic or descriptive traits of the sampled population as well as presenting this in an easily understood manner (Santy & Kreale, 1998). According to Burns and Bush (2006), the primary purpose of descriptive statistics is to offer abridged characteristic information about the sample and form the basis of quantitative data analysis. Descriptive statistics are able to confirm the normality of the data collected and analysed. “Descriptive statistics search for patterns, to sum up and present a set of data and they serve to describe the characteristics of the sample for the purpose of making comparisons” (Santy et al., 1998, p.81). The demographic/ descriptive statistics are discussed below.

4.2.1 Respondent profile

The information shown in Table 4-1 presents demographic description of respondents. The gender characteristics display that 175 respondents (i.e. 58.3%) who participated in the current study were female and the remainder, 125 respondents (i.e. 41.7%) were male. The majority of respondents, 153 (i.e. 51.0%) were aged between 16 and 18 years, while the rest were between 19 and 24 years (i.e. 49%). Results on the level of education demonstrated that a total of 200 respondents (i.e. 66.7%) had below matric qualification, while those with matric as the highest qualification ranked second, being 78 respondents (i.e. 26.0%). The rest is shared between diploma, degree and post graduate degree as their highest qualification. In terms of occupation status 87.3% of the respondents were unemployed. Results of income level demonstrated that 256 respondents (i.e. 85.3%) had monthly income/cash below <R1000. The remainder was shared between R1001 and >R6000. The statistics below were run on SPSS 22 in order to establish the respondent profile and to do comparisons on the respondents. The research is based on 300 valid respondents, and the detail outlined below.
Table 4-1: Sample profile characteristics

RESULTS FOR DEMOGRAPHIC CHARACTERISTICS

<table>
<thead>
<tr>
<th>Gender</th>
<th>Freq</th>
<th>Percentage (%)</th>
<th>Age</th>
<th>Freq</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Male</td>
<td>125</td>
<td>41.7</td>
<td>16-18</td>
<td>153</td>
<td>51.0</td>
</tr>
<tr>
<td>Female</td>
<td>175</td>
<td>58.3</td>
<td>19-21</td>
<td>78</td>
<td>26.0</td>
</tr>
<tr>
<td>Total</td>
<td>300</td>
<td>100.0</td>
<td>22-24</td>
<td>69</td>
<td>23.0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Income Level</th>
<th>Freq</th>
<th>Percentage (%)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt;R1000</td>
<td>256</td>
<td>85.3</td>
<td>Below Matric</td>
</tr>
<tr>
<td>R1001 - R2000</td>
<td>23</td>
<td>7.7</td>
<td>Matric</td>
</tr>
<tr>
<td>R2001 - R3000</td>
<td>9</td>
<td>3.0</td>
<td>Diploma</td>
</tr>
<tr>
<td>R3001 - R4000</td>
<td>6</td>
<td>2.0</td>
<td>Degree</td>
</tr>
<tr>
<td>R4001 - R5000</td>
<td>1</td>
<td>0.3</td>
<td>Post graduate degree</td>
</tr>
<tr>
<td>R5001 - R6000</td>
<td>2</td>
<td>0.7</td>
<td>Other (specify)</td>
</tr>
<tr>
<td>≥R6000</td>
<td>3</td>
<td>1.0</td>
<td>Total</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Educational Level</th>
<th>Freq</th>
<th>Percentage (%)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Below Matric</td>
<td>200</td>
<td>66.7</td>
<td>Matric</td>
</tr>
<tr>
<td>Matric</td>
<td>13</td>
<td>4.3</td>
<td>Diploma</td>
</tr>
<tr>
<td>Diploma</td>
<td>4</td>
<td>1.3</td>
<td>Degree</td>
</tr>
<tr>
<td>Degree</td>
<td>3</td>
<td>1.0</td>
<td>Post graduate degree</td>
</tr>
<tr>
<td>Post graduate degree</td>
<td>2</td>
<td>0.7</td>
<td>Other (specify)</td>
</tr>
<tr>
<td>Total</td>
<td>300</td>
<td>100.0</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Occupation Status</th>
<th>Freq</th>
<th>Percentage (%)</th>
<th>Percentage (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employed</td>
<td>15</td>
<td>5.0</td>
<td>Self-employed</td>
</tr>
<tr>
<td>Self-employed</td>
<td>23</td>
<td>7.7</td>
<td>Unemployed</td>
</tr>
<tr>
<td>Unemployed</td>
<td>262</td>
<td>87.3</td>
<td>Total</td>
</tr>
</tbody>
</table>

Note: Freq = Frequency

Source: (Author’s own compilation based on data collected through survey)

4.2.2 General descriptive analysis

In order to get a broader picture of consumption frequency intention or consideration for sparkling soft drinks, general data was gathered and the results thereof are presented in Table 4-2 below. Additionally the respondents were asked about the main barriers to consume more.
Table 4-2: General descriptive analysis

<table>
<thead>
<tr>
<th>Frequency of Usage</th>
<th>Freq</th>
<th>Percentage %</th>
<th>Favourite Brand</th>
<th>Freq</th>
<th>Percentage %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Everyday</td>
<td>70</td>
<td>23.3</td>
<td>Sparletta</td>
<td>24</td>
<td>8.0</td>
</tr>
<tr>
<td>5 to 6 times per week</td>
<td>35</td>
<td>11.7</td>
<td>Coca-Cola</td>
<td>167</td>
<td>55.7</td>
</tr>
<tr>
<td>3 to 4 times per week</td>
<td>89</td>
<td>29.7</td>
<td>Coo-ee</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>1 to 2 times per week</td>
<td>65</td>
<td>21.7</td>
<td>Twizza</td>
<td>1</td>
<td>0.3</td>
</tr>
<tr>
<td>Less than once per week</td>
<td>41</td>
<td>13.7</td>
<td>Jive</td>
<td>7</td>
<td>2.3</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Kingsley</td>
<td>29</td>
<td>9.7</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Fanta</td>
<td>2</td>
<td>0.7</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Pepsi cola</td>
<td>6</td>
<td>2.0</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Refresh</td>
<td>64</td>
<td>21.3</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Sprite</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Total</td>
<td>300</td>
<td>100.0</td>
<td>Total</td>
<td>300</td>
<td>100.0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Barriers to consume/purchase</th>
<th>Freq</th>
<th>Percentage %</th>
</tr>
</thead>
<tbody>
<tr>
<td>“its money because I am not working”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“too much sugar”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“has too much of acids” (fizz)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“shop where I buy is too far”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“mom and dad don’t buy it”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“my parents don’t want me to drink it”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>“danger to my health”</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>300</td>
<td>100.0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Sharing/Own</th>
<th>Freq</th>
<th>Percentage %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sharing</td>
<td>197</td>
<td>66.0</td>
</tr>
<tr>
<td>Own</td>
<td>96</td>
<td>32.0</td>
</tr>
<tr>
<td>Other</td>
<td>7</td>
<td>2.0</td>
</tr>
<tr>
<td>Total</td>
<td>300</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Note: Freq = Frequency

Source: (Author's own compilation based on data collected through survey)

89 respondents (i.e. 29.7%) consume between 3 to 4 times per week, whilst 70 respondents (i.e. 23.3%) consume SSDs every day. Coca-Cola was favoured by 55.7% of the respondents, followed by Sprite (21.3%), then Fanta (9.7%), Sparletta (8.0%), Kingsley (2.3%), Refresh (2.0%), Pepsi Cola (0.7%) and Twizza (0.3%). Within the Soweto geographic region Jive and Coo-ee were not chosen as favourite SSDs.
With regards to their last drinking experience, 197 respondents (i.e. 66.0%) indicated they were sharing an SSD, while 96 respondents (i.e. 32.0%) indicated that they were not sharing an SSD.

Lastly, consumers were asked to share insights on what their barriers to consuming or purchasing more SSDs were. This was an open ended question and the main reasons/ themes included:

i. “its money because I am not working”; (Respondent 32; Age 22-24 years)
ii. “too much sugar”; (Respondent 26; Age 19-22 years)
iii. “has too much of acids”; (Respondent 24; Age 22-24 years)
iv. “shop where I buy is too far”; (Respondent 20; Age 16-18 years)
v. “mom and dad don’t buy it”; (Respondent 177; Age 16-18 years)
vi. “my parents don’t want me to drink it”; (Respondent 16; Age 16-18 years)
vii. “not healthy”; (Respondent 47; Age 22-24 years)

4.2.3 Descriptive analysis for Likert Scale Response Items

(a) Analysis of the Mean

- Table 4-3 below indicates that the construct of brand association is normally distributed, with mean scores ranging between 4.70 – 6.19. This mean score is above ‘Neutral’, and implies that many respondents were agreeing with the statements.
- Flavour variety had a mean score of between 3.78 and 4.97. This may imply that respondents were either agreeing or disagreeing with the statements. This may be the reason why some items were not reliable, and hence removed from further analysis.
- Peer influence had a mean score that ranged between 3.78 and 4.61. This implies that most of the respondents were fairly agreeing with the statements, but there were also signs of skewness, though not severe.
- The mean score of Perceived value ranged between 5.39 and 5.96. This means that respondents were mainly agreeing with the statements.
- Consumption frequency intention had a mean score that ranged between 4.86 and 5.70, many respondents seemed to be agreeing with the statements.

Detailed results for all the mean values for the items are presented in Table 4-3 below.

### Table 4-3: Analysis of the Likert scale response items

<table>
<thead>
<tr>
<th>Items</th>
<th>Strongly Disagree</th>
<th>Disagree</th>
<th>Slightly Disagree</th>
<th>Neutral</th>
<th>Slightly Agree</th>
<th>Agree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Brand Value</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>BA1</td>
<td>9</td>
<td>3.0%</td>
<td>3</td>
<td>1.0%</td>
<td>20</td>
<td>6.7%</td>
<td>50</td>
</tr>
<tr>
<td>BA2</td>
<td>3</td>
<td>1.0%</td>
<td>4</td>
<td>1.3%</td>
<td>8</td>
<td>2.7%</td>
<td>10</td>
</tr>
<tr>
<td>BA3</td>
<td>9</td>
<td>3.0%</td>
<td>12</td>
<td>4.0%</td>
<td>16</td>
<td>5.3%</td>
<td>34</td>
</tr>
<tr>
<td>BA4</td>
<td>6</td>
<td>2.0%</td>
<td>12</td>
<td>4.0%</td>
<td>20</td>
<td>6.7%</td>
<td>41</td>
</tr>
<tr>
<td>BA5</td>
<td>12</td>
<td>4.0%</td>
<td>21</td>
<td>7.0%</td>
<td>33</td>
<td>11.0%</td>
<td>62</td>
</tr>
<tr>
<td>BA6</td>
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<td>3.3%</td>
<td>17</td>
<td>5.7%</td>
<td>30</td>
<td>10.0%</td>
<td>54</td>
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<tr>
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<td>3</td>
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<td>31</td>
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<tr>
<td><strong>Flavour Variety</strong></td>
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<td></td>
</tr>
<tr>
<td>FV1</td>
<td>19</td>
<td>6.3%</td>
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<td>11.7%</td>
<td>58</td>
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<td>58</td>
</tr>
<tr>
<td>FV2</td>
<td>20</td>
<td>6.7%</td>
<td>43</td>
<td>14.3%</td>
<td>58</td>
<td>19.3%</td>
<td>60</td>
</tr>
<tr>
<td>FV3</td>
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<td>7.0%</td>
<td>42</td>
<td>14.0%</td>
<td>66</td>
<td>22.0%</td>
<td>60</td>
</tr>
<tr>
<td>FV4</td>
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<td>5.3%</td>
<td>26</td>
<td>8.7%</td>
<td>44</td>
<td>14.7%</td>
<td>66</td>
</tr>
<tr>
<td>FV5</td>
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<td>5.0%</td>
<td>36</td>
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<td>20.3%</td>
<td>73</td>
</tr>
<tr>
<td>FV6</td>
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<td>33</td>
<td>11.0%</td>
<td>44</td>
<td>14.7%</td>
<td>56</td>
</tr>
<tr>
<td>FV7</td>
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<td>6.0%</td>
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<tr>
<td>FV8</td>
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<tr>
<td><strong>Peer Influence</strong></td>
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<td></td>
</tr>
<tr>
<td>PI1</td>
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<td>39</td>
<td>13.0%</td>
<td>83</td>
<td>27.7%</td>
<td>47</td>
</tr>
<tr>
<td>PI2</td>
<td>18</td>
<td>6.0%</td>
<td>31</td>
<td>10.3%</td>
<td>78</td>
<td>26.0%</td>
<td>67</td>
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<tr>
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<td>16.0%</td>
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</tr>
<tr>
<td>PI5</td>
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<td>6.3%</td>
<td>33</td>
<td>11.0%</td>
<td>10</td>
<td>20.3%</td>
<td>61</td>
</tr>
<tr>
<td><strong>Perceived Value</strong></td>
<td></td>
<td></td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>PV1</td>
<td>5</td>
<td>1.7%</td>
<td>11</td>
<td>3.7%</td>
<td>13</td>
<td>4.3%</td>
<td>26</td>
</tr>
<tr>
<td>PV2</td>
<td>3</td>
<td>1.0%</td>
<td>11</td>
<td>3.7%</td>
<td>17</td>
<td>5.7%</td>
<td>41</td>
</tr>
<tr>
<td>PV3</td>
<td>1</td>
<td>0.3%</td>
<td>12</td>
<td>4.0%</td>
<td>17</td>
<td>5.7%</td>
<td>37</td>
</tr>
<tr>
<td>PV4</td>
<td>4</td>
<td>1.3%</td>
<td>9</td>
<td>3.0%</td>
<td>14</td>
<td>4.7%</td>
<td>36</td>
</tr>
<tr>
<td>PV5</td>
<td>4</td>
<td>1.3%</td>
<td>4</td>
<td>1.3%</td>
<td>10</td>
<td>3.3%</td>
<td>26</td>
</tr>
<tr>
<td><strong>Consumption Frequency Intention</strong></td>
<td></td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>CF1</td>
<td>6</td>
<td>2.0%</td>
<td>8</td>
<td>2.7%</td>
<td>23</td>
<td>7.7%</td>
<td>27</td>
</tr>
<tr>
<td>CF2</td>
<td>4</td>
<td>1.3%</td>
<td>18</td>
<td>6.0%</td>
<td>40</td>
<td>13.3%</td>
<td>54</td>
</tr>
<tr>
<td>CF3</td>
<td>2</td>
<td>0.7%</td>
<td>8</td>
<td>2.7%</td>
<td>33</td>
<td>11.0%</td>
<td>50</td>
</tr>
</tbody>
</table>

Source: (Author's own compilation based on data collected through survey)

### (b) Analysis of Frequencies

Table 4.3 above is an illustration of the scale item results. All research constructs were measured on a 7-point Likert scale. The detail to the table above is addressed in the detail that follows below with some measurement items examined closely.
I. Brand Association
• BA1 to BA7 – Seven items were used to measure brand association. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “This brand is totally in line with my lifestyle”; “This brand of soft drink is popular”; “My friends drink this brand of soft drink”; “This brand is a brand leader”, “Using this product is a social status symbol”; “This brand of soft drink is used by famous people with whom I identify”; “I would advise other people to buy this brand of soft drink”.

BA1:

![Bar chart for BA1

218 respondents (i.e. 72.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is totally in line with their lifestyle. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

BA2:

![Bar chart for BA2

1. Brand Association
• BA1 to BA7 – Seven items were used to measure brand association. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “This brand is totally in line with my lifestyle”; “This brand of soft drink is popular”; “My friends drink this brand of soft drink”; “This brand is a brand leader”, “Using this product is a social status symbol”; “This brand of soft drink is used by famous people with whom I identify”; “I would advise other people to buy this brand of soft drink”.

BA1:

![Bar chart for BA1

218 respondents (i.e. 72.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is totally in line with their lifestyle. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

BA2:
275 respondents (i.e. 91.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is popular. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**BA3:**

![Bar Chart: My friends drink this brand of soft drink]

229 respondents (i.e. 76.3%) slightly agreed/agreed/strongly agreed with the statement that their friends drink their favourite sparkling soft drink brand. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**BA4:**

![Bar Chart: This brand is a brand leader]

221 respondents (i.e. 73.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is a brand leader. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
172 respondents (i.e. 57.3%) slightly agreed/agreed/strongly agreed with the statement that using their favourite sparkling soft drink is a social status symbol. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**BA6:**

189 respondents (i.e. 63.0%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink is used by famous people with whom they identify. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
255 respondents (i.e. 85.0%) slightly agreed/agreed/strongly agreed with the statement that they would advise other people to buy their favourite sparkling soft drink. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

II. Peer Influence

- **PI1 to PI5** – Five items were used to measure peer influence. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “This brand helps me to feel accepted by my friends”, “This brand gives me social approval”, “This brand improves the way I am perceived”, “This brand makes a good impression on other people”, “Using this brand gives me a sense of belonging to others”

**PI1:**
102 respondents (i.e. 34.0%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand help them to feel accepted by their friends. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**PI2:**

![Bar chart showing responses for PI2](chart1.png)

106 respondents (i.e. 35.3%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand gives them social approval. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**PI3:**

![Bar chart showing responses for PI3](chart2.png)

113 respondents (i.e. 37.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand improves the way they are perceived. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
PI4:

**This brand makes a good impression on other people**

- Strongly disagree: 12
- Disagree: 26
- Slightly disagree: 48
- Neutral: 51
- Slightly agree: 52
- Agree: 66
- Strongly agree: 45

163 respondents (i.e. 54.3%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand makes a good impression on other people. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

PI5:

**Using this brand gives me a sense of belonging to other users**

- Strongly disagree: 19
- Disagree: 33
- Slightly disagree: 61
- Neutral: 61
- Slightly agree: 46
- Agree: 49
- Strongly agree: 31

126 respondents (i.e. 42.0%) slightly agreed/agreed/strongly agreed with the statement that using their favourite sparkling soft drink brand gives them a sense of belonging to other users. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
III. Perceived Value

- **PV1 to PV5** – Five items were used to measure perceived value. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “This brand is reasonably priced”, “This brand offers value for money”, “This brand is a good choice for the price paid”, “This brand is economical”, “This brand is worth what it costs”

**PV1:**

245 respondents (i.e. 81.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is reasonably priced. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**PV2:**

228 respondents (i.e. 76.0%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand offers value for money. The
rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**PV3:**

```
<table>
<thead>
<tr>
<th></th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neutral</th>
<th>Slightly agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>This brand is good</td>
<td>1</td>
<td>12</td>
<td>17</td>
<td>37</td>
<td>45</td>
<td>113</td>
<td>75</td>
</tr>
<tr>
<td>for the current</td>
<td>price level</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
```

233 respondents (i.e. 77.6%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is good for the current price level. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**PV4:**

```
<table>
<thead>
<tr>
<th></th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Slightly disagree</th>
<th>Neutral</th>
<th>Slightly agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>This brand is</td>
<td>4</td>
<td>9</td>
<td>14</td>
<td>36</td>
<td>58</td>
<td>105</td>
<td>74</td>
</tr>
<tr>
<td>economical</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
```

237 respondents (i.e. 79.0%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is economical. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
PV5:

256 respondents (i.e. 85.3%) slightly agreed/agreed/strongly agreed with the statement that their favourite sparkling soft drink brand is worth what it costs. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

IV. Flavour Variety

• FV1 to FV9 – Nine items were used to measure flavour variety. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “The soft drink/cold drink name Apple; Peach; Monster green; Mango tango; Millennium orange; Midnight sky; Mixed berries; Rainslicker; Pinewhizz; flavour makes me want to drink more”.

FV1:

130 respondents (i.e. 43.3%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Apple flavour makes me want to drink more. The
rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**FV2:**

The cold drink name Peach flavour makes me want to drink more

119 respondents (i.e. 39.6%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Peach flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**FV3:**

The cold drink name Monster green flavour makes me want to drink more

111 respondents (i.e. 37.0%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Monster green flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
148 respondents (i.e. 49.3%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Mango tango flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

115 respondents (i.e. 38.3%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Millennium orange flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
FV6:

150 respondents (i.e. 50.0%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Midnight sky flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

FV7:

194 respondents (i.e. 64.6%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Mixed Berries flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
FV8:

94 respondents (i.e. 31.3%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Rainslicker flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

FV9:

159 respondents (i.e. 53.0%) slightly agreed/agreed/strongly agreed with the statement that the cold drink name Pinewhizz flavour makes me want to drink more. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
Flavour Variety - Additional analysis:

Ambiguous flavour names and Fantasy fruit flavour names are more popular for 16-18 year olds (Agree/Strongly Agree)

<table>
<thead>
<tr>
<th>Flavour</th>
<th>16-18</th>
<th>19-21</th>
<th>22-24</th>
</tr>
</thead>
<tbody>
<tr>
<td>mango tango</td>
<td>26</td>
<td>26</td>
<td></td>
</tr>
<tr>
<td>midnight sky</td>
<td>26</td>
<td>17</td>
<td></td>
</tr>
<tr>
<td>millenium orange</td>
<td>24</td>
<td>15</td>
<td></td>
</tr>
<tr>
<td>monster green</td>
<td>14</td>
<td>11</td>
<td></td>
</tr>
<tr>
<td>pinwhizz</td>
<td>18</td>
<td>12</td>
<td></td>
</tr>
</tbody>
</table>

Mixed and fantasy fruit flavor naming strategies, have higher agree and strongly agree amongst youth between 16 and 18 years.

Mixed Berries is the the most popular fruit flavor (Agree/Strongly Agree)

<table>
<thead>
<tr>
<th>Flavour</th>
<th>16-18</th>
<th>19-21</th>
<th>22-24</th>
</tr>
</thead>
<tbody>
<tr>
<td>apple</td>
<td>22</td>
<td>21</td>
<td></td>
</tr>
<tr>
<td>mixed berries</td>
<td>24</td>
<td>39</td>
<td></td>
</tr>
<tr>
<td>peach</td>
<td>16</td>
<td>31</td>
<td></td>
</tr>
</tbody>
</table>

Mixed Berries flavor name resonated well across the youth, with a skew towards 16 – 18 year olds across the fruit flavours, followed by 19-21 year olds and then 22 – 24 year olds.
V. Consumption Frequency Intention

- **CFI1 to CFI5** – Three items were used to measure consumption frequency intention. The items have been measured using a seven-point Likert scale ranging from 1 = strongly disagree to 7 = strongly agree. The items are: “I intend to continue using soft drinks/cold drinks in the future”, “I will always try to use soft drinks/cold drinks in my daily life”, “I will keep using soft drinks/cold drinks as regularly as I do now”.

**CFI1:**

![Bar chart showing responses to the statement: I intend to continue using soft drinks in the future.]

236 respondents (i.e. 78.6%) slightly agreed/agreed/strongly agreed with the statement that they intend to continue using soft drinks in the future. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**CFI2:**

![Bar chart showing responses to the statement: I will always try to use soft/cold drinks in my daily life.]

80
184 respondents (i.e. 61.3%) slightly agreed/agreed/strongly agreed with the statement that they will always try to use soft/cold drinks in my daily life. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.

**CFI3:**

![Bar chart showing responses to the statement: I will keep using soft/cold drinks as regularly as I do now.](chart)

207 respondents (i.e. 69.0%) slightly agreed/agreed/strongly agreed with the statement that they will keep using soft/cold drinks as regularly as they do now. The rest of the respondents either remained neutral or slightly disagreed/disagreed/strongly disagreed.
4.3 Reliability and validity assessment

Accuracy analysis scale allows the researcher to check reliability and validity measures. Cronbach’s alpha test (Cronbach α) and Composite Reliability test (CR), were used to assess the reliability. Validity was checked using Convergent and Discriminant validity. The results and their corresponding variables are presented in Table 4-4 below and Table 4-5. The mean value and standard deviation values are included below:

Table 4-4: Accuracy analysis scale

<table>
<thead>
<tr>
<th>Research Construct</th>
<th>Mean value</th>
<th>Standard deviation</th>
<th>Item-Total Correlation</th>
<th>Cronbach’s α value</th>
<th>C.R. value</th>
<th>AVE value</th>
</tr>
</thead>
<tbody>
<tr>
<td>BA</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 1</td>
<td>5.360</td>
<td>1.464</td>
<td>.381</td>
<td>0.737</td>
<td>0.832</td>
<td>0.3</td>
</tr>
<tr>
<td>BA 2</td>
<td>6.193</td>
<td>1.172</td>
<td>.416</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 3</td>
<td>5.397</td>
<td>1.545</td>
<td>.365</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 4</td>
<td>5.453</td>
<td>1.582</td>
<td>.530</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 5</td>
<td>4.703</td>
<td>1.610</td>
<td>.494</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 6</td>
<td>5.053</td>
<td>1.683</td>
<td>.559</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>BA 7</td>
<td>5.960</td>
<td>1.323</td>
<td>.418</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV</td>
<td></td>
<td></td>
<td></td>
<td>0.789</td>
<td>0.832</td>
<td>0.4</td>
</tr>
<tr>
<td>FV 1</td>
<td>4.257</td>
<td>1.795</td>
<td>.365</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 2</td>
<td>3.977</td>
<td>1.637</td>
<td>.493</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 3</td>
<td>4.010</td>
<td>1.751</td>
<td>.449</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 4</td>
<td>4.450</td>
<td>1.678</td>
<td>.443</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 5</td>
<td>4.080</td>
<td>1.592</td>
<td>.504</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 6</td>
<td>4.427</td>
<td>1.759</td>
<td>.520</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 7</td>
<td>4.970</td>
<td>1.745</td>
<td>.471</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 8</td>
<td>3.783</td>
<td>1.591</td>
<td>.584</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>FV 9</td>
<td>4.543</td>
<td>1.781</td>
<td>.467</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PI</td>
<td></td>
<td></td>
<td></td>
<td>0.851</td>
<td>0.833</td>
<td>0.5</td>
</tr>
<tr>
<td>PI 1</td>
<td>3.780</td>
<td>1.703</td>
<td>.636</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PI 2</td>
<td>3.973</td>
<td>1.581</td>
<td>.689</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PI 3</td>
<td>4.047</td>
<td>1.612</td>
<td>.708</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PI 4</td>
<td>4.610</td>
<td>1.705</td>
<td>.590</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PI 5</td>
<td>4.177</td>
<td>1.711</td>
<td>.693</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PV</td>
<td></td>
<td></td>
<td></td>
<td>0.743</td>
<td>0.833</td>
<td>0.4</td>
</tr>
<tr>
<td>PV 1</td>
<td>5.693</td>
<td>1.435</td>
<td>.570</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PV 2</td>
<td>5.393</td>
<td>1.397</td>
<td>.478</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PV 3</td>
<td>5.507</td>
<td>1.375</td>
<td>.533</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PV 4</td>
<td>5.487</td>
<td>1.377</td>
<td>.471</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PV 5</td>
<td>5.963</td>
<td>1.317</td>
<td>.477</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CFI</td>
<td></td>
<td></td>
<td></td>
<td>0.745</td>
<td>0.748</td>
<td>0.4</td>
</tr>
<tr>
<td>CFI 1</td>
<td>5.710</td>
<td>1.530</td>
<td>.536</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CFI 2</td>
<td>4.867</td>
<td>1.509</td>
<td>.613</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CFI 3</td>
<td>5.250</td>
<td>1.452</td>
<td>.565</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: (Author’s own compilation based on data collected through survey)
4.4 Measurement instrument assessment

4.4.1 Reliability of Measurement Instruments

a) Cronbach’s Alpha test

Literature asserts that “a higher level of Cronbach’s coefficient alpha indicates a higher reliability of the measurement scale” (Chinomona, 2011, p. 108). From the results provided in Table 4-4, the Cronbach’s Alpha value for each research construct ranges from 0.737 to 0.851 as these are above 0.7 as recommended by Hair et al., (2010) and Chinomona (2011). Validity is therefore indicated. Furthermore, the item to total values ranged from 0.365 to 0.708 and were therefore above the cut-off point of 0.3. The Cronbach’s Alpha results indicated in Table 4-4 therefore validate the reliability of measures used in the current study.

b) Composite Reliability (CR)

The results of the CR calculations are presented in Table 4-4 below and the actual calculations can be found in Appendix 1.

The composite reliability was examined using the following formula:

\[ CR_\eta = \frac{(\sum \lambda y_i)^2}{(\sum \lambda y_i)^2 + (\sum \varepsilon_i)} \]

Composite Reliability = (square of the summation of the factor loadings)/{(square of the summation of the factor loadings)+(summation of error variances)}

Composite Reliability index that is greater than 0.5 signifies sufficient internal consistency of the construct (Nunnally, 1967; Hair, 2010; Chinomona 2011). In this regard, the results of Composite Reliability that range from 0.748 to 0.833 in Table 4-4 confirm the existence of internal reliability for all constructs in the study.

4.4.2 Validity of measurement instruments

Validity tests were conducted and convergent and discriminant validity were evaluated. Both tests are described below as well as the findings.

a) Convergent Validity

Factor loadings were examined in order to identify convergent validity of measurement items. Items exhibit good convergent validity when they load strongly
on their common construct, a loading that is above 0.5 signifies convergent validity (Anderson & Gerbing, 1988). In this study, the final items loaded well on their respective constructs with the values ranging from 0.504-0.801. This therefore indicates good convergent validity where items are explaining more than 50% of their respective constructs. Furthermore, since CR values are above the recommended threshold of 0.5, this substantiates the existence of convergent validity.

b) Discriminant validity

Discriminant validity has been checked by checking the inter-correlation between the constructs; comparing the Average Variance Extracted vs shared variance. Average Variance Extracted (AVE) value ensures that there is “no significant inter-research variables cross-loadings” (Chinomona, 2013, p. 1308).

- **Average Value extracted (AVE) and Shared Value (SV)**

The results of the AVE calculations are presented in Table 4-4 and the actual calculations can be found in Appendix 1.

The Average Variance Extracted was examined using the following formula:

\[
\eta = \frac{\sum \lambda_i \eta_i^2}{\sum \lambda_i \eta_i^2 + \sum \epsilon_i}
\]

\[
AVE = \text{summation of the squared of factor loadings/} \{(\text{summation of the squared of factor loadings})+(\text{summation of error variances})\}
\]

A good representation of the latent construct by the item is identified when the variance extracted estimate is above 0.5 (Hair et al., 2010; Chinomona & Dubihlela, 2014). Chin (1998) concurs that AVE of 0.4 with composite reliability of 0.7 or more is acceptable. The results of this study showed an AVE values between 0.328 and 0.538, which is within 0.4 marginally acceptable range and CR between 0.748 to 0.833.

Discriminant validity assesses if the correlation between the research constructs is less than 1.0 (Chinomona, 2011). As indicated in the Inter-construct correlation matrix in Table 4-5 below, the inter-correlation values for all paired latent variables are less than 1.0 hence confirming the existence of discriminant validity.
Correlations between Constructs

Table 4-5: Inter construct correlation matrix

<table>
<thead>
<tr>
<th>Research Constructs</th>
<th>BA</th>
<th>PI</th>
<th>FV</th>
<th>CFI</th>
<th>PV</th>
</tr>
</thead>
<tbody>
<tr>
<td>Brand Association (BA)</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Peer Influence (PI)</td>
<td>.363**</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flavour Variety (FV)</td>
<td>.319**</td>
<td>.308**</td>
<td>1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Consumption Frequency Intention (CFI)</td>
<td>.298**</td>
<td>.352**</td>
<td>.275**</td>
<td>1</td>
<td></td>
</tr>
<tr>
<td>Perceived Value (PV)</td>
<td>.543**</td>
<td>.319**</td>
<td>.299**</td>
<td>.389**</td>
<td>1</td>
</tr>
</tbody>
</table>

**. Correlation is significant at the 0.01 level (2-tailed).

Note: BA = Brand Association; FV = Flavour Variety; PI = Peer Influence; PV = Perceived Value, CFI = Consumption Frequency Intention

Source: (Author's own compilation based on data collected through survey)

4.5 CFA: Model and Model Fit assessment

4.5.1 CFA Model

Figure 11-1 below is a diagrammatic representation of the Confirmatory Factor Analysis model. On the model, latent variables are signified by the circular or oval shape while observed variables are represented by the rectangular shapes. Adjacent to the observed variables are measurement errors which are represented by circular shapes as well. The bidirectional arrows connote the relationship between latent variables.

According to Hair et al., (2010, p. 665), “once a specified model is estimated, model fit compares the theory to reality by assessing the similarity of the estimated covariance matrix theory to reality (the observed covariance matrix)”. This assessment is discussed in the section below.
4.5.2 Model Fit assessment

Model fit assessment is conducted for the purpose of determining how well the model is represented by the sampled data. The Model Fit was assessed under criteria indicated in Table 4-6 below, with a description of the acceptable threshold.

Deletion of some measurement items was carried out in order to elicit acceptable fit and the resultant scale accuracy. Thereafter, model fit was inspected through...
examining goodness-of-fit values i.e. Chi-square/degrees of freedom ($\chi^2$/DF), NFI, TLI, IFI, CFI and RMSEA. According to Jenatabadi et al., (2014, p. 27), “if the goodness-of-fit indices are acceptable, then it can be concluded that the items’ targeted constructs can be measured adequately”.

In this study, all eight goodness-of-fit indices provided in the Model Fit (CFA), meet their respective recommended thresholds. Table 4-6 below indicates the results pertaining to the assessment. They are discussed hereafter.

a) Model Fit

Table 4-6: Model Fit results CFA

<table>
<thead>
<tr>
<th>Model Fit Indices</th>
<th>Acceptable Threshold</th>
<th>Study Threshold</th>
<th>Acceptable/ Unacceptable</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chi-Square Value: $\chi^2$/df</td>
<td>&lt;3</td>
<td>1.711</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Comparative Fit Index (CFI)</td>
<td>&gt; 0.900</td>
<td>0.921</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Goodness of Fit Index (GFI)</td>
<td>&gt; 0.900</td>
<td>0.901</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Incremental Fit Index (IFI)</td>
<td>&gt; 0.900</td>
<td>0.922</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Normed Fit Index (NFI)</td>
<td>&gt; 0.900</td>
<td>0.831</td>
<td>Acceptable/ Unacceptable</td>
</tr>
<tr>
<td>Tucker Lewis Index (TLI)</td>
<td>&gt; 0.900</td>
<td>0.909</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Parsimony Fit (PRATIO)</td>
<td>Close to 1</td>
<td>0.874</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Random Measure of Standard Error Approximation (RMSEA)</td>
<td>&lt; 0.08</td>
<td>0.049</td>
<td>Acceptable</td>
</tr>
</tbody>
</table>

Source: (Author’s own compilation based on data collected through survey)

b) Chi-square ($\chi^2$/DF)

The indicator value for chi-square over degree of freedom is 1.711 which therefore signifies an acceptable model fit, as a chi-square value below 3 is an indication of acceptable model fit (Chinomona, 2011).

c) Comparative Fit Index (CFI)

A value that meets or exceeds 0.9 with regard to CFI is an indication that there is good fit (Hu & Bentler, 1999). Given that the study’s CFI value is 0.921, this means that there is good fit.
d) **Goodness of Fit Index (GFI)**

GFI should be equal to or greater than 0.90 to accept the model (Bollen, 1990; Chinomona, 2011). Given that the study’s GFI value is 0.901, this means that the model is acceptable.

e) **Incremental Fit Index (IFI)**

An IFI should be equal or greater than 0.9 in order to accept the model (Chinomona, 2011). The study’s IFI value 0.922 exceeds the recommended threshold 0.9, and thus validates good model fit.

f) **Normed Fit Index (NFI)**

The NFI value that is greater than 0.90 indicates a good fit (Bentler & Bonnet, 1980). Hooper et al., (2008) contend that 0.80 cutoff is acceptable. The study’s NFI value of 0.831 meets the recommended threshold according to Hooper at al., (2008), and therefore confirms good fit.

g) **Tucker-Lewis Index (TLI)**

A Tucker-Lewis Index value that meets or exceeds 0.9 signifies an acceptable model fit (Chinomona, 2011). The study’s TLI value of 0.909 conveys that there is an acceptable model fit.

h) **Parsimony Fit (PRATIO)**

A value close to 1 is an indication that there is good fit (Chinomona, 2011). Given that the study’s PRATIO value is 0.874, this means that there is good fit.

i) **Root Mean Square Error of Approximation (RMSEA)**

RMSEA value that falls below 0.08 indicates an adequate fit (Hu & Bentler, 1999). The study’s RMSEA value 0.0491 appears to be falling below 0.08, this validates good model fit.
Based on all eight goodness-of-fit indices provided in the Model Fit results (CFA), these all meet their respective recommended thresholds, and therefore it can be concluded that the data fits the model.

4.6 Path Modelling

The path modelling procedure is conducted for the purpose of evaluating causal relationships among latent variables; this includes multiple regression analysis and path analysis and models the relationship among latent variables. Figure 12-1 below is a representation of the path model. Much like the CFA model, the ovals represent the latent variables while the rectangles represent the observed variables. The unidirectional arrow signifies the influence of one variable on another. The model fit assessment will be discussed in the section hereafter.

Figure 12-1: Structural model

Note: BA= Brand Association  
FV= Flavour Variety  
PI= Peer Influence  
PV= Perceived Value  
CFI=Consumption Frequency Intention  
e=measurement error  

Source: (Author's own compilation based on data collected through survey)
4.6.1 Model Fit

Table 4-7: Model Fit results path modelling

<table>
<thead>
<tr>
<th>Model Fit Indices</th>
<th>Acceptable Threshold</th>
<th>Study Threshold</th>
<th>Acceptable/ Unacceptable</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chi-Square Value: $\chi^2/(df)$</td>
<td>&lt;3</td>
<td>2.494</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Comparative Fit Index (CFI)</td>
<td>&gt; 0.900</td>
<td>0.828</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Goodness of Fit Index (GFI)</td>
<td>&gt; 0.900</td>
<td>0.855</td>
<td>Close Fit</td>
</tr>
<tr>
<td>Incremental Fit Index (IFI)</td>
<td>&gt; 0.900</td>
<td>0.830</td>
<td>Close Fit</td>
</tr>
<tr>
<td>Normed Fit Index (NFI)</td>
<td>&gt; 0.900</td>
<td>0.746</td>
<td>Close Fit &gt;0.800 (Hooper et al., 2008, p. 55)</td>
</tr>
<tr>
<td>Tucker Lewis Index (TLI)</td>
<td>&gt; 0.900</td>
<td>0.809</td>
<td>Close Fit</td>
</tr>
<tr>
<td>Parsimony Fit (PRATIO)</td>
<td>Close to 1</td>
<td>0.901</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Random Measure of Standard Error Approximation (RMSEA)</td>
<td>&lt; 0.08</td>
<td>0.071</td>
<td>Acceptable</td>
</tr>
</tbody>
</table>

Source: (Author’s own compilation based on data collected through survey)

Much like Model Fit CFA results, Model Fit path modelling results in Table 4-7 exhibit goodness-of-fit values elicited through carrying out structural model testing. The recommended threshold pertaining to the respective model fit indices, apply here as well. In the Table below, the indicator value 2.494 for the chi-square over degree of freedom falls below the recommended threshold that is 3. As such, this result signifies acceptable model fit. The goodness-of-fit indices for NFI, TLI, IFI and CFI indicate a close fit. These results are therefore an indication of acceptable model fit. Furthermore, as a value that falls below 0.05 and 0.08 is an indication of good model fit with regard to RMSEA, the RMSEA value 0.071 exhibited in the table supports the existence of good model fit as it conforms to the recommended threshold.

Given that all eight goodness-of-fit indices provided in the table meet their respective recommended threshold (acceptable/close fit) here also, it can be concluded that the data is fits the model.

4.7 Hypothesis testing results (Path modelling)

The study’s hypotheses were tested in order to evaluate these relationships between latent variables. According to Nusair and Hua (2010, p. 316), “once the hypothesized
measurement and structural model has been assessed and finalized, the next step is to examine causal relationships among latent variables by path analysis”.

Table 4-8 below indicates results elicited following the hypotheses test. Table 4-8 indicates the proposed hypotheses, factor loadings, p values and whether a hypothesis is rejected or supported. According to Chinomona, Lin, Wang and Cheng (2010, p191) “p<0.05, p<0.01 and p<0.001 are indicators of relationship significance and that positive factor loadings indicate strong relationships among latent variables”. The study’s factor loadings were all at least at a significant level of p<0.001.

4.7.1 Results from Testing the Structural Model

Table 4-8: Structural model results

<table>
<thead>
<tr>
<th>Proposed hypothesis relationship</th>
<th>Hypothesis</th>
<th>Path coefficients/ Factor Loading</th>
<th>P value</th>
<th>Rejected/ Supported</th>
</tr>
</thead>
<tbody>
<tr>
<td>BA → CFI</td>
<td>+H1</td>
<td>0.019</td>
<td>.794</td>
<td>Supported</td>
</tr>
<tr>
<td>FV → CFI</td>
<td>+H2</td>
<td>0.159</td>
<td>.030</td>
<td>Supported</td>
</tr>
<tr>
<td>PI → CFI</td>
<td>+H3</td>
<td>0.319</td>
<td>***</td>
<td>Supported</td>
</tr>
<tr>
<td>PV → CFI</td>
<td>+H4</td>
<td>0.382</td>
<td>***</td>
<td>Supported</td>
</tr>
</tbody>
</table>

Note: *** = p<0.01

Source: (Author’s own compilation based on data collected through survey)

a) Brand Association → Consumption Frequency Intention:

The coefficient of H1 was 0.019, and this suggests an insignificant, yet positive relationship between BA and CFI. The results do not show a significant relationship, as the relationship is just positive, which therefore means that the hypothesis is supported.
b) **Flavour Variety → Consumption Frequency Intention:**

The coefficient of H2 was 0.159, and this suggests a positive relationship between FV and CFI (much stronger than H1). The results do not show a significant relationship, as the relationship is just positive. An insignificant, yet positive relationship was found, which therefore means that the hypothesis is supported.

c) **Peer Influence → Consumption Frequency Intention:**

The coefficient of H3 was 0.319, and this suggests a strong relationship between PI and CFI (much stronger than H1 and H2). The P value indicates a significant 99% confidence level between the relationship, or simply ***which therefore means that the hypothesis is significantly supported.

d) **Perceived Value → Consumption Frequency Intention:**

The coefficient of H4 was 0.382, and this suggests a strong relationship between PV and CFI (much stronger than H1, H2 and H3). The P value indicates a significant 99% confidence level between the relationship, or simply ***, which therefore means that the hypothesis is significantly supported.

4.8 **Summary**

The study hypothesized that brand association, flavour variety, peer influence and perceived value positively influence consumption frequency intention of SSDs amongst South African youth. All four hypotheses (H1-H4) were supported, therefore indicating that brand association, flavour variety, peer influence and perceived value have an important effect on consumption frequency intention of SSDs amongst South African youth. PV coefficient value of 0.382 has the strongest influence on CFI, followed by PI coefficient value of 0.319. Both PV and PI appear to have a stronger relationship with CFI, compared to both FV coefficient value of 0.159 and BA coefficient value of 0.019. This insight is critical bearing in mind that the South Africa SSD competitive landscape is value driven.
CHAPTER 5. DISCUSSION OF RESULTS

5.1 Introduction

The purpose of this chapter is to put forward a discussion of both descriptive and inferential statistics as presented in the previous chapter. The chapter has three main headings, namely; respondent demographic profile discussion, results discussion per hypothesis, and conclusion.

5.2 Discussion demographic results

The respondents were asked to report their demographic information, including gender, age, highest academic level, occupation, monthly income or access to cash, favourite sparkling soft drink brand and sparkling soft drink frequency of weekly usage.

With regards to gender, the respondents were predominantly female 175 (i.e. 58.3%). Census (2011) has however reported that of those between 15 and 24 years, 49.5% are female. Previous studies in the SSD category, have however reported participants averaging at 50% female (Grimm et al., 2004; Veerecken, et al., 2005). Several studies on consumer behaviour have indicated that male and female respond differently to stimuli, and that female tend to respond more positively (Palmer and Bejou, 1995; Chiu, Lin & Tang, 2005). This could be the reason more female participated in the survey, another reason could be the fact that selection of respondents was left entirely to the referrals based on snowball method.

Respondents ranged between age 16 and 24 years, and 85% of them had monthly income or access to cash of less than R1000 per month, this statistic is in line with The World Bank (2015) that reported that some South African’s live on $US 2 a day. This is indicative of the spending power of a quarter of the population. 92% of the respondents had either below matric or matric as highest academic level. This result is in line with the Census (2011) statistic that indicates that 91.7% Black/African population group by level of education had either below matric or matric as highest academic level. 87.3% of respondents were unemployed. The study’s figure is higher
than Statistics SA (2015) 39.8% youth unemployment for Gauteng province across race. The results of the study could be high as a result of 16 to 18 year olds indicating that they are unemployed versus being a student. Some of the respondents could have claimed that their informal or part time jobs belong into official unemployment status. The findings of the study are therefore particular for this segment. About 55.7% of the respondents reported Coca-Cola as their favourite sparkling soft drink brand. 29.7% of the respondents consume SSDs three to four times per week with 66% of the consumption based on sharing with friends or family.

5.3 A Critical Discussion of the Findings from Hypothesis Testing

The purpose of this study is to examine the influence of brand association, flavour variety, peer influence and perceived value, on consumption frequency intention in the SSD category amongst youth in South Africa.

The empirical results supported all the predicted research hypotheses, as depicted in Table 5-1. The results indicate; Brand association coefficient value of 0.019, Flavour variety coefficient value of 0.159, Peer influence coefficient value of 0.319 and Perceived value coefficient value of 0.382 have a strong effect on consumption frequency intention. The relationship between Perceived value and consumption frequency is robust with a coefficient value of 0.382.

**Table 5-1: Structural model results summary**

<table>
<thead>
<tr>
<th>Proposed hypothesis relationship</th>
<th>Hypothesis</th>
<th>Path coefficients/ Factor Loading</th>
<th>P value</th>
<th>Rejected/ Supported</th>
</tr>
</thead>
<tbody>
<tr>
<td>BA --- &gt; CFI</td>
<td>+H1</td>
<td>0.019</td>
<td>.794</td>
<td>Supported</td>
</tr>
<tr>
<td>FV --- &gt; CFI</td>
<td>+H2</td>
<td>0.159</td>
<td>.030</td>
<td>Supported</td>
</tr>
<tr>
<td>PI --- &gt; CFI</td>
<td>+H3</td>
<td>0.319</td>
<td>***</td>
<td>Supported</td>
</tr>
<tr>
<td>PV --- &gt; CFI</td>
<td>+H4</td>
<td>0.382</td>
<td>***</td>
<td>Supported</td>
</tr>
</tbody>
</table>

Note: *** = p<0.01

*Source: (Author’s own compilation based on data collected through survey)*
5.3.1 Brand Association – Consumption Frequency Intention

The first variable tested was the relationship between BA and CFI for sparkling soft drinks. The results for this study indicated that the effect is positive, with a coefficient value of 0.019. This study confirms that if consumers have a positive attitude towards brand association, they would be willing to consider buying SSDs. The positive linkage between BA and CPI was validated by various studies (Low & Lamb, 2000; Río et al., 2001; Cheng-Hsui, 2001; French & Smith, 2013; Sasmita & Mohd Suki, 2015) who found similar results. Furthermore, this confirmed that this linkage is positive p<0.01. This result was found to be similar to that of Pouromid and Iranzadeh (2012) as well as Sasmita and Mohd Suki (2015) and hence supports these previous findings.

It is generally accepted that consumers refer to brand associations while making purchase decisions (Aaker, 1991). It has also been suggested that the presence or absence of those contextual factors (e.g. printed advertising, in-store displays) may influence the consumer’s purchase decision (Cohen, 1982). The theory of planned behaviour hypothesised that attitude plays an important role in explaining intention and beliefs about outcomes of behaviour and evaluations of outcomes (Azjen, 1991). When BA is compared to other variables, BA has the least positive effect on consumption frequency intention with a coefficient value of 0.019. The results also indicated that youth in Soweto place a lower level of importance on BA in their intention to consume sparkling soft drinks compared to other tested constructs in the study.

Young consumers strongly and actively use knowledge in evaluating products during purchasing decisions (Mohd Suki, 2013). This study proved that youth in Soweto, to some extent, also use knowledge in evaluating products during purchasing decisions. This study also aligns with findings by Sasmita and Mohd Suki (2015), on the basis that brand association and brand loyalty are the other vital factors for consideration by marketers and practitioners in gaining young customer positive acceptance of the product or brand. On the contrary, a study conducted by Low and Lamb (2000) conceptualizes brand image, brand attitude and perceived quality as possible
dimensions of brand associations, the same study concludes that brand associations for different products should be measured using different items.

The higher the brand associations in the product, the more it will be remembered by the consumer who will be loyal towards the brand (Sasmita & Mohd Suki, 2015). For any given brand, consumers use brand associations to help process, organize, and retrieve information in memory and to aid them in their purchase decisions (Aaker, 1991; Low & Lamb, 2000; French & Smith, 2013).

5.3.2 Flavour Variety – Consumption Frequency Intention

The current study hypothesised that a positive relationship exists between FV and CFI. The findings indicate that the effect of FV on CFI is significant at p<0.01 with a coefficient value of 0.159. The positive linkage between FV and CPI was validated by various studies (Grossman & Wisenblit, 1999; Roedder-John, 1999; Loewen & Pliner, 2000; Gollety & Guichard, 2011). For example, in an investigation conducted by Miller and Khan (2005), the researchers established that FV had a significant and positive influence on CFI. Similarly, Dehdari and Mergen (2012), who examined consumers CFI for soft drinks, found that FV was one of the key determining consumption factors of sparkling soft drinks. This finding makes it important for marketers to increase their flavour offerings.

Further investigations by Lange et al., (2000) stated that the effect of taste-based preferences was at least two times larger than the effect of price in relation to the amount of orange juice ordered by consumers when placed in situations where their budgets were constrained. Contrary to this, other researchers found that price was a more important factor in determining purchase likelihood/choice probability (Jaeger et al., 2011). Interestingly, Sabbe et al., (2009) indicated that flavour and health are more important factors for fruit juices.

This study is in agreement with Grimm et al., (2004) as well as Miller and Khan (2005) regarding flavour naming strategies. For example, in an investigation conducted by Chang and Huang (2001), the researchers established that in China there is a
preference for foreign names for soft drinks, especially amongst the youth. The China results also indicated a preference for soft drink brand naming according to cold-related and water-related works (Chang & Huang, 2001), this is also in line with the findings of Miller and Khan (2005), as well as with this study. Further investigations suggest that taste preferences begin early in life, and it could be most effective to intervene at an early age (Grimm et al., 2004).

5.3.3 Peer Influence – Consumption Frequency Intention

The current study hypothesised that a positive relationship exists between PI and CFI. The findings further substantiated the fact that the effect of PI on CFI was significant at p<0.01 with a coefficient value of 0.319. This finding was in line with the results from previous studies, where it was established that PI had an effect on intention to consume sparkling soft drinks. For example, in a study conducted by Norgaard, Hansen and Grunert (2013), the researchers established that PI had a highly significant and positive influence on CFI for adolescent snacking. Similarly Wouters, Larsen, Kremers, Dagnelie and Geenen (2010), who examined consumers consumption intention; found that PI was one of the key determining factors of consumer consumption.

In addition (Lessig & Park, 1978; Makgosa & Mohube, 2007; Schiffman & Kanuk, 2007) stated that peer groups tend to inform and make individuals aware of specific product and brands, as well influence individuals. When it comes to product consumption or product purchase, Bristol and Mangleburg (2005) state that peer groups are able to specify what are desirable and undesirable products.

Empirical evidence from Norgaard et al., (2013) on peer influence adolescent snacking, concurs with Bourne (1957), as they both agree that when a product is consumed in public, the impact of peer group influence is high, stating that the reason for this is the pressure to comply to peer expectations. On the contrary, other researchers (Makgosa & Mohube, 2007) have found that whether a product is exclusive or private, there is a tendency for young adults to comply to peer expectations.
Marketers are accepting the importance of peer influence on consumer decision making (Kotler, 1980; Bearde & Etzel, 1982; Xie & Singh, 2007; Norgaard et al., 2013; Sasmita & Mohd Suki, 2015).

5.3.4 Perceived Value – Consumption Frequency Intention

The study revealed that PV was the most significant positive variable – with a coefficient value of 0.382. Therefore, the current study established that if there is perceived value towards sparkling soft drinks, consumers would be more than willing to consider sparkling soft drinks. This finding is supported by Utility theorists, Lancaster (1971) previously stated that consumers do not buy a product, but buy attributes at a certain price. The positive linkage between PV and CFI was also validated by a number of studies (Treadgold, 1999; Chi & Kilduff, 2011; Jamal & Sharifuddin, 2015) that found similar results. In addition, perceived value of the consumer has been argued to be the most important indicator of repurchase intentions (Parasuraman & Grewal, 2000). This finding is consistent with this study, as the relationship between perceived value and consumption frequency intention is the most robust 0.382***, meaning that marketers need to deliver value which will increase consumer willingness to purchase or consume more.

According to Holbrook (1994), obtaining value is a consumer’s fundamental shopping goal, interestingly Woodruff (1997) stated that creating consumer value will increasingly become the critical source of competitive advantage for companies. Sánchez-Fernández and Iniesta-Bonillo (2007, p. 428), however, believe that the concept of customer perceived value “has become one of the most overused and misused concepts in the social sciences in general and in the management literature in particular”. Similarly Holbrook and Corfman (1985) maintained that value perceptions are situational and are highly dependent on the context within which a decision occurs.

Empirical evidence was shared by Zeithaml (1988), it indicated that the “value” term was described and used in many different ways, the study echoed the findings of
Holbrook and Corfman (1985), as it highlighted that what constitutes value (even in a single product category) appears highly personal with respondents also differing considerably in the expressions of value; Zeithaml (1988) states that some defined value as (1) “low price,” (2) “whatever I want in a product,” (3) “the quality I get for the price I pay,” and (4) “what I get for what I give.” The respondents definition of “low price” is consistent with that of Schechter (1984), while the respondents definition of “whatever I want in a product” is consistent with that of Schechter (1984), while the respondents definition of “the quality I get for the price I pay,” is consistent with that of several others (Bishop, 1984; Doyle, 1984), while the respondents definition of “what I get for what I give” is consistent with that of Sawyer and Dickson (1984).

Marketers need to remember that customers choose products that provide the highest value. If products satisfy customer needs, they view its costs as perceived value. As part of retaining existing customers, managers should focus their efforts on managing perceived value for their existing customers. Price is a salient feature that can influence customer’s evaluation of products or services.

5.4 Conclusion

Based on the above discussion, the four constructs, namely BA, FV, PI and PV have a positive influence on CFI of youth in Soweto within the sparkling soft drink category. All hypotheses are supported with, Brand association coefficient value of 0.019; Flavour variety coefficient value of 0.159; Peer influence coefficient value of 0.319 and Perceived value coefficient value. Perceived value has the strongest relationship with CFI at 0.382.

5.5 Summary

This chapter discussed the results presented in Chapter 4. Both descriptive and inferential discussions are included. The next chapter highlights recommendations based on the findings of the study; this is followed by implications, as well as limitations and suggestions for future research.
CHAPTER 6. CONCLUSIONS AND RECOMMENDATIONS

6.1 Introduction

This chapter concludes the study. It presents the conclusions and recommendations which are then followed by implications and limitations. Suggestions for future research are presented at the end of the chapter.

6.2 Conclusion

The purpose of this study was to investigate the influence of brand association, flavour variety, peer influence and perceived value, on consumption frequency intention in the sparkling soft drink category amongst South African youth. The study investigated how each predictor influences consumption frequency intention and determined which predictor holds the strongest relationship with consumption frequency intention of SSDs amongst South African youth.

The study proved that there is a positive relationship between brand association, flavour variety, peer influence, perceived value and consumption frequency intention. The outcome of the study is in line with the hypotheses put forward. The empirical results from the study supported all research hypotheses in a significant way. All four hypotheses are supported, with results indicating a positive relationship between brand association 0.019; flavour variety 0.159; peer influence 0.319; perceived value 0.382 and consumption frequency intention. The relationship between perceived value and consumption frequency is the most robust 0.382. The study provided evidence to validate the applicability of the Theory of planned behaviour, which is the theoretical framework of this study.

As part of this investigation of the influencers of consumption frequency in the SSDs category amongst South African youth, the hypotheses of the four influencers included: $H_1 \Rightarrow$ there is a positive relationship between brand association and consumption frequency intention amongst South African youth, $H_2 \Rightarrow$ there is a positive relationship between flavour variety and consumption frequency intention
amongst South African youth, \( H_3 \Rightarrow \) there is a positive relationship between peer influence and consumption frequency intention amongst South African youth, \( H_4 \Rightarrow \) there is a positive relationship between perceived value and consumption frequency intention amongst South African youth. The consistency matrix that is shown below in Table 6-1 links the sub-problems, hypotheses and findings.

Table 6-1: Consistency matrix linking sub-problems, hypotheses and findings

<table>
<thead>
<tr>
<th>Sub-problem</th>
<th>Literature Review</th>
<th>Hypotheses or Propositions or Research questions</th>
<th>Findings</th>
<th>Supported /Rejected</th>
<th>Analysis</th>
</tr>
</thead>
<tbody>
<tr>
<td>b) To determine which predictor holds the strongest relationship with consumption frequency intention of SSDs amongst South African youth</td>
<td></td>
<td>( H_2 \Rightarrow ) there is a positive relationship between flavour variety and consumption frequency intention amongst South African youth</td>
<td>+H2: 0.159</td>
<td>Supported</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>( H_3 \Rightarrow ) there is a positive relationship between peer influence and consumption frequency intention amongst South African youth</td>
<td>+H3: 0.319</td>
<td>Supported</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>( H_4 \Rightarrow ) there is a positive relationship between perceived value and consumption frequency intention amongst South African youth</td>
<td>+H4: 0.382</td>
<td>Supported</td>
<td></td>
</tr>
</tbody>
</table>

*All other References are in listed in Reference section.*

Source: (Author's own compilation)
6.3 Recommendations

The recommendations presented are based on theory building in order to solve the research problem. The results of this study provide support for the TPB. It is proposed that organisations focus on factors that impact on the individuals’ intention to perform specific behaviours as depicted in Figure 13-1 below, these include:

- attitude towards the behaviour (A)
- subjective norm (SN)
- perceived behavioural control (PBC)

![Diagram of SSD consumption based on The Theory of Planned Behaviour](image)

**Figure 13-1: Diagram of SSD consumption based on The Theory of Planned Behaviour**

*Source:  (Fishbein & Ajzen, 1975; Ajzen, 1985; Ajzen, 1991; Balian, 2009) and *(Author’s own edits based on conceptual model & survey data)*

6.3.1 Attitude towards the behaviour (A)

Organisations can influence consumers to have unfavourable or favourable evaluations of their brands. In this study brand association and flavour variety were the Attitude influencers for SSD consumption intention frequency amongst South African youth.
6.3.1.1 Brand association

Brand association had a positive relationship with consumption frequency intention in the SSD category amongst South African youth. The positive relationship between brand association and behavioural intention was also reported in other studies (Low & Lamb, 2000; Río et al., 2001; Cheng-Hsui, 2001; French & Smith, 2013; Sasmita & Mohd Suki, 2015). Moreover, Sasmita and Mohd Suki, (2015) reported that the higher the brand associations in the product, the more the product will be remembered, and the greater the loyalty towards the product. Favourable brand associations should be developed, as consumers attitude towards a brand can rely on favourable information that is in stored in the consumers’ memory.

6.3.1.2 Flavour variety

Flavour variety was the most important predictor of attitude. When respondents were asked which flavour names make them want to drink more SSDs, ambiguous flavour names and fantasy fruit flavour names were popular, especially amongst 16-18 year olds. These findings are interestingly aligned to Chang and Huang (2001) who established that youth in China have a preference for foreign names of SSDs. This belief amongst the youth needs to be addressed by developing flavour strategies.

6.3.2 Subjective norm (SN)

6.3.2.1 Peer influence

Peer influence had a positive relationship with consumption frequency intention in the SSD category amongst South African youth. Earlier studies indicated that, as youth spend more time with their peers, the most influence tends to be from their peers and less from their parents (John, 1999; Kongsholm, 2007; Newman, Lohman, Newman, 2007; Xie & Singh 2007). Peer influence programs should be incorporated into marketing plans, as peer groups have the power to influence purchase decisions.
6.3.3 Perceived behavioural control (PBC)

6.3.3.1 Perceived value

Perceived value has a significantly positive relationship with consumption frequency intention in the SSD category amongst South African youth. This means that youth are more likely to consume soft drinks if there is perceived value. The strong association between perceived value and behavioural intention has been reported in earlier studies (Treadgold, 1999; Parasuraman & Grewal, 2000; Chi & Kilduff, 2011; Jamal & Sharifuddin, 2015). As part of an effort to increase consumption of SSDs, organisations need to manage value perceptions.

6.4 Implications

This study has managerial, theoretical and contextual implications.

6.4.1 Managerial implications

There are several management implications that follow from this study on the influencers of consumption frequency intention in the SSD category amongst South African youth.

Firstly, based on the theoretical framework that underpins this study (TPB), the researcher has proposed a model that consists of four influencers (brand association, flavour variety, peer influence and perceived value) and an outcome variable (consumption frequency intention). Managers could build and develop brand associations that are favourable and memorable to consumers’ minds, and can be easily triggered at the judgement stage of consumption or purchase. SSD flavour strategies can assist managers with flavour naming approach. By recognising and accepting the power of peer influence amongst the youth, managers could create positive conversation around their brands, and target opinion leaders who are group influencers or student leaders. Managers could improve perceived value attributes by
using the four dimensions of perceived value as proposed by Sweeney and Soutar (2001) being; price/value for money, quality/performance, emotional and social.

Secondly, this study makes a contribution to policy makers regarding mindful consumption of SSDs. Insights of this study could assist in the development of new policies. Managers could do joint development of policies with policy makers based on SSD weekly quantity frequency insights gained from this study.

### 6.4.2 Theoretical implications

The study contributes to academic literature in South Africa and consumer behavior in emerging markets. The findings provide tentative support to the proposition that brand association, flavour variety, peer influence and perceived value should be recognized as significant antecedents for gaining and sustaining consumption frequency in South Africa.

### 6.4.3 Contextual implications

The study adds unique perspectives to the Fast Moving Consumer Goods (FMCG) industry. The findings provide unique perspectives of intention influencers in the SSD product category in South Africa. The findings indicate that brand association, flavour variety, peer influence and perceived value are important factors in influencing consumption and purchase intention in the SSD category.

### 6.5 Limitations and Suggestions for future research

#### 6.5.1 Limitations of research

The limitations of the study are discussed prior to suggestions of future research. The limitations of the study are discussed below:

Firstly, from a methodology point of view, larger samples are preferred for SEM. Because SEM requires a model specification upfront, the researcher needed to
review relevant theory and literature to support the model specification. The researcher also needed to select existing measurement scales or develop and test any new measurement scale. In this study, the researcher had to design and re-test the flavour variety measurement scale more than once before final fieldwork commenced. The researcher’s aim was to conduct a study based on consumption intention, however the closest measurement items available were based on usage intention and purchase intention. The researcher was able to use the most relevant intention measurement that was aligned to consumption intention and behavioural intention.

Secondly, the study was limited to a specific geographical area and youth between the ages of 16 and 24. The study did not include other beverage categories or other industries.

Thirdly, the study focused on specific predictor variables and did not include more constructs that could have been explored.

6.5.2 Suggestions of future research

Based on the findings of the study as well as the limitations, this study highlights suggestions for future research.

The study can be strengthened by increasing the sample size and including participants in other geographical areas, as well as other age groups. The study can also include other provinces of South Africa or other countries within Africa or other industries. Further research could also examine more constructs based on the theoretical framework of the Theory of Planned Behaviour (TPB) related to attitude, subjective norm and perceived behavioural control. Constructs related to behavioural intention such as brand love, brand image, brand experience and brand satisfaction could be explored.
References


APPENDIX 1: ACTUAL CALCULATIONS FOR CR & AVE

Composite Reliability Calculations

Formula Used: $CR_\eta = (\Sigma \lambda y_i)^2/[(\Sigma \lambda y_i)^2 + (\Sigma \epsilon_i)]$

Brand Association
$\Sigma \lambda y_i^2 = (0.504 + 0.573 + 0.606 + 0.633 + 0.540)^2 = 8.157$
$\Sigma \epsilon_i = [(0.504)^2 + (0.573)^2 + (0.606)^2 + (0.633)^2 + (0.540)^2] = 1.642$
$CR = 8.157/(8.157 + 1.642) = 0.832$

Flavour Variety
$\Sigma \lambda y_i^2 = (0.573 + 0.607 + 0.592 + 0.705 + 0.579)^2 = 9.339$
$\Sigma \epsilon_i = [(0.573)^2 + (0.607)^2 + (0.592)^2 + (0.705)^2 + (0.579)^2] = 1.880$
$CR = 9.339/(9.339 + 1.880) = 0.832$

Peer Influence
$\Sigma \lambda y_i^2 = (0.703 + 0.772 + 0.777 + 0.669 + 0.741)^2 = 13.410$
$\Sigma \epsilon_i = [(0.703)^2 + (0.772)^2 + (0.777)^2 + (0.669)^2 + (0.741)^2] = 2.691$
$CR = 13.410/(13.410 + 2.691) = 0.833$

Perceived Value
$\Sigma \lambda y_i^2 = (0.589 + 0.588 + 0.645 + 0.599 + 0.601)^2 = 9.132$
$\Sigma \epsilon_i = [(0.589)^2 + (0.588)^2 + (0.645)^2 + (0.599)^2 + (0.601)^2] = 1.829$
$CR = 9.132/(9.132 + 1.829) = 0.833$

Consumption Frequency Intention
$\Sigma \lambda y_i^2 = (0.651 + 0.801 + 0.657)^2 = 4.448$
$\Sigma \epsilon_i = [(0.651)^2 + (0.801)^2 + (0.657)^2] = 1.829$
$CR = 4.448/(4.448 + 1.497) = 0.748$
Average Variance Extracted Calculations

Formula Used: $\eta = \frac{\sum \lambda y_i^2}{\sum \lambda y_i^2 + \sum \epsilon_i}$

Brand Association
$\sum \lambda y_i^2 = [(0.504)^2 + (0.573)^2 + (0.606)^2 + (0.633)^2 + (0.540)^2] = 1.642$
$\sum \epsilon_i = [(1-0.504)^2 + (1-0.573)^2 + (1-0.606)^2 + (1-0.633)^2 + (1-0.540)^2] = 3.358$
AVE = $1.642/(1.642 + 3.358)$
= 0.328

Flavour Variety
$\sum \lambda y_i^2 = [(0.573)^2 + (0.607)^2 + (0.592)^2 + (0.705)^2 + (0.579)^2] = 1.880$
$\sum \epsilon_i = [(1-0.504)^2 + (1-0.573)^2 + (1-0.606)^2 + (1-0.633)^2 + (1-0.540)^2] = 3.12049$
AVE = $1.880/(1.880 + 3.120)$
= 0.376

Peer Influence
$\sum \lambda y_i^2 = [(0.703)^2 + (0.772)^2 + (0.777)^2 + (0.669)^2 + (0.741)^2] = 2.691$
$\sum \epsilon_i = [(1-0.703)^2 + (1-0.772)^2 + (1-0.777)^2 + (1-0.669)^2 + (1-0.741)^2] = 2.309$
AVE = $2.691/(2.691 + 2.309)$
= 0.538

Perceived Value
$\sum \lambda y_i^2 = [(0.589)^2 + (0.588)^2 + (0.645)^2 + (0.599)^2 + (0.601)^2] = 1.829$
$\sum \epsilon_i = [(1-0.589)^2 + (1-0.588)^2 + (1-0.645)^2 + (1-0.601)^2] = 3.171$
AVE = $1.829/(1.829 + 3.171)$
= 0.366

Consumption Frequency Intention
$\sum \lambda y_i^2 = [(0.651)^2 + (0.801)^2 + (0.657)^2] = 1.497$
$\sum \epsilon_i = [(1-0.651)^2 + (1-0.801)^2 + (1-0.657)^2] = 1.959$
AVE = $1.497/(1.497 + 1.959)$
= 0.433
APPENDIX 2: ETHICS CLEARANCE CERTIFICATE

Miss NE Phiri
30 Alice Springs
Street: Road No 2, Allens Nek
Roodepoort
1735
South Africa

Dear Miss Phiri

Master of Management: Approval of Title

We have pleasure in advising that your proposal entitled The predictors of consumption frequency in the sparkling soft drinks category amongst South African youth has been approved. Please note that any amendments to this title have to be endorsed by the Faculty’s higher degrees committee and formally approved.

Yours sincerely

Mrs Marike Bosman
Faculty Registrar
Faculty of Commerce, Law & Management
Dear Sir/Madam

RE: COMPLETION OF QUESTIONNAIRE

Thank you for paying attention to this academic questionnaire. The purpose of this study is to investigate the impact of brand association, flavour variety, peer influence and perceived value, on consumption frequency in the sparkling soft drink category amongst youth in South Africa.

I therefore, should appreciate your assistance in completing the attached questionnaire. The research is purely for academic purposes and the information obtained will be kept confidential.

It will take you approximately 10 minutes to complete the questionnaire.

Yours Sincerely

Neo Phiri

STUDENT SUPERVISOR

DR N. CHINJE
**SECTION A: GENERAL INFORMATION**

The section asks about your background. Please indicate your answer by marking (X) in the appropriate box.

### A1 Please indicate your gender

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Male</td>
</tr>
<tr>
<td>2</td>
<td>Female</td>
</tr>
</tbody>
</table>

### A2 Please indicate your age category

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>16-18 years</td>
</tr>
<tr>
<td>2</td>
<td>19-21 years</td>
</tr>
<tr>
<td>3</td>
<td>22-24 years</td>
</tr>
</tbody>
</table>

### A3 Please indicate your highest academic level

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
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</thead>
<tbody>
<tr>
<td>1</td>
<td>Below Matric</td>
</tr>
<tr>
<td>2</td>
<td>Matric</td>
</tr>
<tr>
<td>3</td>
<td>Diploma</td>
</tr>
<tr>
<td>4</td>
<td>Degree</td>
</tr>
<tr>
<td>5</td>
<td>Post graduate degree</td>
</tr>
<tr>
<td>6</td>
<td>Other (specify)</td>
</tr>
</tbody>
</table>

### A4 Please indicate your occupation

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Employed</td>
</tr>
<tr>
<td>2</td>
<td>Self-employed</td>
</tr>
<tr>
<td>3</td>
<td>Unemployed</td>
</tr>
</tbody>
</table>

### A5 Please indicate your monthly total income OR your monthly total cash

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Less than R1000</td>
</tr>
<tr>
<td>2</td>
<td>R1001 - R2000</td>
</tr>
<tr>
<td>3</td>
<td>R2001 - R3000</td>
</tr>
<tr>
<td>4</td>
<td>R3001 - R4000</td>
</tr>
<tr>
<td>5</td>
<td>R4001 - R5000</td>
</tr>
<tr>
<td>6</td>
<td>R5001 - R6000</td>
</tr>
<tr>
<td>7</td>
<td>R6000 and above</td>
</tr>
</tbody>
</table>
SECTION B:

_Sparkling soft drinks_ are “fizzy cold drinks” that are carbonated soft drinks and consist of standard cola, diet cola, fruit-flavored carbonates, mixers and other carbonates.

1. **Favourite brand**

Which brand of sparkling soft drink/ “fizzy cold drink” is your most favourite? (Please mark [X] for your favourite brand)

<table>
<thead>
<tr>
<th>Option</th>
<th>Brand</th>
</tr>
</thead>
<tbody>
<tr>
<td>FB1</td>
<td>Sparletta (Sparberry/Crème Soda)</td>
</tr>
<tr>
<td>FB2</td>
<td>Coca-Cola</td>
</tr>
<tr>
<td>FB3</td>
<td>Coo-ee</td>
</tr>
<tr>
<td>FB4</td>
<td>Twizza</td>
</tr>
<tr>
<td>FB5</td>
<td>Jive</td>
</tr>
<tr>
<td>FB6</td>
<td>Kingsley</td>
</tr>
<tr>
<td>FB7</td>
<td>Fanta</td>
</tr>
<tr>
<td>FB8</td>
<td>Pepsi Cola</td>
</tr>
<tr>
<td>FB9</td>
<td>Refresh</td>
</tr>
<tr>
<td>FB10</td>
<td>Sprite</td>
</tr>
</tbody>
</table>

2. **Brand association**

For the following questions, please mark “X” in the relevant boxes which best describes your perception of your favourite “soft drink/ fizzy cold drink”. COMPLETE ALL 7

<table>
<thead>
<tr>
<th>Question</th>
<th>1</th>
<th>2</th>
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<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>BA1 This brand is totally in line with my lifestyle</td>
<td></td>
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<tr>
<td>BA2 This brand of soft drink is popular</td>
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<tr>
<td>BA3 My friends drink this brand of soft drink</td>
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<tr>
<td>BA4 This brand is a brand leader</td>
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<tr>
<td>BA5 Using this product is a social status symbol</td>
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<tr>
<td>BA6 This brand of soft drink is used by famous people with whom I identify</td>
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<tr>
<td>BA7 I would advise other people to buy this brand of soft drink</td>
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</tbody>
</table>
3. Peer influence
For the following questions, please mark “X” in the relevant boxes which best describes your perception of your favourite “soft drink/ fizzy cold drink”. COMPLETE ALL 5

| PI1 | This brand helps me to feel accepted by my friends |
| PI2 | This brand gives me social approval |
| PI3 | This brand improves the way I am perceived |
| PI4 | This brand makes a good impression on other people |
| PI5 | Using this brand gives me a sense of belonging to other users. |

4. Perceived value
For the following questions, please mark “X” in the relevant boxes which best describes your perception of your favourite “soft drink/ fizzy cold drink”. COMPLETE ALL 5

| PV1 | This brand is reasonably priced |
| PV2 | This brand offers value for money |
| PV3 | This brand is good for the current price level |
| PV4 | This brand is economical |
| PV5 | This brand is worth what it costs |
5. Flavour variety “soft drink/cold drink”  
For the following questions, please mark “X” in the relevant boxes which best describes names of “soft drink/ fizzy cold drink” that would make you want to drink more.  
Please mark “X” in the relevant boxes. COMPLETE ALL 9

<table>
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<tbody>
<tr>
<td>FV1</td>
<td></td>
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<tr>
<td>FV2</td>
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<td>FV9</td>
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</tbody>
</table>

- The cold drink name **Apple flavour** makes me want to drink more
- The cold drink name **Peach flavour** makes me want to drink more
- The cold drink name **Monster green flavour** makes me want to drink more
- The cold drink name **Mango tango flavour** makes me want to drink more
- The cold drink name **Millennium orange flavour** makes me want to drink more
- The cold drink name **Midnight sky flavour** makes me want to drink more
- The cold drink name **Mixed Berries flavour** makes me want to drink more
- The cold drink name **Rainslicker flavour** makes me want to drink more
- The cold drink name **Pinewhizz flavour** makes me want to drink more
6. **Consumption Frequency Intention**
   Please indicate to what extent you agree or disagree with each statement: **Please mark “X” in the relevant boxes. COMPLETE ALL 3**

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<thead>
<tr>
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<th>1</th>
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<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CFI1</strong></td>
<td>I intend to continue using soft/cold drinks in the future</td>
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<tr>
<td><strong>CFI2</strong></td>
<td>I will always try to use soft/cold drinks in my daily life</td>
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<tr>
<td><strong>CFI3</strong></td>
<td>I will keep using soft/cold drinks as regularly as I do now</td>
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</tr>
</tbody>
</table>

7. **Quantity Frequency of using**
   Please indicate how often you consume/drink fizzy soft drinks. **(Please mark [X] for the one that most describes how often you drink soft drink/cold drinks. CHOOSE ONLY ONE OPTION ONLY)**

<table>
<thead>
<tr>
<th></th>
<th>CHOOSE 1 option ONLY</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>QFU1</strong></td>
<td>I drink sparkling soft drinks <strong>Everyday</strong></td>
</tr>
<tr>
<td><strong>QFU2</strong></td>
<td>I drink sparkling soft drinks <strong>5 to 6 times per week</strong></td>
</tr>
<tr>
<td><strong>QFU3</strong></td>
<td>I drink sparkling soft drinks <strong>3 to 4 times per week</strong></td>
</tr>
<tr>
<td><strong>QFU4</strong></td>
<td>I drink sparkling soft drinks <strong>1 to 2 times per week</strong></td>
</tr>
<tr>
<td><strong>QFU5</strong></td>
<td>I drink sparkling soft drinks less <strong>than once a week</strong></td>
</tr>
</tbody>
</table>
8. Please write/complete the following based on your last fizzy cold drink experience:

a. Think of the last time you drank a fizzy cold drink, where you sharing it or having it on your own? Please specify below

b. Is there any reason that makes you not to drink or buy more fizzy cold drinks. Please specify reason below

Thank you.
APPENDIX 4: MEASUREMENT SCALES AND ITEMS

1. **Brand Association (Río, Vazquez & Iglesias, 2001).**
   - This brand is totally in line with my lifestyle
   - This brand of soft drink is in popular
   - My friends drink this brand of soft drink
   - This brand is a brand leader
   - Using this product is a social status symbol.
   - This brand of soft drink is used by famous people with whom I identify.
   - I would advise other people to buy this brand of soft drink

2. **Peer Influence (Jamal & Sharifuddin, 2015).**
   - This brand helps me to feel accepted by my friends
   - This brand gives me social approval
   - This brand improves the way I am perceived
   - This brand makes a good impression on other people
   - Using this brand gives me a sense of belonging to others

3. **Perceived Value (Sweeney & Soutar, 2001).**
   - This brand is reasonably priced
   - This brand offers value for money
   - This brand is a good choice for the price paid
   - This brand is economical
   - This brand is worth what it costs

4. **Flavour Variety (Own compilation). Literature Reviewed (Miller & Kahn, 2005; Aztec Retail data, 2014).**
   - The soft drink/cold drink name Apple flavour makes me want to drink more
   - The soft drink/cold drink name Peach flavour makes me want to drink more
   - The soft drink/cold drink name Monster green flavour makes me want to drink more
   - The soft drink/cold drink name Mango tango flavour makes me want to drink more
   - The soft drink/cold drink name Millennium orange flavour makes me want to drink more
   - The soft drink/cold drink name Midnight sky flavour makes me want to drink more
   - The soft drink/cold drink name Mixed Berries flavour makes me want to drink more
   - The soft drink/cold drink name Rainslicker flavour makes me want to drink more
   - The soft drink/cold drink name Pinewhizz flavour makes me want to drink more

5. **Consumption frequency intention/Continued usage intention) (Hong, Thong, Moon & Tam, 2008).**
   - I intend to continue using soft drinks/cold drinks in the future
   - I will always try to use soft drinks/cold drinks in my daily life
   - I will keep using soft drinks/cold drinks as regularly as I do now

6. **Quantity frequency of using (Grimm, Harnack & Story, 2004).**
   - I drink sparkling soft drinks Everyday
   - I drink sparkling soft drinks 5 to 6 times per week
   - I drink sparkling soft drinks 3 to 4 times per week
   - I drink sparkling soft drinks 1 to 2 times per week
   - I drink sparkling soft drinks less than once a week