THE ROLE OF COMMUNICATION IN ADDRESSING SOCIOCULTURAL FACTORS THAT INFLUENCE PREGNANT WOMEN TO DRINK ALCOHOL IN DURBAN, KWAZULU-NATAL

UDOH JAMES AKPAN

218088216

Supervisor: Prof Lauren Dyll

Co-supervisor: Prof Eliza Govender

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College of Humanities

University of KwaZulu-Natal, Durban

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DECLARATION

I, **Udoh James Akpan**, student number **218088216**, hereby declare that this doctoral thesis, entitled, "*The role of communication in addressing sociocultural factors that influence pregnant women to drink alcohol in Durban, KwaZulu-Natal"* except where otherwise indicated, is my original research.

This thesis has not been submitted for any degree or examination at any other university and it does not contain other persons' data, pictures, graphs, or other information unless specifically acknowledged as being sourced from other persons.

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I also declare that this thesis does not contain text, graphics or tables copied and pasted from the Internet, unless specifically acknowledged, and the source detailed in the thesis and the reference section.

SIGNATURE	DATE
Udoh James Akpan	13 May 2021
[redacted]	
SIGNATURE	DATE
Professor Lauren Dyll	24 May 2021
SIGNATURE	DATE
Professor Eliza Govender	24 May 2021

DEDICATION

Thus far, the LORD has helped me. Indeed, God is my Rock and Fortress, the Foundation on which I stand; He is the Fountain of Knowledge and Has graciously endowed me with great understanding, I dedicate this work to Him, and I am guided by Psalm 18:2 and Philippians 4:13.

I am eternally grateful to my wife, Elizabeth, and children Anita and Daniel who supported and encouraged me throughout this journey. Indeed, they endured my absence. Also, I salute my late parents, Mr and Mrs A.J. Ekanem, who laboured to see me through school, but sadly are not alive today to see the fruit of their labour. To my late younger brother, Imeh Akpan, your memories will forever be with me.

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ABSTRACT

The World Health Organisation report (WHO, 2016) states that one in 10 women consumes alcohol during pregnancy globally, and 20% of these women binge drink. Drinking while pregnant harms the foetus with the possible consequence being Fetal Alcoholic Spectrum Disorder (FASD). South Africa has the highest reported FASD prevalence rates in the world. The South African Department of Health (DoH) recognises this as a severe public health issue affecting pregnant women. Studies show that the factors that motivate maternal drinking are more socio-cultural than medical and psychological. There have been global efforts to address this public health issue with pregnant women but the phenomenon still persists.

This study addresses the issue by exploring the localised responses of pregnant women who drink while pregnant in Durban, KwaZulu-Natal, through a qualitative investigation of the sociocultural factors that encourage alcohol consumption amongst this population. The study employed Participatory Health Communication as the theoretical framework and mobilised the Social Behavioural Change Communication (SBCC) as the process to identify and analyse the socio-cultural issues in Durban. This theoretical framework and process was supported by the Culture-Centred Approach (Dutta, 2008) to engage with the influence of culture and structure to understand the socio-cultural factors that contribute to their health choices and possible avenues for agency to address this. Communication plays a central role in this agency. The study adopted the Applied Thematic Analysis (Guest, McQueen and Namey, 2012) to interpret the data gathered from interviews with the participants at King Edward VIII Hospital.

The study found that social and environmental factors are family, friends and access to shebeens and taverns in the neighbourhood which support a drinking culture that encourages social tolerance of alcohol consumption and the reluctance to stop drinking. The study identified the need for ongoing communication through preferred communication channels that are readily available for women to request support. The study found the importance to extend beyond knowledge acquisition, but to mobilise communication as a culturally

nuanced tool to facilitate psycho-social support during times of alcohol consumption when pregnant.

TABLE OF CONTENTS

LIST OF FIGURES

LIST OF TABLES

LIST OF APPENDICES

ABBREVIATIONS

AIDS - Acquired Immunodeficiency Syndrome

ATA - Applied Thematic Analysis

BCC - Behavioural Change Communication

CCA – Culture-Centred Approach

CCMS - Centre for Communication, Media and Society

CFSC - Communication for Social Change

FASD - Fetal Alcohol Spectrum Disorder

HIV - Human Immunodeficiency Virus

JHU – John Hopkins University

KEH - King Edward VIII Hospital

KZN - KwaZulu-Natal

SAMRC - South Africa Medical Research Council

NGO - Non-Governmental Organisation

SACENDU - South Africa Epidemiology Network on Drug Use

SBCC - Social Behavioural Change Communication

UKZN - University of KwaZulu-Natal

UNICEF - United Nations International Children Emergency Fund

UNESCO - United Nations, Scientific and Cultural Organisation

WHO - World Health Organisation

PROLOGUE

I thought it necessary to keep a journal to record all my observations and schedules in the field during the research process so that I can reflect and put my experiences into perspective during the journey of the research and data collection process (Snape and Spencer 2003; Malterud 2001). The journal was also convenient for noting and keeping track of tentative findings emerging from the data, other links made prior for deeper analysis of information, and new and unheralded lines of inquiry to be followed in subsequent research events that emerged was reliable (Simmons 2009; Malterud 2001).

After obtaining two post-graduate degrees in Public Administration with a focus on Human Resources Management; and Communication Studies with a focus on Public Relations and Advertising, I participated in a World Health Organisation (WHO) sponsored campaign to reduce maternal and infant mortality through the Behavioural Change Communication (BCC) initiative in three densely populated municipalities in Lagos, Nigeria. The project exposed me to the vulnerabilities of women, particularly when they have a low socioeconomic status. That experience made me consider the pursuit of further research in the form of a PhD.

I had always ruminated over the importance of women and their socioeconomic contributions to every society, and I had also taken a keen interest in the Sustainable Development Goals (SDGs), being a programme of action and promoted by the United Nations Organisations (UNO). I was interested in knowing how the programme will consolidate the issues of maternal health.

This is particularly important to me because I have been influenced by women all my life especially my mother whom I grew seeing that was a business person and thus, had a stronger economic power than my father who was a civil servant, and yet my mother still attended to me and my siblings, to my observation, more than my father.

Though the SDGs which was established in 2015 with 17 goals inter-linked to serve as a blueprint to achieve a better and more sustainable future for all, it did not specifically speak

about maternal drinking. It did seem to me that for all the goals to be achieved there was a need to review the well-being especially the mental health of women since they are key in the procreation and continuation of life. I then read a report by the South African Community Epidemiology Network on Drug Use (SACENDU) which is a preventive programme against drug and alcohol use by the South African Medical Research Council (SMRC). I was astonished by the contents of the reports, especially on the statistics of female alcohol use, which is the gateway to other drug use, and the effect of fetal alcohol syndrome disorder (FASD) on unborn children. This strengthened my interest further in researching into how the phenomenon can be addressed particularly using tools of communication.

CHAPTER ONE

INTRODUCTION TO THE STUDY

Taking of alcohol by pregnant women is a public health challenge in many countries where alcohol consumption is high and has been so declared by the World Health Organisation (WHO). South Africa currently has the highest global prevalence rate of children that are born with Fetal Alcohol Spectrum Disorder (FASD) which is a direct consequence of the use of alcohol by a pregnant woman. To this end, The Department of Health in South Africa has made it a public health issue and has advanced efforts to address the phenomenon alongside other development partners like the World Health Organisation (WHO) and other Non-Governmental Organisations (NGO).

This research seeks to understand and appreciate the influences of the sociocultural situation among pregnant women who use alcohol in Durban, KwaZulu-Natal, what Social Behavioural Change Communication (SBCC) approach can be used to addressing the phenomenon.

Background of the Study

Multiple factors are responsible for use of alcohol, and scholars and health practitioners have also advanced several theories to explain and address alcohol use and dependencies. However, a culturally sensitive understanding of the phenomenon is not always stressed. Meanwhile, Burlew, Copeland, Ahuama-Jonas and Calsyn (2013) argue that culturally sensitive understanding has a role in substance abuse management. In this regard, this study explores previous studies on culturally sensitive understanding about alcohol consumption, to identify previously identified socio-cultural factors that influence alcohol use, and to simultaneously gauge where communication efforts have been successful or unsuccessful.

Alcohol abuse can be defined as a diagnosis in which there is the recurring harmful use of alcohol despite its negative consequences (American Psychiatric Association, 2013). In a similar vein, Hore (1990) maintains that alcoholism is best regarded as a complex illness. The International Labour Organisation (ILO) sees alcohol abuse as a repeated or episodic self-administration of alcohol to the

extent of experiencing harm from its effects, or the social or economic consequences of its use (ILO, 1994).

As earlier stated, there are many theories which attempt to explain alcohol dependence and related problems; and many of the theories focus on biomedical and psychological factors. One of the biomedical approaches is Elvin Morton Jellinek's (1960) disease theory which originated and gained acceptance in 1935 when alcoholics came together to form Alcoholic Anonymous (AA) at Akron, Ohio, USA. The disease theory conceives of alcohol dependence as an illness or disease of the brain, characterised by altered brain structure and function. Based on the clinical observation that heavy drinkers manifest an inter-related clustering of signs and symptoms, Edwards and Gross maintain that alcohol dependence is a disease or state of illness. A third theory within the biomedical approach is the genetic theory (National Institute of Alcohol Abuse and Alcoholism, NIAAA, 2008). The theory argues that certain individuals are either born with a weakness to alcohol dependence or, due to a possible lack of some metabolic factors, and are inevitably alcohol dependent. Similarly, the Internal Centre for Alcohol Policy (ICAP, 2009) also submits that a genetic predisposition to alcohol abuse shapes familial drinking patterns (Choi *et al*., 2005; Wall, 2005; Ramchandani, 2013), and alcohol dependence (Agrawal *et al*., 2008; Le Strat *et al*., 2008).

The psychological approach examined theories like the moral theory, classical theory and behavioural theory. The moral theory has been in existence since the 18th century when an Act for repressing the odious and loathsome sin of drunkenness was passed in Britain, and it still influences some contemporary studies on alcohol (Evans, 1832[1]; Allen, 2013). The moral theory claims that people who do not value self-control, self-restraint and respectability are people with weak moral standing and therefore would be susceptible and influenced by alcohol use.

The six fundamentals that can foretell health behaviour according to the classical theory as propounded by Glatt (1991) are risk susceptibility, risk severity, benefits to action, barriers to action, self-efficacy, and cues to action (Becker, 1974; Rosenstock, 1974; Champion and Skinner, 2008). The behavioural theory (Albertyn and McCann, 1993), founded on behaviourism, stresses that drinking is a learned behaviour. Hence, alcohol addiction can be remedied through resolving behavioural

[1] https://www.alcoholproblemsandsolutions.org/alcohol-in-the-17th-century/ - Accessed July 13, 2020

problems, and empowerment. According to Gruslin*et al*. (1998), the use of alcohol during pregnancy represents a major socio-cultural, psychological and medical problem, having consequences on the mother and fetus. They add that the consequences last forever. Therefore, care must be taken by responsible stakeholders to appraise the factors that influence this behaviour among pregnant women. In this light, sociocultural factors relevant to Durban, KwaZulu-Natal become central in the approach to addressing the influences that lead to alcohol use by pregnant women.

Sociocultural factors that influence drinking

In their work titled *Social and Cultural Contexts of Alcohol Use*, Sudhinaraset, Wigglesworth and Takeuchi (2016) reviewed cultural and social influences on alcohol use and places individual alcohol use within the contexts and environments where people live and interact. They also argued that alcohol consumption varies across gender which includes pregnant women, race and ethnicity, and at the macro level, factors like advertising and marketing, immigration and discrimination, neighbourhoods, families, and peers influence alcohol use. Specifically, the article describes how social and cultural contexts influence alcohol use and misuse.

These factors are situated at the individual, microsystem, community and macro/policy level (Sudhinaraset *et al.,* 2016), and their position agrees with the submission of Song (2013) that the real nature of man is the totality of social relations, relying on the study of Marx (1963) on human theory, he argued further that all individuals dwell in a network of social relationships, and that their health conditions can be contingent on structural attributes of their network contexts. Therefore, the importance of the socio-cultural influence of the behaviour (Albertyn and McCann, 1993; Airhihenbuwa, 1995; Dutta, 2008) cannot be overemphasised especially as a motivating factor for pregnant women to drink alcohol

Alcohol consumption during Pregnancy

Alcohol use among pregnant women has received some scholarly attention in recent times. For example, Desmond *et al.* (2012) on alcohol use as a health risk for HIV positive for maternal drinkers in KwaZulu-Natal (KZN), reported that 17% of their respondents (207/1201) drank in the month they

became aware of their pregnancy. Likewise, Peltzer and Ramlagan (2009) also showed that the rate of drinking was more than the countrywide approximation of 13% of maternal drinkers who use alcohol in the previous month. Commenting on Peltzer's and Ramlagan's report, Adebiyi, Mukumbang and Beytell (2019) posit that such behaviour leads to a pregnant woman having a child with Fetal Alcohol Spectrum Disorders (FASD).

In a review on the prevalence rates of FASD in South Africa (Olivier, Curf and Viljoen, 2016), it is argued that the country has the highest reported rates of FASD globally. Since FASD is a preventable condition, Olivier *et al*. (2016) avow that multidisciplinary and intersectoral involvements are needed to produce awareness about the hazards of antenatal alcohol exposure and the debilitating outcome of FASD on the lives of children, families, and communities in all the provinces of South Africa. Such awareness programmes should not be limited to high-risk areas in the Northern Cape and Western Cape but to other provinces including KwaZulu-Natal.

The consequence of alcohol experience during pregnancy is weakened growth, stillbirth, and a fetal alcohol spectrum disorder. These situations are compounded by the fact that fetal alcohol challenges are lifelong issues without treatment or established analytical or healing tools to prevent and/or remedy some of these unpleasant outcomes (Dejong, Olyaei and Jamie, 2019). Thus, the Centre for Disease Control and Prevention (CDC, 2020)[2] argues maternal drinking, or trying to get pregnant is not safe no matter how little. The CDC (2020) submits that all types of alcohol are equally harmful, including all wines and beer, and that FASDs are preventable if a woman does not drink alcohol during pregnancy. Further, it is established by the CDC (2020) and Foundation for Alcohol Related Research (FARR[3]) that maternal drinking is the cause of FASD, and alcohol acts as a poison to the growing fetus 20 minutes after the mother drinks the alcohol. The brains and nervous system are most endangered by alcohol intake, however, affects all tissues and organs of the fetus

[2] https://www.cdc.gov/ncbddd/fasd/alcohol-use.html - Accessed November 18, 2020
[3] https://farrsa.org.za/library/#toggle-id-2 – Accessed November 16, 2020

In addition, the baby may suffer a range of physical, neurological, behavioural and intellectual malformation that may be apparent later. Added to intellectual defects, and a person with FASD may experience the following:

1. Growth slowness (before and after birth)
2. Organ harm like the brain, eyes, ears and heart
3. Unusual looks on the face
4. Brain damage that can lead to learning discabiltiy, attention and hyperactivity symtoms
5. Poor academic performance and mental

Communication strategies to reducing drinking during pregnancy

This research recognises the previous awareness approaches and efforts made in addressing the problem of drinking by pregnant women. However, it aligns more with the SBCC approach which is close to Airhihenbuwa (1995) and Dutta (2008) health communication approach, which argues that the sociocultural component of an individual or group must be considered before planning a health communication message. Dutta (2008), for instance, submits that culture is at the centre of any health communication approach since it is the voices of the group that will form the basis of any intervention. In this light, the current study focuses on pregnant women who drink alcohol in Durban, KwaZulu-Natal.

Previous studies have recommended and applied various communication strategies including the use of warning labels, educational campaigns and mass media (Masisand May 1991; Hankin, Sloan, and Sokol, 2000; Burgoyne, 2005; Barry *et al*., 2009; Bazzo*et al*.,2014) reinforcing ban on advertising of alcohol products in South Africa (Parry *et al*., 2012).

Also, there has been another global effort by EUFASD Alliance (Bazzo*et al.*, 2014) to coordinate the campaign against maternal drinking. The outcome was expected to empower a network of global stakeholders' and non-governmental organisations so as to be better equipped in the awareness campaign against alcohol use during pregnancy. A major shortcoming of such campaign is that it did not take pregnant women in Durban, KwaZulu-Natal into planning.

In their work to highlight public awareness-raising campaigns targeting alcohol use during pregnancy, France et al. (2014) state that there is little evidence on what specific elements contribute to campaign message effectiveness. Their work evaluated three different advertising concepts that address alcohol and pregnancy; and they are a threat appeal, a positive appeal promoting a self-efficacy message, and a concept that combined the two appeals. The primary aim was to determine the effectiveness of these concepts in increasing women's intentions to abstain from alcohol during pregnancy. They concluded that though education and awareness was one component of a comprehaensive strategy, they however argued that persuasiveness and effectiveness of messages aimed at preventing prenatal alcohol exposure and stated that this is one of the few studies in which such messages have been evaluated. This study agrees with the conclusion on messages especially at prenatal stage, and thus seek to develop an appriopriate message that will resonate with the pregnant women in Durban who drink alcohol.

All the strategies mentioned above have shown to be effective in increasing public knowledge about the consequences of pregnant women who drink alcohol (Casiro, Stanwick, Pelech and Taylor, 1994; Burgoyne, Willet and Armstrong, 2006; Bazzo*et al*., 2012). It has, however, not been established that increased awareness of the risks alone leads to behaviour change, which in this case is a reduction in alcohol use during pregnancy (Olsen, Frische, Poulsen andKirchheiner, 1989; Abel, 1998; Deshpande *et al*., 2005; Elliott, Coleman, Suebwongpat and Norris, 2008; Thurmeier, Deshpande, Lavack, Agrey and Cismaru, 2011). Hence, there is a need for an effective health communication approach that goes beyond just awareness, to understanding the socio-cultural issues dominant with the group. (Sudhinaraset *et al*., 2016; Albertyn and McCann, 1993; Airhihenbuwa, 1995; Dutta, 2008). The message of such awareness must also be persuasive, promote a positive change in behaviour and attitudes, and encourage pregnant women who drink alcohol to accept the new idea (Cross *et al*., 2017). This approach, which the current study pursues, involves noting the messages that most appeals to pregnant women based on their socio-cultural context.

Problem Statement

The World Health Organisation (WHO, 2017) report states that a standard of one in 10 women consumes alcohol during pregnancy globally, and 20% of these women binge drink, which means they drink a lot of alcoholic drinks at an event, and this type of drinking has a great impact on the fetus with the consequence being FASD (WHO, 2017). Meanwhile, the WHO had earlier reported that the frequency of FASD in the world was estimated to be 1.5%, and South Africa has the highest reported FASD prevalence rates in the world, with rates as high as 28% in some communities, with an estimated overall rate at 6% (WHO, 2008, 2011; Western Cape Government Bulletin, 2020[4]).

In the work of Sudhinaraset *et al.,* (2016), they argued that the sociocultural factors that motivate drinking cuts across gender which includes the pregnant woman, race/ethnic group, socio-economic status, because it is predicated more on how societal factors, cultural norms, neighbourhood, and social contexts are associated with alcohol misuse. They, however, observed that there are some gaps in the literature and that it was problematic to distinguish between and among societal and community-level influences. They recommended that risk and protective factors, prosocial peer affiliations, and synergistic relationships between social contexts are worth further research to understand alcohol research more actively within a sociocultural context.

Most of the studies conducted on the causal factors why pregnant women drink alcohol are not only biomedical and psychological; they are also quantitative studies (Institute on Alcohol Studies, 1997; ICAP, 2009; Ojo *et al*., 2010; Kendler *et al*., 2016; South African Demographic and Health Survey, 2016). However, there are not enough qualitative investigations that can articulate and contextualise the underlying motivations, beliefs, and attitudes that influence these sociocultural factors (Olusanya, *et al*. 2015; Airhihenbuwa, 1995; Dutta, 2008), which will play a prominent role in any communication advocacy and campaign strategy to address the phenomenon, especially in Durban, therefore this study is designed as a qualitative investigation into why women drink alcohol while they are pregnant in Durban.

Furthermore, various studies and scholars (Masisand May 1991; Hankin, Sloan, and Sokol, 2000; Burgoyne, 2005; Barry *et al*, 2009; Parry *et al*., 2012; Bazzo*et al.,* 2014; France et al., 2014) have made recommendations on how to use communication tools to mitigate against the phenomenon like use of warning labels, educational campaigns, public awareness-raising campaigns targeting alcohol use during pregnancy, ban of alcohol advert on the mass media especially television. It is not in doubt that these recommendations have increased the knowledge of the consequences of pregnant women who drink alcohol, it is, however, not clear if these efforts have had effects on the behaviour change of these pregnant women as statistics continue to show an increase, and there is little evidence on what specific elements contribute to campaign message effectiveness.

This study, therefore, intends to understand and appreciate the sociocultural factors that influence women to drink alcohol in Durban, review the past communication approaches to note if the sociocultural context of the maternal drinkers in Durban is a missing component in the communication effort, and also incorporate a more nuanced understanding of the sociocultural context using SBCC as an approach to appreciating the phenomenon in Durban, KwaZulu-Natal. This approach will require understanding the socio-cultural and demographic components (Airhihenbuwa, 1995, Dutta, 2008) of the pregnant women who drink alcohol in Durban before planning such communication message, to understand and appreciate the appropriate message that will resonate with them, and the media that will be appreciated by them.

To this end, the study will employ the SBCC approach to positively influence knowledge, attitudes and social norms among individuals, institutions and communities like the pregnant women who drink alcohol in Durban.

Location of the Study

A national survey seeking to measure the extent of alcohol use and problem drinking among South Africans from the ages of 15 years and older (Peltzer, Davids and Njuho, 2011), revealed that women involved in risky or harmful drinking in big cities like Durban were associated with an urban dwelling.

[4]https://www.westerncape.gov.za/general-publication/foetal-alcohol-syndrome-awareness-programme - Accessed November 10, 2020

This report is corroborated by Desmond *et al.* (2011) in their study which sought to ascertain the prevalence and correlation of alcohol consumption among HIV-positive pregnant women in KwaZulu-Natal. The authors reported that out of the 1,201 women examined,18% reported drinking during pregnancy, and 67% of drinkers usually binged when drinking (had 3+ drinks in one sitting). They added that women living in urban and peri-urban locations were more likely to drink, based on some indicators such as higher economic status and greater social engagement. The authors as well submitted that while married women were less likely to drink, women who had a greater history of sexual risk-taking were more likely to drink.

Consequently, Desmond *et al.* argued that health care workers in KwaZulu-Natal should know that maternal drinkers are likely to do so at a level that is dangerous for their babies and that some factors related to drinking indicate sociocultural and environmental influences that need to be forstalled by greater propagation of information about the dangers of drinking, and greater support for self-restraint or self-control.

In the light of the foregoing, therefore, this study was undertaken in the antenatal clinic of King Edward VIII Hospital, a tertiary level hospital providing tertiary services to KwaZulu-Natal and part of Eastern Cape. The Hospital, situated in ward 33 in Durban, is a teaching hospital for the University of KwaZulu-Natal Nelson R. Mandela School of Medicine and has a Nursing College. The hospital has 852 beds with +/- 22 000 outpatients monthly. King Edward VIII Hospital is located at Sydney Road, Umbilo, Durban in KwaZulu-Natal.

Durban, also known as eThekwini, is a city in South Africa with the third highest population after Johannesburg and Cape Town, and the largest city in the South African province of KwaZulu-Natal[5]. It is located on South Africa's east coast which makes it a preferred destination for tourism especially with the warm tropical weather and the beaches that attracts visitors. The coastal positioning of Durban also gives it the busiest port in the country. It is also part of the eThekwini metropolitan municipality with other contiguous towns. The inhabitants are estimated at 3.44 million people

[5]http://www.durban.gov.za/Documents/Invest_Durban/Economic%20Development/3.pdf - Accessed November 18, 2020

(StasSA, 2018) which makes it one of the biggest cities on the Indian Ocean coast in Africa. Durban is also a manufacturing hub second only to South Africa.

Figure 1.1: Map of South Africa sourced from Researchgate

Figure 1.2: Map of Durban (eThekwini) in KwaZulu-Natal province Sourced from Google map

Figure 1.3: King Edward VIII Hospital sourced from kznhealth.gov.za

Significance of the study

One of the consequencies of drinking during pregnancy is Fetal Alcohol Spectrum Disorder (FASD), and its prevention and management in South Africa deserves urgent attention (Adebiyi, Mukubang and Baytell, 2019). Such attention should include developing and/or adopting specific policy to guide programmes that could enhance and coordinate the efforts towards preventing and managing FASD which includes awareness campaign, considering the consensus obtained from the experts. This study approaches the phenomenon from appraising the sociocultural factors that influence pregnant women to drink alcohol in Durban, KwaZulu-Natal. Thus, the study is part of the local and global efforts toward reducing alcohol use among pregnant women because of the impact it has on the children and families.

The problems associated with alcohol consumption according to CDC Bulletin (2020[6]) are significant enough to warrant urgent attention. Moreover, parents, especially mothers, of children who suffer from the harmful effects of alcohol use will require spending more time to attend to and care for the child. Consequently, this can keep her away from productive and economic activities which also harm the economy of a family and country (Popova, Bekmuradov, Lange and Rehm, 2011).

This study adopts a qualitative approach to speak with the pregnant women who drink alcohol in Durban, contextualise the sociocultural factors that affect them in their community to appreciate and understand their experiences (Airhihenbuwa, 1995; Dutta, 2008; Olusanya, *et al*. 2015). In essence, the study's outcomes will play a prominent role in any communication advocacy and campaign strategy to address the phenomenon. It is the understanding and appreciation of such socio-cultural factors focused on in this study that will make policymakers and health communication practitioners make informed decisions in planning any communication strategy. Moreover, the researcher interacted with the pregnant women who drank alcohol in Durban, KwaZulu-Natal to explore their experiences as to the sociocultural factors that influence them to drink alcohol (Dutta, 2008). This kind of engagement aims to ascertain the kind of messages that are appropriate for them in developing messages for communication strategies. In addition, it will help to select the media of communication that will reach and resonate with them (Mefalopulo, 2008; Wood, 2009; Dyll, 2009; Govender *et al*., 2010; Lie and Servais, 2015).

Research Objectives

The study seeks to:

1. Explore the sociocultural factors that influence alcohol use by pregnant women in Durban, KwaZulu-Natal.
2. Explore the appropriate messages to develop in communicating and addressing sociocultural factors that influence pregnant women who drink alcohol in Durban, KwaZulu-Natal.

[6]https://www.cdc.gov/ncbddd/fasd/facts.html - Accessed on November 18, 2020 - Problems associated with alcohol consumption has its effect on the heart, kidney, and bone of the sufferer; learning disabilities and low intelligence quotient (IQ); trouble with memory, coordination, and attention; hyperactivity and problem with suckling as an infant.

3. Explore the effective communication medium to use in addressing the sociocultural factors among pregnant women who use alcohol.
4. Establish a communication approach that will provide a more nuanced understanding on how to address the phenomenon of alcohol abuse in pregnancy in Durban, KwaZulu-Natal.

Research Questions

To pursue the objectives of the following research questions will be answered:

1. What sociocultural factors influence alcohol usage by pregnant women in Durban, KwaZulu-Natal?
2. What are the appropriate messages that can be developed and used in communicating and addressing sociocultural factors that influence alcohol usage by pregnant women in KwaZulu-Natal?
3. What is the acceptable media that can be mobilised in communicating and addressing these sociocultural factors?
4. What communicative approach can be utilised to provide a more nuanced understanding of how to address the phenomenon of alcohol use given the socio-cultural context of the pregnant woman?

Theoretical Framework and Methodology

The researcher started this chapter by reviewing the origin of development and its various theories, and that leads to an analysis of development communication. It discusses the components of development communication by looking at the Diffusion Innovation Model and Participatory Communication. To put the thesis into perception, this research mobilised two theories—Participatory Health Communication and Cultured-Centred Approach (CCA) — to put it into perspective. It used Social Behavioural Change Communication, a Participatory Health Communication framework because it explored the pregnant womens' opinions, and appreciated their sociocultural context in the development of the messages that will resonate with them, and also the channel that will be appropriate in communicating the messages to them. It also used Cultured-Centred Approach (CCA) propounded by Dutta (2008) to discuss the data from the in-depth interview

because it deals with sociocultural issues that affect pregnant women with regards to the structures, culture and their agency to determine and give suggestions that will relate to them.

The study adopted the approach social and behavioural change communication (SBCC) plays in exploring the pregnant womens' opinions in the development of a communication process that will enable them to make changes in their behaviours by interacting with them as regards their situation. It also introduced communication for social change (CFSC) as a strategy that can be mobilised to achieve behavioural and social change because the pregnant women opinions were explored in the planning of the whole process, and in the employment of technology that can cause the desired social change for their community.

Structure of the Thesis

The thesis is structured into eight chapters with each addressing a wide range of topical issues related to the study's focus.

Chapter One presents an introduction to the study, articulating the problem statement and explicitly stating the objectives of the study, the significance of the study, and the research questions of the study. The background presented in the chapter touches on the efforts made by the different organisations including the World Health Organisation (WHO), various Non-Governmental Organisations (NGOs) in the world including the South African government to manage the phenomenon through biomedical and psychological approaches. The chapter closes with a cursory journey of all the chapters of the study.

Chapter Two discusses the historical development of the factors that influence pregnant women to use alcohol and its consequences. It also discusses global and South African responses to the phenomenon and the policies. It reviews the South African and KwaZulu-Natal liquor laws and policies. It also discusses the theories that surround alcohol use, from a historical perspective and the efforts of each of these theories on addressing the phenomenon.

It also discusses the literature on biomedical and psychological efforts that have been employed to manage the phenomenon of maternal drinking. It talks about the sociocultural

factors that motivate pregnant women to drink alcohol and discusses the efforts of scholars, government, and programme managers in mobilising communication tools in addressing the phenomenon. It starts by exploring these efforts from the global perspective, then to African and South African efforts, and how communication has played a role in each of the strategies and makes a case that participatory communication model should be employed and that the opinions of the pregnant women who drink alcohol in Durban should be sought in developing the communication strategy.

Chapter Four discusses the theoretical framework that includes Participatory Health Communication and Cultured-Centred Approach (CCA) (Dutta, 2008) that are employed in discussing the data from the in-depth interview. It also discusses Social Behavioural Change Communication (SBCC) being the strategic use of communication to promote positive health outcomes, based on proven theories and behaviour change models that are appropriate to the local environment, and Communication for Social Change (CFSC) being the communication for sustainable social change and development that employs the use of different technique to address inefficient and ineffective systems, processes, or methods of production within a specific community or locations that has no major technological advances

Chapter Five presents the methodology adopted for the study. In the chapter, social constructivism, the paradigm for the study, is discussed. In addition, justification for the need for a qualitative approach is also discussed. Other details contained in the chapter are the sample population, sampling method, the recruitment of the respondent for the interview (including the inclusion and exclusion criteria), details of data collection, ethical considerations as well as the method of data analysis. The researcher worked with a female who is from Empageni, KwaZulu-Natal, and speaks isiZuu and English fluently for the purpose of interviewing the participants who cannot speak English, and also serve as a translator and transriber from isiZulu to English languge.

Chapter Six is devoted to the presentation of the data collected. It begins with presenting a biographical table of the respondents and shows the analysis of the participants'

demographics. It also presents the interview response extracts, the pre-defined codes and the codes which eventually generated the themes of the study.

Chapter Seven contains the analysis of the data presented in chapter six using the Participatory Health Communication and the Culture-Centred Approach (CCA) as the theoretical framework to explain the data. Applied Thematic Analysis (ATA) by Guest, MacQueen and Namey (2012) is the main analytical tool employed.

Chapter Eight discusses the findings and conclusions of the research and showed how the finding like the preferred medium of communication for the participant can be implemented. It also discusses their opinions on who the sender of the message should be, and how the message should be sent based on their opinions. It offers practical solutions and recommendations on how the process can be managed, and the message communicated to the participant, and also suggest a communication approach that can be used relying on the opinions of the participants. The chapter also discusses the limitation of the study being the fact that the research is based in Durban, an urban centre as well that all participants interviewed are black Africans which may not have presented an opportunity to review the sociocultural factors and preferences of other races. It however recommended further research to ascertain the preferences of participants that are in the rural areas, are outside the age criteria set and are also non-black Africans.

CHAPTER TWO

LITERATURE REVIEW

Introduction

This study interrogates the role of communication in addressing sociocultural influences of alcohol among pregnant women in Durban. The study probes into the primary reasons for maternal drinking in Durban. In line with the study's goal and the context of South Africa's racial and historical relations, this chapter reviews previous research on the reasons why some women drink alcohol during pregnancy. Other thematic issues addressed in the review include the history of alcohol use globally, and in South Africa; the factors that influence pregnant women into alcohol consumption; and the consequences of alcohol use among pregnant women, especially on the unborn child. The review aims to demonstrate that there is a need for a sociocultural approach to the phenomenon to facilitate an understanding of why pregnant women in Durban use alcohol. The chapter also highlights some of the sociocultural factors that have been identified as influencers that drive pregnant women to drink alcohol (Sudhinaraset et al., 2016).

The chapter also analyses the efforts of the international community especially the World Health Organisation (WHO) in trying to address the issues, especially after they made public health a major focus of their programmes. In addition, it discusses the South African government's efforts, through policies and regulations, towards regulating alcohol use and sales. The chapter also reviews the various theories that have been previously advanced to assess their efficacy in terms of changing behaviour. These theories inform both biomedical (Jellinek, 1960; Edwards and Gross, 1976; National Institute of Alcohol Abuse and Alcoholism, NIAAA, 2008) and psychological efforts (Hochbaum, Rosenstokand Kegels, 1952; Albertynand McCann, 1993; Rozin& Singh, 1999).

The chapter also discusses some of the approaches that had been used for the mobilisation of communication tools in addressing the phenomenon of alcohol consumption among pregnant

women, and ultimately bring about behavioural change. Some of the psychological and behaviour change theories influence communication campaigns such as the use of warning labels, educational and awareness campaigns and mass media campaigns.

Also, some campaigns are grounded on social change communication theories that include the wider environment in their theorisation of influencing factors, beyond that of the individual (Cardey, 2006; Dutta, 2008; Dyll, 2009; Kunda and Tomaselli, 2009, Lennie &Tacchi, 2013; Govender, 2013; Health Communication Capacity Collaborative (HC3), 2017). The purpose of examining these approaches is to identify the successes, challenges and gaps from past efforts towards reducing alcohol use, particularly amongst pregnant women.

A Brief Global and South African History of Alcohol Use

Alcohol, which is derived from the Arabic word 'al Kuhul (Murube, 2013) and alcoholic beverages, have been with man since ancient times. Alcohol is fermented, and it goes back 600 years to the early times in Egypt and Babylonia. The earliest alcoholic drinks were brewed beers and wines, and they contained had insignificant alcohol content. The Arabs introduced its processing into Europe in the medieval ages, and this upped the alcoholic content of the beverages. It was thought to be the cure for all sicknesses as shown by the Gaelic expression of 'whiskey' meaning the 'water of life' (Ritchie, 1985; Campbell & Langford, 1995). Alcohol is also used at many customs and rituals

The imperialists from America usually consumed beer and wine with meals. Then, people drank 95% alcohol in the form of beer (90%) or wine (5%) as they did not tolerate being drunk. Then, in 1725, the practice started to change when people started drinking distilled beverages, and that eventually became the major type of alcohol drank (Royce, 1981).

Apartheid and segregation have dominated the history of South Africa. Alcohol consumption was a political and economic instrument in South Africa in the 17th century when the Dutch settlers used food and alcohol as a form of employment benefit or wage in their farmlands (Falletisch, 2008). During the colonial times from 1652 to 1948, settlers introduced the *dop*

system also known as *tort*, a practice where a small quantity of wine was given to farmworkers at regular intervals during the working day (William, 2016). Farmworkers were partially paid with alcohol, mostly wine, for their labour. Though the *dop* system became illegal in 1961, it was nevertheless practised on some farms until recently (Ojo*et al*., 2010). In some farms, such wage payment was done about five times a day (Gossage *et al*., 2014), and this is argued to be responsible for the cultural practices and dependency on alcohol drinking to date. Such practices continue to have diverse implications on families and women. Some of these include addiction, alcohol-induced mental disorder, and Fetal Alcohol Syndrome Disorder (FASD) in children (Falletisch, 2008, Gossage *et al*., 2014).

Alcohol, in South African colonial history, was also a means of economic and social control. The legislation was promulgated to prohibit blacks from producing and obtaining alcohol. Black people were eventually allowed to patronise liquor stores owned by white people in 1962, but with strict conditions. (Department of Trade and Industry, 1997). The traditional beer had always been considered by the Zulus, who populate and are indigenous to KwaZulu-Natal, as a unifying and rewarding factor when community effort was mobilised for a collective task (Nyaumwe*et al*., 2007). The women were the brewers of the beer from grains like sorghum and maize. This kind of beverage took about four to 14 days to brew, and on the third day the brew was filtered, using a sieve, and it could be consumed the same day[7].

In the twentieth century, the Durban system was adopted nationally by the apartheid state[8]. The Durban system was a municipal monopoly over beer drinking, which required permits from the government. The revenues derived from municipal beer halls were used to administer Africans in the urban areas (Whelan, 2015). The authorities then established the Native Beer Act of 1908, and this enabled the municipality to ferment and sell beer to finance themselves. The action succeeded, and the municipality gained huge profits. The Act had however provided that anyone preparing alcohol illegally would be arrested, and that led to a face-off between the authorities and the black shebeens owners which eventually culminated in a riot to protest their loss of making a living. The authorities had built beer

[7] Available at: https://study.com/academy/lesson/zulu-ethnic-group.html Accessed on: June 18, 2019
[8] https://durbanhistorymuseums.org.za/the-durban-system/ Accessed on: June 18, 2019

halls in black townships to grow the community economy, but they still maintained control of the community people. This action that was somewhat confusing to the people met with resistance, and the community people went on to ferment their beer and opened shebeens which the authorities deemed illegal. As the year roll by, women who sold beer could support their husbands' meagre wages from the proceeds they got from the sale. People also adopted different ways of brewing beer by adopting quicker and easy ways, and in the process compromise quality. However, the industrially brewed beer has over-shadowed the home fermented ones since 2004 (Olivier, 2016)

The two factors of early Dutch farmers using alcohol as a form of wages to pay farmworkers (Rataemane&Rataemane, 2006; Olivier, Curfsand Viljoen, 2016), and the initial attempt to restrict alcohol from the black Africans which led to the proliferation of home-brewed beer especially sorghum beer sold in shebeens also referred to as taverns led to increased use of alcohol by the people (Olivier*et al.,* 2016). Today, binge and heavy drinking have become a regular feature in South Africa where people do not drink so much during the week but resort to heavy drinking over the weekends and at parties. This drinking culture is further increased by the existence of multiple shebeens where alcohol is easily accessible and affordable (Evans, 2015). These historical and current circumstances have led to a drinking culture (Evans, 2015) that has influenced individual and communal identities and lives (Gearing, McNeill and Lozier, 2005; Meurk, Broom, Adams, Hall and Lucke, 2014). As a result, alcohol has now become an important social activity which has consequently raised concerns across races and cultures in South Africa (Olivier *et al*, 2016).

This section has examined the historical development of alcohol globally and in South Africa, it also reviewed the factors that influence pregnant women to drink alcohol, and the consequences on them, in addition to reviewing the global and South African responses to the phenomenon and policies outlined in KwaZulu-Natal province. The next chapter expands into a discussion on the ways and efforts in which government and non-governmental organisations, public health care organisations and communicators have made to reduce the use of alcohol, particularly amongst pregnant women. In this regard, it reviews international

and South African biomedical efforts and communication campaigns, as well as the theories that inform them.

Biomedical and Psychological Theories and Approaches to Alcohol Reduction

There have been theories and efforts in the past to address excessive alcohol use, and by extension alcohol use by pregnant women. However, despite these efforts, the WHO (2018) reports that alcohol use is responsible for three million deaths annually and this is more than deaths caused by HIV-AIDS, road accidents and violent injuries which are sometimes also triggered by alcohol use. The International Labour Organisation (ILO, 1994) sees alcohol use as a repeated or episodic self-administration to the extent of experiencing harm from its effects, or the social or economic consequences of its use. Hore (1990), however, reasons that alcoholism is best regarded as more than a uni-dimensional illness involving more than a single factor. Similarly, the American Institute of Medicines Committee for the Study of Alcoholism and Alcohol Abuse (1991) submits that there is no likelihood that a single cause will be identified for all instances of alcohol problems. This study agrees that multiple factors are responsible for use of alcohol, and intends to probe into those factors by undertaking interviews with pregnant women who drink alcohol.

Many theories attempt to explain alcohol dependence and related problems, and the prominent theories focus on socio-cultural factors, psychological characteristics, behavioural indicators, physiological criteria, genetic and innate personality factors like risk-taking and sensation seeking tendencies (Epstein *et al.*, 2002). Some of the consequences of these factors; such as aggression, depression and anti-social behaviour, have all been correlated with alcohol dependence (Malone *et al*., 2004; National Institute of Alcohol Abuse and Alcoholism, 2005).

The American Institute of Medicines Committee for the Study of Alcoholism and Alcohol Abuse (1991) argues that some criteria can promote the beginning of alcohol problems, and they include the following:

1. The quantity of alcohol consumed
2. The frequency of consumption and the drinking pattern

3. The social, psychological and physical change
4. Dependency in its psychological and physical forms

Scholars and health practitioners have advanced several theories to explain and address alcohol use and dependencies. This chapter critically reviews previous biomedical and psychological studies done in the past to locate both best practices and principles, as well as shortcomings that may be relevant for consideration in this study's objective to develop a communication model that will be important for the context of Durban.

Biomedical Theories

The biomedical model of health focuses on biological and medical factors and typically excludes psychological, environmental, and social influences (Strickland and Patrick, 2015). It is considered as a way for the health care professional to diagnose and treat a condition, and some of its theories as it relates to alcohol use are discussed below.

The Disease Theory of Alcoholism

The Disease Theory of Alcoholism promoted by Elvin Morton Jellinek (1960) is based on the concept of an illness or disease of the brain, characterised by altered brain structure and function. It originated and gained acceptance when alcoholics came together to form Alcoholic Anonymous (AA) in 1935 in Akron, Ohio, USA. Following the work of Dr E. M Jellinek who was a foremost researcher on alcohol problems, alcohol has been accepted as a disease by the World Health Organisation (WHO) and the government of the United States of America (USA). Though Jellinek's work has been made easy in interpretation, he attempted to give an impartial and realistic description of a subject that had been treated subjectively but did not give a model or theory (Pattison *et al*., 1991).

However, in recent years, there has been criticism against the concept of alcoholism as a disease. CriticsofTheDisease Theory of Alcoholism has argued that the disease concept suggests that the affected person is the powerless victim of biographical predestination, and is incapable of right his or her behaviour. This leads to a needless wearing-away of personal

responsibility (DenenbergandDenenberg, 1991). Airhihenbuwa (1995) and Dutta (2005; 2008) have also reasoned that in managing diseases, the behaviour of the individual would need to be taken into consideration as culture plays a dominant role in influencing decisions.

The Alcohol Dependence Syndrome Theory

The alcohol dependence syndrome proposed by Edwards and Gross (1976) relates to the disease theory. It describes alcohol syndrome as a disease or state of illness. Edwards and Gross (1976), however, argue against over-simplifying a complex and varied problem. They maintain that everybody's drinking pattern as it exists has to be identified first, and only then can one try to identify the influences which shape this pattern.

The WHO distinguishes between a drinking problem and dependency, by aligning with Edwards' and Gross' (1976) definition of the alcohol dependency syndrome described. It then further classifies alcohol dependency in its International Classification of Diseases (WHO ICD-I0: 1987; WHO ICD-10: 2020). Also, it no longer uses the term alcoholic, preferring the term "alcohol dependent" or "person suffering from the alcohol dependency syndrome" instead.

The alcohol dependency syndrome is defined by seven criteria:

1. A consolidation of the dependent's catalogue noting the type of drink, timing and frequency of drinking. The dependents also incline to drink at a designated time of the week or weekends, whether or not there is a change in social restraint
2. Alcohol intake becomes a replacement for an individual who disconnects from other interest
3. Acceptance of alcohol increases and drinkers consume an extreme quantity of alcohol without presenting signs of drunkenness, and when the liver failure, the acceptance disappear
4. Recurring withdrawal symptoms occur, chasm, tremor, nausea, sweating and disturbances of mood
5. Withdrawal is avoided or relieved by continued drinking or topping up, not necessarily before going to work in the morning, but the whole day

6. The individual knows when he begins to drink, he will not be able to stop, and development is not consistent but it varies
7. Dependent drinking can be restored after periods of abstinence which suggests a long-lasting change in the body of the dependant (WHO, 1987)

Further, the WHO (2020) ICD-10 clinical descriptions and classification of mental and behavioural disorders diagnostic guidelines have also added the following two criteria to the existing list:

1. Persistence with alcohol abuse even though overt signs of harm have been identified; and
2. A strong desire or compulsion to drink and a craving for alcohol, particularly in familiar situations

The Genetic Theory

The Genetic Theory (National Institute of Alcohol Abuse and Alcoholism, NIAAA, 2008) argues that certain individuals are either born with a weakness to alcohol dependence or, due to a possible lack of some metabolic factors, are inevitably alcohol dependent. Family studies have consistently demonstrated that there is a substantial genetic contribution to alcohol dependence (Edenberg and Foroud 2013). However, the genetic theory does not address the socio-ecological factors which are driven by the culture within the community that has a strong influence on the individual (Airhihenbuwa, 1995; Dutta, 2008) which this study intends to establish by interviewing pregnant women who drink alcohol in Durban, KwaZulu-Natal.

Psychological Theories

There is a relationship between psychological and behavioural approaches (Hajmirsadeghi*et al*, 2014), and this section notes that relationship in its review of psychological theories and models. Behavioural models explain alcohol use in terms of learning theory. Through operant conditioning like social, cultural and environmental influences, the reinforcing elements of

alcohol use become habitual. These theories are reviewed below about the objective of this study.

The Moralisation Theory

Moralisation as postulated by Rozin and Singh (1999) is the conversion of a preference into a value, within a culture and in individual lives. The proponents argue that values, when moralised, are more likely to produce internalisation than instrumental concerns such as health risks. This thinking is influenced by the work of Immanuel Kant who, in 1788, argued that an individual is morally obligated to act by a certain set of principles and rules and that individual is influenced by divine commandments not to steal, lie, and cheat or the like. It is this premise of moral expectation from the public that dominated the thinking and theories in the 18th century and motivated the English parliament of King James I in his early reign. In attempting to solve social and moral problems (such as stealing, brawl and so on), which the English parliament concluded was influenced by the use of alcohol, they passed an Act of parliament in 1606 to repress the odious and loathsome sin of drunkenness (Evans, 1832)[9]. That thinking still exerts a powerful influence on contemporary attitudes and studies toward alcohol issues. Though alcohol abuse is labelled as an illness today, moralisation theory postulates that people who do not value self-control, self-restraint and respectability are people with weak moral standing and therefore would be susceptible and influenced by alcohol use (Rozin& Singh, 1999).

More recently, Frank and Nagel (2017) state that moralisation and the accompanying stigma persists despite the prevalence of the disease model of addiction, causing harm to addicted persons and society at large. However, studies have also shown that external constraints and culture play major roles in influencing an individual's decisions (Airhihenbuwa, 1995). Therefore, it becomes important to explore and evaluate the sociocultural influences that cause maternal drinking in Durban.

[9]https://www.alcoholproblemsandsolutions.org/alcohol-in-the-17th-century/ - July 13, 2020

Health Belief Model (HBM)

The Health Belief Model (HBM) developed in 1952 by Hochbaum, Rosenstock and Kegels, has been prominent with psychologists and health communicators in addressing health issues. The HBM attempts to predict health-related behaviour in terms of certain belief patterns. The model is mobilised to explain and predict preventive health behaviour, as well as sick-role and illness behaviour. The HBM has been used in various researches in all types of health behaviour. An individual's motivation to commence health behaviour can be divided into three categories of individual perceptions, modifying behaviours, and the likelihood of action.

Individual perceptions are factors that affect the perception of illness or disease. They deal with the importance of health to the individual, perceived vulnerability, and perceived severity. Factors that cause modifications include demographic variables, apparent threats, and cues to action. The combination of these factors leads to a reply that leads to action, provided it is accompanied by a reasonable different course of action (Hochbaum*et al.*, 1952).

The concept of the HBM is, however, cognitive, and predicts health behaviours by focusing on the attitudes, perceptions and beliefs of individuals. Its logic presupposes that pregnant women do not perceive the severity of alcohol on their health and pregnancy. Otherwise, they will take a rational course of action by modifying their behaviour such that they abstain from alcohol. However, the HBM does not take into cognisance the role and influence of pregnant women's cultural norms, values and practices, and social network which are like a web that the pregnant woman sees herself, and thus her decisions are influenced by those sociocultural factors (Airhihenbuwa, 1995; Dutta, 2008).

The Behavioural Theory

The behavioural theory (Albertynand McCann, 1993) proposed that drinking is a learned behaviour. According to the theory, if the problem of behaviour can be solved, and empowerment developed, then the individual can be remedied. The theory is founded on behaviourism which refers to a psychological approach that emphasises scientific and

objective methods of investigation. It concerns itself with observable stimulus-response behaviours and states that all behaviours are learned through interaction with the environment.

According to Beth Angell (2013), behavioural theory seeks to explain human behaviour by analysing the activities available in the individual's environment and the learned associations through social and cultural affiliations the individual has acquired through previous experiences. The associations include behavioural perspectives like classical conditioning, operant conditioning, and functional contextualism, and the clinical applications that are derived from them as they constantly evolve (Angell, 2013). Similarly, Thomas Berger (2009) posits that behavioural theory is cognitive, and relates to our attitudes, beliefs, and behaviours. Thus, it is the environment in which the pregnant woman lives that can influence her thoughts, and subsequently, her attitudes, beliefs and behaviour, and these processes will serve as a motivation for her to drink alcohol while pregnant.

In a study on using behavioural theory to prevent substance abuse in the workplace, Steenkamp (2011) argues that programmes that are solely focused on the increase of general knowledge may not achieve much success, but the effort should be focussed on ecological and cognitive behavioural approaches. He submits that advocacy and campaign planners could increase the validity of their preventive programmes if it is based on the evidence gathered in the environment of the respondents. In this regard, the data for the current study were gathered from pregnant women in Durban who drank alcohol. Such data formed the basis for developing a communication framework for pregnant women.

Social Capital Theory

Social capital is the network of relationships among people who live and work in a particular society, enabling that society to function effectively. Therefore, the social capital theory contends that social relationships are resources that can lead to the development and accumulation of human capital (Machalek and Martin, 2015). Social Capital Theory has implications for community-based health promotion according to Kreuter and Lezin (2002), and it is conceptualised as a strategy for improving public health. The term social capital may

appear self-explanatory and easily grasped, the meaning sometimes is interpreted with a positive sentiment, besides it is linked to other social processes; some scholars consider it a subset of the theory of social cohesion (Berkman & Glass, 2000), but in practice, it is a complex concept to narrow down with precision.

The principles of collaboration and participation are cornerstones for community health promotion strategies (Evans, Barer, & Marmor, 1994). The terms community and community based have particular appeal in public health, and it highlights public health's emphasis on populations, as opposed to the medical care system's focus on individual health. Also, a community focus acknowledges that individual health behaviours are strongly influenced by the infrastructure, policies, and social norms that can affect health actions positively or negatively. More specifically, even a casual examination of the health issues addressed by the community-based approach like pregnant women who drink alcohol will reveal the connections between health problems and their social, economic, and historical determinants like employment, housing, culture, and education. The fact that these complex determinants tend to cluster by neighbourhoods and communities is perhaps the strongest single justification for community-based public health strategies (Gerstein, Labelle, MacLeod *et al*., 1991; Green & Kreuter, 1999).

Kreuter and Lezin (2002) further argue that social capital is not one thing, they stated that it has relational, material, and political aspects and it may have positive or negative effects. It can refer to both dense and loose networks and it takes on a different form depending upon whether one is concerned with the individual and his or her immediate group membership or the interaction between social institutions. However, in virtually all conceptualizations of social capital, trust and reciprocity emerge as especially salient components or constructs. Coleman and Hoffer (1987) described the logic of social capital in terms of its potential to produce a stronger social fabric because it builds bonds based on trust. Trust nurtures solidarity between people, often as by-products of other activities (Fukuyama, 1999)
Reciprocity refers to the faith that an action or good deed will be returned in some form in the future. According to Taylor (1982), reciprocity is made up of a series of acts, each of

which is short-run altruistic, but which together typically make every participant better off. Reciprocity has special relevance when it comes to the interactions and exchanges that must occur when multiple organizations are called on to collaborate and cooperate around a common cause.

The conclusion of the study by Kreuter and Lezin (2002), was for health communicators not to reduce social capital into a mere scientific measurement since as it would be futile. They argued that each community or neighbourhood might have its unique feature, therefore they should be studied in its respective and unique feature including Durban pregnant women who drink alcohol. This approach will build trust among the participants and the health communicators and researchers, and that way reciprocity is assured. They further submitted that participatory research in public health makes an epidemiologist, an anthropologist, a health educator, and a health communicator view the same problem through different lenses, and each of these professionals is likely to detect a glimpse of reality that the others may miss. All who have a stake in uncovering insights about social capital need to explore seriously how their various views of reality can be combined to give us new knowledge in health communication. This study also intends to understand the nuances in the community of the Durban women who drink alcohol while pregnant, and that way, it will not just become another measurement, but their relations, their beliefs, the myths in their community concerning drinking, their fears and stigma and the general drinking culture would serve as the basis for developing an SBCC approach that will be used for advocacy that will resonate with them.

Factors that Motivate Alcohol Use during Pregnancy

Some of the factors that motivate pregnant women to drink alcohol according to studies show that women who have never been married, divorced or separated women drink alcohol, and experience more alcohol-related problems than married women or the ones that are now widowed. Thus, marriage lessens the effect of an inherited liability for drinking (Wilsnack*et al*., 1987; Heath *et al*.,1989). This assertion was reinforced with a study that concludes that

first marriage to a spouse with no lifetime alcohol use disorder is associated with a large reduction in risk for alcohol use disorder (Kendler *et al*., 2016).

A study conducted by the Centre on Addiction and Substance Abuse (CASA) in the early 1980s in America reports that women first caught up to men in cigarette smoking in the mid-1970s, and their rate of lung cancer soared. Also, it has been reported that women are catching up to men in the consumption of alcohol and the use of drugs (The Franklin County Prevention Institute, 1996). Women become tipsy after drinking lesser quantities of alcohol than are needed to produce drunkenness in men. One reason for this, according to the Franklin County Prevention Institute (1996), is that women have total lower body water content than men. After alcohol is drunk, it diffuses equally into all body water. Since women have a slighter quantity of body water, they reach higher concentrations of alcohol in their blood than men after drinking equivalent amounts of alcohol.

The fluctuations during the menstrual cycle may also affect the rate of intoxication, making a woman more disposed to a higher blood alcohol concentration at different points in the cycle. Also, painful menstruation, premenstrual discomfort and irregular and absent cycles have been associated with chronic and heavy drinking. These fluctuations can have adverse effects on fertility and may lead to early menopause (Sutker*et al*., 1987; Slutske, 1995, 2003). According to Hill (1982) and Wilsnack*et al.* (2009), alcohol use has a greater physical toll on women than on men. Female alcohol dependents have death rates of at least fifty per cent higher than those of men. A higher number of female alcohol dependents also die from suicides, alcohol-related accidents, circulatory disorders and cirrhosis of the liver.

According to WHO (2018), women are less often drinkers than men. This indicates women who are mild drinkers have fewer alcohol-related problems and dependence syndromes than men, yet amongst the heaviest drinkers, women equal or surpass men in the number of problems resulting from their drinking. Their drinking behaviour differs with age, life role and marital status. The WHO report (2015) reveals that South African women top the population of women in Africa who drink, while their male counterparts are the seventh. The report has it that South African women drink an average of 60ml of alcohol a week.

Table 2.1: Percentage of female consumption of alcohol in Africa Sourced from WHO (2015)

S/N	COUNTRY	ALCOHOL CONSUMPTION BY FEMALES IN AFRICA (%)
1	South Africa	41.2
2	Burkina Faso	36.8
3	Nigeria	32.9
4	Mozambique	32.8
5	Zimbabwe	20.3

The average alcohol intake of South Africa is near double the WHO African region average of 6 litres and is projected to go up to 12.1 in 2025. More than 25% of South Africans who drink alcohol are described as binge drinkers, and they drink 60 grams or more of unadulterated alcohol in one session within 30 days.

A WHO (2005) study on alcohol, gender and drinking problems reveals that an estimated 2% of women drinkers are drinking at very high levels of over 35 units per week. The report, thus, corroborates the Institute on Alcohol Studies (1997) and listed reasons that may incline some women to develop alcohol-related problems as:

1. Having a family background of heavy drinking
2. A history of sexual abuse
3. Low self-esteem
4. Traumatic life events
5. Association with eating disorders

In an article on women and alcohol (Brody, 1993), Dr Matthew Longnecker of the University of California in Los Angeles, USA points out that fewer than three per cent of American women have two or more drinks a day. Also, a British study on women and alcohol consumption indicates reveals that the heaviest drinkers among women appear to be those in

the 16-24 and 35-44 age groups. The study shows that there are 20% of women in the 16-24 age group drink over 14 units of alcohol per week compared with 11% in the late 1980s. Also, 19% of women aged 35-44 drink over the limits as compared to 10% in the late 1980s. Women who are in the 16-44 age range, who are divorced, widowed or separated, are more likely to drink over the recommended limits than their married or cohabiting counterparts (Institute on Alcohol Studies, 1997; Kendler *et al*., 2016).

Room (2013) explains that there are three kinds of drinking customs that are very widespread in the European culture, but which take on diverse typical forms in different cultures. These customs, as discussed below, are exemplary of the range of widely diffused aspects of drinking culture:

1. This drinking group has mutuality within it. This kind of drinking inherently allows members to show solidarity, mutuality, they drink together to show trust and signs of being in the same social class.
2. Drinking during communal celebrations. From the sociological standpoint, there are two types of communal celebration drinking. The first is the 'time out from normal activities or rules of behaviour. It is usually a carnival type of celebration where roles and power relationships blur, vanish or are even reversed (Da Matta, 1991). The second type is a fiesta-like celebration where fraternisation and affirmation of roles are expressed. It can last between a day or several days and are normally scheduled during seasons like harvest time, when a local market meets, a special occasion in a religious calendar, around a national anniversary date, marking of a significant life event for individuals like marriage, and so on.
3. The pub or on-premises drinking where it is possible to buy and consume alcoholic drinks in a glass, mug, bottle, or another open container without having a meal.

In the conclusion that Room (2013) reached, it is a personal behaviour to drink alcohol, but it is motivated at several levels like social context, culture and society. Also, parents, siblings or spouses who drink can serve as a motivation and these affect maternal drinking Ojo *et al*., 2010).

Sudhinaraset *et al* (2016) reviewed cultural and social influences on alcohol use and placed individual alcohol use within the contexts and environments where people live and interact. They argued that public health and treatment programmes need to be culturally sensitive to cultural factors such as ethnic identification and orientation because their findings showed how societal factors, cultural norms, neighbourhoods, and social contexts may be associated with alcohol misuse. They situated their findings on influences of alcohol drinking to be an individual-level factor that motivates alcohol use, and are nested within the home, work, and school environments, which are nested within the larger community.

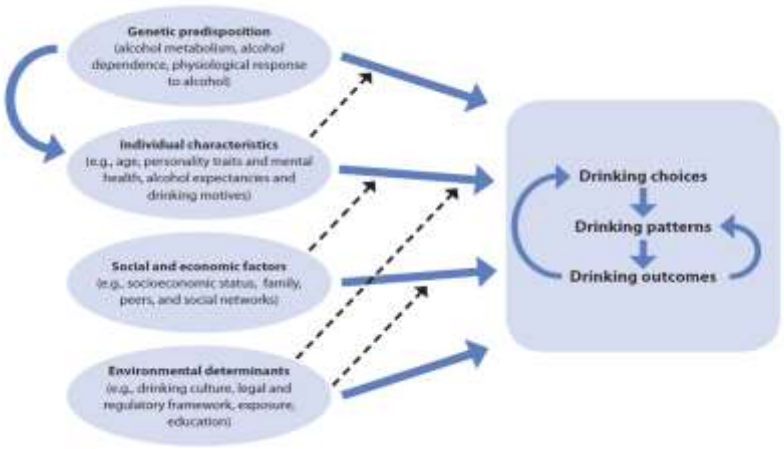
Sudhinaraset et al (2016) argued further that race and ethnicity, immigration status, Socio-Economic Status (SES) are social and cultural factors that predict increased alcohol use also. In this way, discrimination and its related stigma are established factors that cause stress on people, and in turn influence alcohol drinking among them (Dawson et al. 2005; Hatzenbuehler 2009; Paradies 2006). They said that people consume alcohol to cope with the stress of their daily lives, including work-related stressors and racial and ethnic discrimination (Conger 1956). This social stressor according to Sudhinaraset et al (2016) elicits a physiological response, including elevated blood pressure and release of stress hormones (Williams and Mohammed 2009), which may have lifelong deleterious effects, including increased alcohol use (Pascoe and Smart Richman 2009).

Also, cultural norms and beliefs are strong predictors of both current drinking and frequent heavy drinking (Russell et al. 2013; Caetano and Clark 1999; LaBrie et al. 2012; O'Grady et al. 2011; Paschall et al. 2012). However, according to the findings of Sudhinaraset et al (2016), focusing only on changing social norms is insufficient, but broader interventions that influence multiple levels of an individual's environment, such as family and schools, may have a greater impact. Though they acknowledged gaps in the literature and noted that their findings should be interpreted with caution because it is difficult to distinguish between societal and community-level influences.

The International Centre for Alcohol Policy (ICAP, 2009) enumerates the factors that motivate alcohol abuse as genetic disposition, individual characteristics, social and economic factors and environmental determinants. ICAP is an American based think-tank on issues

connected to alcohol consumption, composed of governments representatives/functionaries and industries)

Figure 2.1: Factors inducing alcohol consumption Sourced from International Centre for Alcohol Policies Manual (2009)



Genetic Predisposition

ICAP (2009) states that genetic predisposition helps shape both drinking patterns and the outcomes involved in alcohol metabolism (Choi *et al*., 2005; Wall, 2005; Ramchandani, 2013); and alcohol dependence (Agrawal *et al*., 2008; Le Strat *et al*., 2008) variation in sensitivity and physiological responses to drinking (Agarwal *et al*., 1997). In Hawkins' (1992) study of the heritability traits of adopted children, it is reported that slightly over 18% of children who had parents that drank alcohol tend to become alcohol dependent in comparison to 6% of children that had nondrinking parents. Genetics becomes significant with drinking patterns and personal traits and mental health issues (Elkins *et al*., 2004). With regards to genetics, two variables bear direct significance on motivation for alcohol consumption; they are personal traits and mental health status.

Personality Traits

Personality traits like risk-taking and sensation-seeking tendencies are linked to the development of drinking patterns, and influence drinking behaviour (Epstein *et al*., 2002). Alcohol dependence has been linked to aggression, depression (National Institute of Alcohol Abuse and Alcoholism, 2005), and antisocial behaviour (Malone *et al.*, 2004). The correlation between personality and drinking patterns is consistent across cultural groups and ages (McCrae *et al*., 2002).

Mental Health Status

According to ICAP (2009), a relationship exists between drinking challenges and alcohol dependence, and also the mental health status of the individual and some psychiatric disorders (Pirkola*et al*., 2009; Slade *et al*., 2009). Some projections have it that comorbidity could be 50% for the co-occurrence of alcohol abuse and mental health problems (Cleary *et al*., 2009). In his submission, Armstrong *et al* (2002) says that 60% of people with the use of substance issues will have psychiatric conditions like anxiety, depression and low self-esteem (NIAAA, 2005)

Individual Characteristics

This category refers to the characteristics of those who drink alcohol, which include their age, physical and mental health status, stress, beliefs, and expectancies about alcohol, and affect their development of drinking patterns.

The age of a person sharpens drinking behaviour, the expected result, and the extent of danger the person may be exposed to. Studies also present an argument that youths have a propensity to engage in experimentation and extreme drinking behaviours, and thereby drink heavily than other age groups. The associated risk is high for their health and other consequences like accidents and injuries due to their naivety with alcohol exacerbated by physiological sensitivity (Spear, 2002). In some individuals, early commencement of drinking, before age 13, is a pointer to a drinking pattern and alcohol dependency later in life (Zeigler *et al.*, 2005;

ICAP, 2009). Other complex relationships that can affect young age alcohol dependency as argued by Boyd *et al.*, (2005) are:

1. A later life drinking tendency can be predicted based on the early drinking pattern
2. Drinking challenges later in life may not be based on early drinking (Rutter, 2007).
3. The age an individual started drinking may not affect the frequency of drinking in adolescence (Takeida, 2001), meaning that the age an individual start to drink and drinking behaviour is complicated and facilitated by other influences.
4. Early drinking could be a predictor of youth in danger of heavy drinking and other range of related nonstandard actions (Lieberman, 2000).
5. Many young people are introduced to alcohol by their parents and family (Coleman *et al*., 2003). Therefore, the impact of the age when drinking starts is tempered by the environment that that is a motivator. More so, people who started drinking outside the family circle are more like to have alcoholic challenges than those who started with the family (Warner *et al.*, 2003).

Contributing Factors to Alcohol Use during Pregnancy in South Africa

A conclusion was reached by Ojo *et al* (2010) that having family members and friends that drink alcohol can be a catalyst for a pregnant woman to drink also, this was based on a study in Western Cape Province on factors associated with maternal drinking. The influence of the family members and friends drinking behaviour serves as a model that is encouraged and accepted, therefore there should be an intervention to reduce the high prevalence rate of the tendencies for maternal drinking which is highly risky. The study presents only prevalence levels of statistics in the region, neglecting the communication framework that could be employed in addressing the sociocultural factors that were foregrounded. To fill the gap left in Ojo*et al*. (2010), the researcher in this study interacted with the pregnant women who drink alcohol to interrogate the factors that motivated alcohol use among them, from their point of view. This is needed to proffer a model that is based on their nuances to address the issues.

Furthermore, extant studies have focused on the general alcohol consumption by South Africans, and the effect of FASD in the wine belt (the Western Cape) of the country (Ojo*et*

al, 2010). Data shows that teenage and unwanted pregnancies are factors that influence pregnant women to drink alcohol. In addition, Matesebe, Tsetse and MacLeod (2019) have examined women's narrative on alcohol consumption during pregnancy in a low-resource setting in Eastern Cape. The study involved interviewing partners and family members. The report has it that factors motivating maternal drinking are lack of support from partners who are not only unsupportive during their pregnancy, but also not supporting the baby after birth, denial of paternity, cheating and unfaithfulness and stress. The authors further argue that the causes are complex since multiple factors serve as motivators. They add that lack of family and partner support during pregnancy, or even outright denial of ownership of the pregnancy can serve as a shock. These may not only lead to stress factors but also exacerbate the propensity for drinking during pregnancy. Moreover, Lau-Barraco and Linden (2014) argue that peer and social group pressure are factors that can influence alcohol consumption, even among pregnant women.

Other studies have also identified sociocultural risk factors like social tolerance to drinking and limited access to social resources (Desmond *et al*., *2012*); behavioural risk factors like initiation at an early age into drinking, smoking, drug use and having multiple sex partners; educational risk factors such as low attainment of education (May *et al.*, 2005, 2008); interpersonal risk factors such as cohabiting with a partner or spouse who drinks, being part of a social network where excessive alcohol is permitted, or being in a violent relationship; non-alcoholic factors like low socioeconomic status, low income or unsupportable pregnancy and residential risk factors like living in a rural community or communities with a proliferation of shebeens (Urban *et al.*, 2008). These are some of the motivating associations for black African pregnant women in rural communities to use traditional medicines with alcoholic content (Banda *et al*., 2007).

Despite the plethora of studies in the direction of alcohol consumption in South Africa, there has not been sufficient research on the phenomenon in KwaZulu-Natal Province about pregnant women who drink alcohol and their sociocultural situations using the SBCC approach. Therefore, qualitative research is necessary to deepen the sociocultural influences on pregnant women who drink alcohol in Durban.

Concerned with why alcohol consumption in South Africa remains high despite the government's effort in alcohol control measures, Vellios and Walbeek (2018) engaged in a survey that sought to provide recent estimates of self-reported current drinking and binge drinking using a large nationally representative household dataset and to identify some of the important covariates of alcohol consumption. It was concluded after the survey that people with religious affiliations reported lower alcohol use, and that also cigarette smoking was a factor that exacerbated consistently and binge drinking. The study concluded that there was a need for evidence-based policies to reduce the detriment of alcohol use. This study, therefore, seeks to find out the reasons why pregnant women in Durban drink alcohol when pregnant. It adopts a qualitative approach for local narrative evidence to be documented, for the recommendation of a communication approach that is socio-culturally responsive to the immediate environment.

It is pertinent to note, however, that early or adolescence drinking is not unusual (Peltzer, Davids and Njuho, 2011; Morojele and Ramsoomar, 2016). Peltzer, Davids and Njuho (2011) reveal in their study, which targeted 15 years and above, that drinking can start early in that stage of development. Also, Morojele and Ramsoomar (2016) posit that mere drinking without good nutrition poses a challenge to adolescent pregnant women because the teratogenic effect on prenatal exposure is increased (Keen *et al.,* 2010).

A survey using participants' socio-demographic and health status as indicators to measure the mould of alcohol use among South African male and female adults, it showed that there is a relationship between lower socioeconomic status and harmful use of alcohol (Peltzer and Pengpid, 2018). Correspondingly, another study by Obot (2006) shows the rise of alcohol consumption with improved economic circumstances. This can be extrapolated to mean that when the economic circumstances and income of an individual improves, alcohol consumption and the attendant problems are likely to increase also. Although industrially produced beverages are costlier, the pregnant women who are employed are likely to buy such, as evidence of their economic status (Allen *et al*., 2017; Peltzer*et al.,* 2011).

In a methodical appraisal of studies available on harmonising the common data from five national and five local surveys on alcohol consumption in South Africa over 12 years, Peltzer

and Ramlagan (2009) established that life span, existing and binge drinking has been similar over time for young people and adults. Binge drinking was between 7 – 11% and risky drinking was also steady over the years at 6%. Risky drinking among pregnant women was 2.5% at the national level but was high among people who live in urban centres with 4.1%, coloured people had 11.6%, and in the Northern Cape Province, it was 24.9%. Local surveys among youths, university students, clinic populations and mine employees appear to have higher levels of risky drinking than the national surveys, and the burden of drinking was discovered to be high. Further, in a national survey done by Peltzer, Davids and Njuho (2011) to measure the extent of alcohol use and problem drinking among the KwaZulu-Natal South Africans from the ages of 15 years and older, it is shown that risky or harmful drinking among Durban women was associated with urban-dwelling, which corroborates the South African Demographic and Health Survey (SADHS, 2016).

As stated above, SADHS (2016) report has it that one in four women in South Africa (25%) aged 15 and older reported having ever drunk alcohol. Five per cent of women report risky drinking; that is, they drank five or more standard measures of alcohol on a single occasion in 30 days. Three per cent of women assessed by the Cut-Annoyed-Guilty- Eye (CAGE) questionnaire[10]reported signs of a drinking problem. The report explains that risky drinking with the female population was 9% and common in the 20-24-year age group, 2% among the female age 15 -19, and 65 and older respectively. Risky drinking is also common in urban areas with 6% then it is in non-urban area with 3%. Marked variation in risky drinking is reported by province; risky drinking is highest in Northern Cape (11%), Western Cape (9%), and North West (9%) and lowest in KwaZulu-Natal (1%) and Limpopo (2%).

This study is undertaken in Durban, an urban centre, and targeted at pregnant women between the ages of 18 – 35 years to evaluate the sociocultural factors that influence them into engaging in risky drinking, despite being pregnant, and to understand how to communicate with the pregnant women who drink. Also, through an in-depth interview, the study develops a model based on participants' nuances.

[10]https://psychology-tools.com/test/cage-alcohol-questionnaire - Accessed on: August 14, 2019

Table 2.2: Alcohol consumption and risky drinking by women in South Africa Sourced from the South African Demographic and Health Survey (SADHS, 2016)

Background Characteristics	Ever Drank Alcohol	Drank alcohol in the last 12 months	Drank alcohol in the past 7 days	Drank five or more drinks on at least one occasion in the past 30 days	Show signs of problem drinking by CAGE test	Number of women
Age						
15 – 24	29.3	20.9	8.3	5.1	3.1	1,429
15 -19	23.4	16.3	5.3	1.6	2.4	721
20 – 24	35.2	25.6	11.3	8.6	3.9	708
25 – 34	29.2	22.6	11.3	6.1	3.3	1,391
35 – 44	25.1	17	9.5	6	3.1	1,022
45 – 54	22.1	15.5	10.5	4.4	2.2	866
55 – 64	22.3	16	11.2	3.7	2.7	701
65+	20.8	13.1	9.2	2	1.1	719
Population Group						
Black/African	22.2	15.7	7.7	4.5	2.6	5,170
White	58.2	48.9	36.1	4.2	1.6	320
Coloured	42.9	28.6	17.6	10.2	5.6	516
Indian/Asian	13.2	9	1.1	0	0	114
Others	*	*	*	*	*	6
Residence						
Urban	30.8	22.4	12.3	6	3.2	3,996
Non-Urban	16	11	5.5	2.6	2	2,130
Province						

Western Cape	38.1	27.3	18	9	4.8	703
Eastern cape	27.7	19.9	10.1	4.9	3.3	730
Northern Cape	40.3	27.4	13.6	10.9	6.8	121
Free State	29.3	22.2	12.1	6	4.6	325
Kwazulu Natal	***12.8***	***10.1***	***4.8***	***1.4***	***1***	***1,191***
North West	26.9	20.6	12.5	8.7	6.6	398
Gauteng	30.8	22	12	5.2	2	1,534
Mpumalanga	30.7	19.1	7.2	4.7	2.6	473
Limpopo	12.2	8.1	4	1.5	1	646
Education						
No Education	19.4	13.5	10.2	6.9	2.7	495
Primary Incomplete	16.4	10.3	5.4	2.3	2.6	664
Primary Complete	19.1	9.9	6	1.7	0.9	293
Secondary Incomplete	24.6	17.3	8.2	5.2	3.5	2,695
Secondary Complete	28.8	21.7	12.2	5.6	3.5	1,328
More Than Secondary	40.9	32.3	18.6	4.2	2.4	652
Wealth quintile						
Lowest	16.5	11.7	5.2	3.7	1.9	1,163
Second	20.3	14.3	6.9	3.7	3.6	1,152
Middle	24.7	17.6	8.8	5.5	3.5	1,242
Fourth	30.1	21.3	11.9	8	3.5	1,258
Highest	35.1	25.9	15.9	3.2	1.3	1,311
Total 15+	25.7	18.4	9.9	4.8	2.7	6,126

Total 15-49	27.6	20.1	9.8	5.4	3	4,300

Most previous studies have been more quantitative and have focused less on contextualising and articulating the underlying beliefs and motivations that influence these risk factors (Olufuntoand Barry, 2015), especially in Durban, KwaZulu-Natal. There is, therefore, a need for qualitative research to probe and contextualise the risk factors that are natural to pregnant women who drink alcohol, and to appreciate their preference in the type of communication framework and messaging that will resonate with them in a health campaign against the phenomenon.

Consequences of Alcohol Use during Pregnancy

The World Health Organisation (WHO, 2018) report states that alcohol is responsible for three million deaths annually. Thus, the health problems associated with alcohol consumption has reached an alarming level, and it contributes to a wide range of diseases (more prominently, liver diseases), other health conditions (like road traffic injuries and mental disorders) and high-risk behaviours such as unsafe sexual behaviour which leads to HIV-AIDS. Also, alcohol consumption among pregnant women has been associated with FASD in children (World Health Assembly Report, 2002). The harm that can be done to the foetus does not only depend on the total amount of alcohol used by the pregnant woman, but also on the form of drinking. Khalil *et al.* (2010) argue that there is yet no consensus on a safe lower limit for pregnant women, but that heavy alcohol intake can badly affect the foetus. However, they identify that binge drinking is more dangerous to the foetus than if an expectant mother drinks the same amount of alcohol over a period (Khalil *et al.*, 2010).

The Royal College of Obstetricians and Gynaecologist guidelines manual (RCOG, 2006) states that as with other teratogens, the foetus is highly vulnerable, especially in the first trimester. It is, therefore, recommended for pregnant women in the UK that while there is no evidence of harm from low levels of alcohol consumption, the safest approach may be to completely avoid any alcohol intake during pregnancy, particularly within the first 12 weeks. This recommendation corroborates the submission of Khalil *et al.* (2010) that binge drinking

has a serious effect on the foetus, particularly in early pregnancy, more than moderate to high levels of alcohol intake. Similarly, a study in the United States of America on alcohol consumption among first-time mothers on the risk of preterm birth investigated the association between alcohol consumption, before and during pregnancy. The result showed that most public health and medical practitioners advised total abstinence of alcohol both during pregnancy and when contemplating pregnancy (International Centre for Alcohol Policies, 2009; Dale *et al*., 2015). This advice is a call on the preventive principle since existing evidence is inconclusive as to whether there is a limit below which alcohol consumption is safe. This advice is also supported by different researchers that heavy and binge drinking is dangerous to the foetus (Jones *et al*., 1973; Ouellette *et al*., 1977; Petra *et al*., 2011; Blencowe *et al*., 2012; Crawford-Williams *et al*., 2015).

In a report by the World Health Organisation (2018), a complex relationship between alcohol use and risky sexual behaviour is advanced. In the report, it is noted that a higher quantity of alcohol intake rather than frequency influences the choice of sexual partner selection and unprotected sex. The fact that the use of alcohol is associated both with an increased risk of acquiring HIV infection and with negative effects on people living with HIV/AIDS in terms of treatment outcomes, morbidity and mortality is corroborated by several researchers (Miguez *et al*., 2003; Bryant, 2006; Neuman, Monteiro and Rehm, 2006; Baliunas *et al*., 2010; Rehm *et al*., 2010; Schuper *et al*., 2010; Neuman *et al*., 2012; de Oliveira *et al*., 2016; Reis *et al*., 2016; Gross *et al*., 2017).

The harmful use of alcohol hurts HIV infection and transmission in three main ways, namely:

1. The increase of HIV risk transmission rate through risky sexual behaviour like not being consistent in using condoms, and having multiple sex partners (Reis *et al*., 2016)
2. Negative impact on the management of HIV with alcohol and drug connections, toxicity and/or reduction in treatment in adhering to treatment and thereby increase the risk of resistance to antiretroviral medications (Rehm *et al*., 2010; de Oliveira *et al*., 2016; Gross *et al*., 2017).

3. It weakens immune responses and leads to biological vulnerability to infection through declining of various pathways of the immune system (Miguez*et al*., 2003; Schuper *et al*., 2010), and disease development (Neuman, Monteiro and Rehm, 2006; Neuman *et al*., 2012).

South Africa has a high amount of widespread HIV/AIDS epidemic, and also one of the highest levels of alcohol consumption in the world. The relationship of this twin problem has been categorised and appreciated in the context of sub-Sahara Africa (Desmond *et al*., 2012). People who consume more alcohol are exposed to high sexual risk behaviour and are susceptible to a higher risk of HIV infection (Morojele*et al*., 2006; Fisher *et al*., 2007; Kalichman*et al*., 2007; Parry *et al*., 2009; Baliunas *et al*., 2010; Shuper*et al*., 2010; Hahn *et al*., 2011).

In a study by Desmond *et al*. (2012) on alcohol consumption among HIV positive pregnant women in KwaZulu-Natal (KZN), it was postulated that their drinking alcohol put their children at risk of both HIV and FASD. Health care workers in KwaZulu-Natal were therefore counselled to be aware that pregnant women who drink are likely to do so at a level that is dangerous for their babies. These underscore the necessity to understand the role of communication in countering and addressing those sociocultural influences among pregnant women who use alcohol in Durban.

Depression Resulting from Alcohol Drinking by Pregnant Women

The result and themes that emanated from the research of Crawford-William *et al.* (2015) apply to South Africa. Ross *et al.* (2012) similarly conclude that alcohol, substance use and depression occur frequently in pregnant women and pose a significant public health problem. A study carried out by Haffejee*et al*. (2018) with pregnant women attending a public healthcare facility in KwaZulu-Natal Province states that only 36% of women reported that their pregnancy was intended. This, therefore, corroborates the earlier studis (Naimi*et al.*, 2003; Orr *et al*., 2008; Seggie, 2012) that link unwanted or unintended pregnancies with alcohol and illicit drug use as well as cigarette smoking.

Alcohol abuse and depression are regular features with pregnant women especially in the wine-producing regions, and it is a public health challenge. Pre-conceptual and substance use and antenatal depression are key factors that drive alcohol and substance abuse during pregnancy. Investigating for depression and preconception alcohol and substance use is important for discovering and treat women with antenatal depression and to spot women at risk of drinking alcohol during pregnancy (Vythilingum*et al*., 2012). Another consequence, as argued by Vythilingum*et al*. (2012) in their research on risk factors for substance use in pregnant women in South Africa, is that South African pregnant women have high levels of perceived stress and that this may modulate their risk of depression and substance use (Vythilingum*et al.*, 2012).

Global response, efforts and approaches to reduce alcohol use

In 1978, the WHO in conjunction with the United Nations International Children's Emergency Fund (UNICEF) in an international conference held in Alma Ata expressed the need for urgent action by governments, health and development workers, and the international community to protect and promote the health of the peoples in the world. The conference then made a declaration that health, defined as a state of complete physical, mental and social wellbeing, and not merely the absence of disease or infirmity, is a fundamental human right. The declaration adds that the attainment of the highest possible level of health is the most important worldwide social goal whose realisation requires the action of many other social and economic sectors in addition to the health sector.

The declaration also includes mental wellbeing as an essential component of health, and thus provides the rationale for the existence of mental health care at the primary level as an important area of study. Also, it is accepted in the declaration that health is influenced by factors beyond the control of the health workers and the central specialist facilities, as it is influenced by factors like social, economic and political considerations. Hence, a need for an all-inclusive, community-based approach to health care, which will include social, economic, educational and political perspectives, is therefore advocated (Pillay and Subedar, 1992).

WHO (2018) reports that mental, behavioural or neurodevelopmental disorders according to the 11th revision of the International Classification of Diseases (ICD-11) are assigned to mental health conditions caused by alcohol. They come differently in their harshness and duration, from short–term acute alcohol inebriation to life-long threatening conditions such as dementia due to the use of alcohol.

A general health care worker can manage many mental disorders, but the aspect of prevention of mental disorders, for example, prevention of alcohol abuse, require special consideration (WHO, 2019).

Table 2.3: 11th revision of the International Classification of Diseases (ICD-11) Sourced from World Health Organization Report (WHO, 2018)

ICD-11	Mental, behavioural or neurodevelopmental disorders caused by alcohol
6C40.0	Single episode of harmful use of alcohol
6C40.1	Harmful pattern of use of alcohol
6C40.2	Alcohol dependence
6C40.3	Alcohol intoxication
6C40.4	Alcohol withdrawal
6C40.5	Alcohol-induced delirium
6C40.6	Alcohol-induced psychotic disorder
6C40.7	Other alcohol-induced disorders
	6C40.70 Alcohol-induced mood disorder
	6C40.71 Alcohol-induced anxiety disorder
6D84.0	Dementia due to use of alcohol
6D72.10	Amnestic disorder due to use of alcohol
6C40.Y	Other specified disorders due to use of alcohol
6C40.Z	Disorders due to use of alcohol, unspecified

WHO (2018) addresses drinking behaviour as a phenomenon that should be discouraged, and therefore mandated the Global Burden of Disease (GBD)— its affiliate with a global mandate— to measure, quantify and assess the burden of diseases, injuries, and risk factors in the world (Prüss-Üstün*et al.*, 2003). In response, the study was conducted in 195 countries on the use of alcohol between 1990 and 2016. The study's report in 2018 submits that alcohol abuse is harmful, and it is responsible for the high mortality rate globally.

South African Response, Efforts and Approach to Reduce Alcohol Use

In addition to the responses from the global community, South Africa has also highlighted and articulated various efforts to reduce alcohol use in the country, including amongst pregnant women through policies at the national and provincial levels. These policies are discussed below.

South African Liquor Policy

In 2016, the South African Liquor Policy was reviewed, and the intention was to amend the Liquor Act, 59 of 2003 ("the Act"). At first, the liquor policy in South Africa was focused more on revenue to the government, rather than the wellbeing of the people. The 2003 Act was unhelpful, and it created a large informal liquor segment whereby many unlicensed liquor outlets operated, and this encouraged the growing of illegal liquor parlours in townships. This system led to countless raids, harassment, arrests, prosecutions and imprisonment of people that did not have genuine operating licences. The effect of this was a social breakdown, family violence, alcohol-related diseases, crime and accidents in poor communities (Liquor Act, 2016).

The new policy understudies the trends in the industry to grant new licences to new entrants and is also able to better assess the social and economic costs associated with alcohol abuse. Other considerations in the articulation of this policy are the slow pace of transformation, standardisation of key aspects of regulation and improved regulatory collaboration; eradicating the manufacturing and trading in illegal or illicit alcohol; as well as challenges with regards to regulatory capacity within the National Liquor Authority (NLA) which is designed to help in addressing the challenges of alcohol abuse. The NLA itself is restructured to have the appropriate capacity for liquor registration, enforcement, education and awareness.

The revisions in the policy include:

1. Legislate that all shebeens should have the same operating hours.

2. Norms and principles should be incorporated into national, provincial and municipal legislation.
3. The national minimum legal age for an individual to purchased alcohol should be heightened from 18 years to 21 years.
4. Section 9 (advertising restrictions) of the old Act should be reviewed so that the Minister of Trade and Industry can impose stricter limitations and boundaries for the advertising and marketing of liquor products.

i. Television houses should only advertise liquor brands at night
ii. Eliminate content attractive to young people in alcohol advertising e.g. using models like sports stars
iii. Branding of liquor premises and delivery trucks and/ or cars should be prohibited
iv. Counteract commercials that expose the detrimental effects of liquor abuses e.g. car crashes and victims, ailments caused by liquor, family violence and other social ills.

5. In line with the decided norms and values, retailers and traders should not serve liquor products to an already-drunken person
6. To regularise licensing demands, liquor premises should be situated at least five hundred meters (500m) away from schools, places for worship; leisure facilities, treatment centres, residential areas and public institutions.

<u>KwaZulu-Natal (KZN) Liquor Licensing Policy</u>

KwaZulu-Natal Province has articulated various policies to regulate liquor business in the province which are intended to control the sale of alcohol and protect the residents from abusing it, including pregnant women. The KwaZulu-Natal Liquor Authority is mandated to oversee the retail sale and micro-manufacture of liquor through the provisions of the KwaZulu-Natal Liquor Act, 2010 (Act No. 06 of 2010) as amended. The government had noticed the need to review certain shortcomings inherent in the previous Act, and thus commenced a wholesale interaction with the stakeholders. The process culminated in the approval by the KwaZulu-Natal Provincial Legislature of the National Liquor Policy

Document of 1997. Alcohol being different from other commodities is an injurious substance when it is abused, and the government thought it was imperative to review the 1989 Liquor Act that was bequeathed to it by the apartheid government.

The 1997 National Liquor Policy

The 1997 National Liquor Policy document was the precursor for the introduction of new liquor legislation in the country, in particular the Liquor Act of 2003. While the guideline of major brewing and distribution of liquor is a national duty, the regulation of small brewers and retail sale of liquor is now the responsibility of the respective provinces. The guidelines on the regulation of liquor are a concurrent responsibility between the national and provincial governments, in adhering to the constitution of the country. The KwaZulu-Natal Liquor Licensing Act, 2010 (Act No. 06 of 2010), became effective on the 28th of February, 2014.

The objectives of the Act are to:

1. Provide for the laws of the large brewers and retail sale of liquor
2. Reduce the socio-economic and another cost of alcohol abuse
3. Ensure public involvement in the consideration of applications for registration
4. Promote the development of an accountable, viable and feasible retail and small brewing liquor industry in a manner that facilitates:
   i. Entry of new players into the sector
   ii. A plurality of ownership in the industry
   iii. The ethics and practice of social responsibility in the industry

Statutory mandates of the liquor authority

The mandates of Liquor Authority are to:

1. Consider, grant or reject liquor licence applications in the province
2. Issue licences according to the terms of Chapter 6 of this Act
3. Improve access of liquor licences in the Province
4. Guarantee a fair, equitable and transparency in the issuance of liquor license

5. Work with members of the executive council, relevant departments, municipalities and the liquor industry in the province to apply and promote national and provincial liquor policies, norms and standards
6. Implement and support activities that tackle the objects of the Act as provided for in Section 2(b) and (d) of the KZN Liquor Licensing Act. No. 06 of 2010 as amended.

Communication Campaigns to Address Alcohol Use during Pregnancy

The biomedical and psychological theories seem not to have adequately addressed the sociocultural influences and the communication approach to alcohol use by pregnant women. Steenkamp (2011) argues that any campaign effort must focus on the environment of the respondent to develop a preventive approach. In addition, the theories have influenced several intervention campaigns, both biomedical and communication. The following section reviews these efforts too, once again, assess the possible best practice and challenges in previous efforts of alcohol use reduction. These insights will then be considered in the approach that this study develops for a communication strategy in addressing the sociocultural factors that influence pregnant women who drink alcohol in Durban.

In a maternity clinic in Adelaide, Australia, Crawford-Williams *et al.* (2015) engaged in a semi-structured face-to-face interview with health professionals (which included midwives, obstetricians, and shared care general practitioners) to ascertain if they were conveying ineffective and conflicting messages to pregnant women. The authors found that the health professionals had limited knowledge of the term FASD and the broad spectrum of difficulties associated with alcohol consumption during pregnancy. They concluded that communication between health professionals and pregnant women should be improved to ensure that accurate information about alcohol use in pregnancy should be provided. This underscores the point that education and constant training are needed by health professionals to achieve the maternal health objective of the country.

Regardless of the knowledge of FASD over the years, it has not led to the decrease of maternal drinkers, as the prevalence rate of the phenomenon has not dropped. However, in a study by Crawford-Williams *et al*. (2015), she argued that communication between health professionals and pregnant women is critical for the dissemination of the message that preaches abstinence during pregnancy, and that way, the consequences can be properly communicated. The study calls for an effective strategy to be adopted in making sure that standard education and training for all health professionals are available with accurate and current information.

Five major themes were identified about closing the knowledge gap of the health professionals; perception of harm; knowledge and information; society and culture; practice and procedures; and life impacts (Crawford-Williams, 2015)

1. Perception of harm included a range of codes, including outcomes of consuming alcohol during pregnancy, as well as the timing of exposure and quantity of alcohol consumed. Most health professionals had a good understanding of the physical and developmental problems associated with alcohol consumption and all of them noted FAS as the most serious consequence. Despite this, several participants could not explicitly describe the condition, and additionally, very few participants had heard of FASD.
2. Knowledge and information encompass the largest number of codes and data extracts, and included issues around evidence guidelines, support, information sources, and assumed knowledge. Participants were aware of the guidelines and believed that the current Australian guidelines recommend no alcohol as the safest option during pregnancy; however, many participants felt that there needed to be more evidence to support these guidelines.
3. Society and culture were a common observation from the health professionals that society and the media played an important role in the way alcohol use in pregnancy was perceived. Several health professionals stated that they believed Australia has a big culture of drinking, and they could understand that many women might feel social pressure to drink even when pregnant.

4. Practice and procedures were other themes that emerged from the research and means that existing practices and procedures played a key role in the way that pregnant women were provided with information about alcohol use in pregnancy. Codes included the structure of the healthcare system, time constraints, screening and compliance.

5. Life impacts was a commonly occurring issue that if women were drinking during pregnancy, there may be underlying mental health issues, drug use, and other co-morbidities that needed to be addressed.

Global communication campaigns

In 2010, the WHO noted the use of alcohol during pregnancy as a key concern. For instance, alcohol consumption during pregnancy is adjudged a major cause of birth defects and developmental disorders internationally (Warren, Hewitt and Thomas, 2011). Consequently, global campaigns have been developed to address the issue. Awareness campaigns are considered effective tools for increasing knowledge of the risks in a manner that embraces the whole public and avoids creating stigma on pregnant women. Despite this knowledge, there is a dearth of organisational expertise and resources to develop, carry out, and evaluate such campaigns that can be adapted in countries and cultures around the world. To achieve this, there must be the empowerment of individuals and local groups that coordinate these efforts to enable pregnant women to make choices.

The use of warning labels, educational campaigns and mass media are examples of a global approach to the campaign and interventions. Barry *et al*. (2009) argue that such an approach has increased awareness of the consequences of drinking during pregnancy. However, it is not clear if this has any impact on reducing the number of pregnant women who drink. For instance, in a study conducted by Hankin, Sloan, and Sokol (2000) among African American women, the impact of the campaign was lost as the women went back to their pre-intervention and campaign drinking level over a period.

Another global awareness campaign was launched and coordinated in Italy by European Fetal Alcohol Spectrum Disorders Alliance (EUFASD Alliance)[11] to harmonise the campaign against maternal drinking. The objective of the awareness campaign was to point to the dangers of drinking during pregnancy among childbearing aged women and to the general population, thereby disseminate correct, research-based information on the risks of using alcohol when pregnant, and also to court the participation of the institutions and private organisations on the FASD issue through social marketing of health promotion methods. The outcome was expected to empower a network of non-governmental organisations (NGOs) who are stakeholders in the advocacy group to be better equipped in the awareness campaign against alcohol use during pregnancy (Bazzo *et al*., 2014). The campaign had a good strategy and was designed to work with 50 partners globally to adapt it into other countries, but it did not include pregnant women in Durban, KwaZulu-Natal. Thus, it may not reflect the ecological dimensions and sociocultural influences that are natural to the pregnant in Durban, which this study addresses.

Raising awareness of the harmful effects of prenatal exposure to alcohol among women of child-bearing age and their communities is a necessary step toward the prevention of FASD (Masis & May 1991; Burgoyne, 2005). As part of a broad and comprehensive strategy to prevent alcohol-related harm, awareness strategies can reinforce the health message among the target audience, increase knowledge, and support behaviour change (Burgoyne, 2005). Burgoyne further argues that campaigns are to be targeted to a specific audience:

> Awareness campaigns are goal-oriented attempts to positively influence a specific audience, through an organised set of activities that take place at a specific time. They may focus on the use of the media, personal contacts, events, or a combination of these three strategies (Burgoyne, 2005, p. 8).

Through awareness campaigns have shown to be effective in increasing the knowledge about the consequences of pregnant women who drink alcohol (Casiro, Stanwick, Pelech and Taylor, 1994; Burgoyne, Willet and Armstrong, 2006; Bazzo *et al*., 2012), it is however not established that increased awareness of the risks alone leads to behaviour change which in

[11] https://www.eufasd.org/campaign.php - Accessed on the 14th August 2020

this case is a reduction in alcohol use during pregnancy (Olsen, Frische, Poulsen andKirchheiner, 1989; Abel, 1998; Deshpande *et al*., 2005; Elliott, Coleman, Suebwongpat and Norris, 2008; Thurmeier, Deshpande, Lavack, Agrey & Cismaru, 2011). Besides, these awareness campaigns are often fragmented, and best practices and materials like books, flyers and folders which would have helped in increasing knowledge are not often shared (Riley *et al*., 2003). For campaigns to be effective there is a need to gather contextual data about the campaign beneficiaries, before developing a preventive message and media (Steenkamp, 2011).

Moreover, an effective health communication campaign must go beyond mere awareness, to understanding the socio-cultural issues dominant with the group. The message must be developed from the participation of respondents and reflect their experiences to promote a positive change in behaviour and attitudes, and to encourage the pregnant women who drink alcohol to accept the new idea (Uwa, 2013; Cross *et al*., 2017). An example of including socio-cultural considerations in a campaign is demonstrated through a non-profit organisation, IAMovement that coordinated a programme to effect positive social and environmental change to promote a diversified and inclusive Trinidad and Tobago in 2018. It mobilised approximately 1,400 people to participate in 40 community climate talks programmes held in schools, public and private organisations, communities and public spaces throughout the country. Through the *Small Change* documentary and the *Climate Talk*events, IAMovement built public awareness on climate change issues, and thus concluded after the programme that the lesson they have learned was that short films which are audio-visually appealing and have strong cultural and local content were useful for advocacy (CSOs4GoodGov project, 2018[12]). Also, Crawford-Williams *et al* (2015) support the need to understand the effective and efficient communication framework that will serve as a tool for this campaign and strategy. It is pertinent to note that pregnant women who drink

[12]https://canari.org/csos4goodgov/ - Accessed on November 18, 2020 - *The 'CSOs For Good Governance' action is a three-year project, April 2017 – March 2020 (3 years), with the overall goal to empower civil society to become effective advocates and to actively engage in an inclusive and holistic approach to national development in Trinidad and Tobago.*

alcohol will not only tell their stories based on their sociocultural influences but also give an indication of the appropriateness and medium of the communication to be used.

In engaging a socio-cultural approach, the researcher will involve investigating what most appeals to pregnant women based on their responses to the interview questions. In this study, therefore, the formation of a social behavioural change communication approach, which the study seeks to develop based on the nuances of the pregnant women who live in Durban, will serve the purpose of the campaign towards reducing the sociocultural influences that motivates them to use alcohol.

In another study on the use of mass media on health campaigns about alcohol (Young *et al*., 2018), it has been demonstrated that banning or placing strict regulations on tobacco could engender successful anti-smoking mass media campaigns. Seeking to evaluate and select a mass media intervention programme focused on changing alcohol consumption or related behavioural outcomes, Young *et al*. included 13 mass media campaign designs from different countries. The study's outcome indicated that although there was little evidence of a reduction in alcohol consumption associated with exposure to various campaigns, some increase in information seeking actions and treatments by the participants was observed. In addition, there was some evidence of positive changes in intentions, motivation, beliefs and attitudes towards alcohol reduction. Consequently, social norms could be harnessed for an anti-smoking campaign.

Furthermore, Young *et al*. (2018) submit that the mass media should support campaigns that might include price-based measures (Babor *et al*., 2010), advertising restrictions (Siegfried *et al*., 2014), limiting availability and access to alcohol (Anderson *et al*., 2009) with the targeting of high-risk groups like the pregnant women (Foxcroft *et al*., 2015).

Young *et al* (2018) argued that most campaigns used television or radio in combination with other media channels and were conducted in developed countries with weak quality. They concluded that mass media health campaigns about alcohol are often recalled by individuals and have achieved changes in knowledge, attitudes and beliefs about alcohol but there is little evidence of reductions in alcohol consumption. Moreso, alcohol is still being advertised,

glorified and normalised. The campaigns' lack of local socio-cultural knowledge, might be one of the reasons for the little evidence of a reduction in alcohol consumption. Campaigns, immersed in local languages and cultures, might have challenges if there are no total restrictions on consumption, pro alcohol social norms across South Africa, and the permissive marketing environment.

It is thus deducible from the foregoing that campaigns for groups like pregnant women need to be focused on the group, use the appropriate medium to communicate with them and be supported by structures to sustain and achieve behavioural changes (Dutta, 2008).

Another study was conducted in Los Angeles (USA) low-income communities using a community-based narrowcasting approach to reduce Fetal Alcohol Syndrome (Glik*et al*., 2008). In an interview with eight pregnant women using the focus group approach, participants expressed confusion over the mixed messages on maternal drinking they were fed by the healthcare providers, families, friends, organisations that are involved in the advocacy against maternal drinking, and alcohol advertising. The campaign was over not drinking while pregnant, and not drinking a glass of wine after dinner, and that did not quite resonate with them. To this, participants wanted an unambiguous and specific message. There was a consensus among the participants that the employment of graphics and eye-catching colours and phrases are important though there was a little agreement about the campaign approach as some participants desired to shock people with real-life pictures showing babies with FASD, others believed that this might be less effective, and stressed that women have control over their babies' health. The focus group discussion was a study on American women from different racial backgrounds submitted that there was a need to narrowcast and focus on specific needs of the pregnant women in their respective communities if the campaign for the prevention of maternal drinking will succeed.

The findings from these studies have therefore influenced the rationale for this study to ascertain what pregnant women believe is appropriate for them in Durban to develop a communication approach that will establish the kind of message and the medium that will best appeal to them.

In a study by Babor (2010) titled Alcohol and Public Policy Group, he stated that restrictions on alcohol availability focus upon regulating the places, times and contexts in which consumers can obtain alcohol, and include both partial and total bans on alcohol sales. There is great variability in the regulation of access to alcohol. Several countries have monopolies for at least some form of retail sale, and many Islamic states and some localities elsewhere practice total prohibition. In contrast, there is a concern in many developing countries that cheap, informal-produced and illegal alcohol is largely unregulated. He suggested that Alcohol licensed premises provide an opportunity for preventing alcohol-related problems through training bar staff in both responsible beverage service and managing or preventing aggression, but maintained that the suggestion must be enforced (Chinnock, 2006).

Babor (2010) also argued that in many countries, alcohol advertising holds major revenue prospects, and thus a huge economy for the players that have sophisticated marketing activities that create an unprecedented exposure through traditional media (e.g. television, radio and print), new media (e.g. internet and cell phones), sponsorships and direct promotions, including branded merchandise and point-of-sale displays. These activities create a massive exposure to young people early and reinforce their decision to drink, and these young people include women and pregnant women. He, however, called for legislation and government policy to restrict alcohol advertising and promotion. Babor admits that there have been government efforts in this regard, but noted that many bans have been partial, applying only to spirits, to certain hours of television broadcasting or state-owned media. They have covered only the measured media, which represents only about half the marketing currently in force. These bans often operate alongside codes of industry self-regulation that specify the content of permitted forms of alcohol advertising.

Sudhinaraset et al (2016) agrees with the suggestions of Babor (2010) in terms of protecting young people from alcohol advertising, and went further to argue that alcohol research should also address the new social contexts among youth culture which is the influence of online social networking sites and new media on alcohol use on adolescent populations, he said that this should be explored more fully in future studies.

Babor (2010) also stated that education and persuasion strategies are among the most popular approaches to the prevention of alcohol-related problems, he said that some school-based alcohol education programmes have been found to increase knowledge and change attitudes toward alcohol, but drinking behaviour often remains unaffected.

In another study done in Australia by France et al (2014), to test public awareness-raising campaigns by targeting alcohol use during pregnancy which is an important part of preventing prenatal alcohol exposure and Fetal Alcohol Spectrum Disorder. The research evaluated three different advertising concepts addressing alcohol and pregnancy being - a threat appeal, a positive appeal promoting a self-efficacy message, and a concept that combined the two appeals. The primary aim was to determine the effectiveness of these concepts in increasing women's intentions to abstain from alcohol during pregnancy. A computer-based questionnaire was administered to the participants.

This research evaluated three different advertising concepts addressing alcohol and pregnancy: a threat appeal, a positive appeal promoting a self-efficacy message, and a concept that combined the two appeals. The primary aim was to determine the effectiveness of these concepts in increasing women's intentions to abstain from alcohol during pregnancy. The concepts containing a threat appeal were significantly more effective at increasing women's intentions to abstain from alcohol during pregnancy than the self-efficacy message and the control. The study provided insights into the components that enhance the persuasiveness and effectiveness of messages aimed at preventing prenatal alcohol exposure. The recommended concept has good potential for a campaign aimed at promoting women's intentions to abstain from alcohol during pregnancy. Education and awareness-raising campaigns represent a component of a comprehensive strategy to prevent alcohol-exposed pregnancies and FASD.

However, these messages were not tested with specific sub-groups of women who may respond differently or require different and more comprehensive strategies to support their

abstinence from alcohol during pregnancy. The sample of participants was skewed towards an educated, middle socioeconomic-class sample of women, and the concepts were designed to target those who drink alcohol but generally not to excess.

In their submission which is an intervention review titled Restricting or banning alcohol advertising to reduce alcohol consumption in adults and adolescents, Siegfried et al (2014) stated that there is a lack of robust evidence for or against recommending the implementation of alcohol advertising restrictions. They said that advertising restrictions should be implemented within a high-quality, well-monitored research programme to ensure the evaluation over time of all relevant outcomes to build the evidence base.

Also, Symons, Carter, Oscar, Pearson, Bruce, Newett and Fitzpatrick (2020) researched pregnant women in Western Australian communities with high rates of prenatal alcohol to evaluate the community-led Marulu foetal alcohol spectrum disorder (FASD) Prevention Strategy initiated in 2010. The proportion of women reporting alcohol use during pregnancy to midwives was compared between 2008, 2010 and 2015. Initial midwife appointments were calculated by weeks of gestation. The proportions of women reporting alcohol use by age at birth were compared. They found out that alcohol use reduced significantly from 2010 (61.0%) to 2015 (31.9%) with first-trimester use reducing significantly from 2008 (45.1%) to 2015 (21.6%). Across all years, 40.8% reported alcohol use during pregnancy and 14.8% reported use in both first and third trimesters.

They noted that many features were helpful in the reduction rates including policy settings to reduce population-level alcohol use, community education and workforce development, and capacity building for communities and government agencies which aimed at a prevention campaign. They concluded that the reduction in reported prenatal alcohol exposure in the Aboriginal community in the Western Australian setting during the period of prevention activities provides initial evidence for a community-led strategy that might apply to similar communities. Similarly, this study intended to involve the pregnant women in Durban who

drink alcohol, to focus on their sociocultural nuances and develop a communication approach that will address their situation.

Adopting the Social Behavioural Change Communication as an approach

According to the Centre for Social and Behavioural Change Communication (SBC3) based in Mumbai, India states that Social Behavioural Change Communication (SBCC) is a process of interactively communicating with individuals, institutions, communities and societies as part of an overall programme of information dissemination, motivation, problem-solving and planning. It uses a variety of communication channels to drive and sustain positive behaviour among individuals, communities and societies.

SBCC employs a systematic process that includes formative research and behaviour analysis; communication planning, implementation and monitoring; creating an environment that supports desired outcomes; and evaluation. It also uses communication strategies that are based on behavioural science to positively influence knowledge, attitudes and social norms among individuals, institutions and communities.

As part of their Social Behavioural Change Communication approach, SBC3[13] initiated a programme that they called Phenk Mat Mumbai (PMM), an initiative of the Confederation of Indian Industry (CII) and Club Mahindra to make Mumbai litter-free. The project was supported by the Municipal Corporation of Greater Mumbai and the Government of Maharashtra. PMM seeks to make Mumbai litter-free by involving children and youth. It aims to influence littering behaviour among children studying in Mumbai's schools and colleges, encourage them to develop the habit of cleanliness and make them lifelong ambassadors for anti-littering behaviour. In phase 1, PMM 200 schools and colleges of A and F wards were rolled out in August 2017. In Phase 2, schools across Mumbai, starting February 2018were reached out to.

[13] https://www.centreforsbcc.org/phenk-mat-mumbai/ - Accessed October 6, 2021

PMM was designed using the techniques of Social and Behaviour Change Communication as an interactive and evidence-based process and thus conducted focus group discussions with children in schools to understand current perceptions and attitudes towards littering and created a programme that will appeal to students logically and emotionally. The two-month programme gave children ample opportunities to practice new learning, influence the behaviour of others and create impact. Besides the workshops, SBC3 also designed posters that promote anti-littering behaviour. The posters promote the theme of "taking pride in doing the right thing", a theme that was emphasised in the workshops too. The posters, in English, Marathi and Hindi, were displayed in each classroom.

An anthem was created for the children to sing as part of every workshop. The anthem reiterates the theme of taking pride in the right behaviour and sends the message that it is time to change old habits. On 15 October 2018, school children and principals from across schools in Mumbai gathered to celebrate the successful implementation of the Phenk Mat Mumbai, the anti-litter programme initiated by Club Mahindra to make the city litter-free.
Packard (2014) of FHI360[14], a non-profit human development organization in partnership with the Food and Nutrition Technical Assistance (FANTA) Project tends to agree with the strategy adopted by SBC3. She says that SBCC is the systematic application of interactive, theory-based, and research-driven communication processes and strategies for change at the individual, community, and social levels. She said that SBCC uses multiple channels of communication for change at three levels, and the Behaviour Change Communication, Social Mobilization and Advocacy. She argued that the steps to follow to achieve these actions are:

1. Understanding the context and audience, situation analysis, and formative research
2. Focusing and designing the Strategy/Approach
3. Creating Activities, materials, tools
4. Implementing and monitoring progress
5. Evaluation and Re-planning

[14] https://www.fantaproject.org/sites/default/files/SBCC-SNEB-webinar-Mary-Packard.pdf - Accessed On October 6, 2021

She maintains that adhering to the steps as stated, SBCC will then broaden the focus to encompass the whole social and enabling context and different levels of change that will lead to social behavioural change (SBC).

John Snow Incorporated (JSI) is a public health research and consulting organisation involved in the social and behaviour change communication (SBCC) practice, and promotes healthy lifestyles and positive health-seeking behaviour in the United States of America and around the world argues in 2016 that participants most often cannot change what they do not understand, so JSI's social change and behaviour change approaches are grounded in the complex contextual and social determinants of human behaviour. They argue that SBCC strategies include national-level advocacy, enhanced by deeper interventions at the community and individual levels, plus partnership building with government, civil society, and the private sector to broaden and deepen SBCC impact.

To create the impact, JSI uses Strengthening Partnerships, Results, and Innovations in Nutrition Globally (SPRING), USAID's global nutrition project, led by JSI to create social change and behaviour change through communications for improved nutrition. The SPRING project of JSI uses participatory community media to spark behaviour change. SPRING adapted Indian NGO Digital Green's "human-mediated digital learning approach" to promote high-impact maternal, infant, and child nutrition practices. They produced community-produced videos and community-based women's, mothers', fathers', and farmers' self-help groups to successfully promote improved nutrition and agricultural practices.

However, the success of SBCC is more apparent when it is localised to the environment where it is researching, as all socio-cultural and environmental context is unique in its form, people and beliefs. The Through Our Eyes participatory communication project (2010) is a collaboration between the American Refugee Committee (ARC) and Communication for Change (C4C) which was supported by the United States Agency for International and

Development's Office of Women in Development (USAID/EGAT/WID) Cooperative Agreement EWD-A-00-07-00002 in Liberia, Rwanda, Southern Sudan, Uganda, and Thailand.

Its strategy was to engage community members in the production of films addressing gender-based violence (GBV), harmful traditional practices (HTP), human immunodeficiency virus (HIV) and related health issues and enabled local teams to take initiative in conjunction with the Through community-centered agrees that to foster awareness, dialogue, reflection, and action, participatory approaches to development communication can play a vital role in helping prevent these health concerns, but it must recognise the sociocultural context of settings, including crisis-affected communities.

South African communication campaigns

The South African government launched a campaign named 999, which took place in the nine provinces of the country; and was implemented in the first nine days of September 2018[15]. The South African Government News Agency reported on September 5, 2018,[16] that the campaign was launched by the Social Development Deputy Minister, Henrietta Bogopane-Zulu. The campaign aimed to create awareness through communities' visitations and dialogues and to educate communities about the dangers of alcohol consumption during pregnancy, which includes giving birth to a baby with FADS. In a related development, on 7 September 2018, the South African Department of Social Development[17] reported that the minister (as part of her 999 campaign) called for the criminalisation of maternal drinking as she counselled that behavioural change from maternal drinking will not be achieved without a sustained campaign through community visitation and dialogue that will bring long term results.

[15]World FASD day has been reserved for every September 9

[16]https://www.sanews.gov.za/south-africa/raising-awareness-about-foetal-alcohol-syndrome - Accessed on December 10, 2019

[17]https://www.gov.za/speeches/deputy-minister-hendrietta-bogopane-zulu-hosts-9-9-9-campaign-against-foetal-alcohol – Accessed on December 11, 2019

While the 999 campaign is a good initiative from the government, it is methodologically lacking as it does not have the qualitative depth that can collate and analyse the data to understand the required communication medium and strategy the campaign should adopt, from the pregnant women perspective. Considering the high rates of FASD in South Africa, reducing alcohol use during pregnancy has become a pressing public health priority. In this regard, Watt *et al.*in 2016, undertook a study in Cape Town, to qualitatively explore knowledge and attitudes about maternal alcohol consumption among women who reported alcohol use during pregnancy. In-depth interviews were conducted with pregnant women or those within a one-year post-partum who had reported alcohol use. The purpose of the interviews was to explore their experiences on alcohol use during pregnancy, community norms and attitudes towards maternal drinking, and knowledge about FASD.

The interviews showed competing attitudes as the pregnant women said that they received anti-drinking messages from several sources like passive public health messaging at the clinic or health care provider, or through communication with others like their mothers, grandmothers and sometimes other women in the community. Some women said they were exposed to clinic posters or pamphlets, but these sources were not highly valued, and the messages often contradicted their social norms, and worse still, they could not recall their contents. The pregnant women were also not very knowledgeable about FASD. Participants' personal experiences influenced their attitudes about the effects of alcohol during pregnancy as some either felt they were being judged by their mothers or other women in the community. Some said they knew other women and pregnant women in their communities who drank and nothing happened to them or their babies, while some said they had friends who encouraged them to continue drinking, and this made some of them think that it was a normative behaviour to drink while pregnant (Watt *et al*., 2016).

The researchers submitted that the campaign should focus on cultural information that should resonate with maternal drinkers. They also counselled that public health messages should not only be addressed to antenatal clinics but should take the communities and families and social networks into consideration because norms are reinforced there. This study will seek responses from pregnant women who drink alcohol if this conclusion is relevant in the

KwaZulu-Natal context for consideration during the development of a communication approach.

However, another study pointing pointed out that alcohol advertising has an influence on alcohol consumption (Parry *et al.*, 2012) advocates a ban of advertising of alcohol products in South Africa. The researchers' conclusions also support a wholesale public health policy that deals with the injurious use of alcohol rather than just an appeal to change behaviours which is the message the liquor industry tend to focus on. A proposal put forward by Parry *et al.* (2012) states that other policy interventions should focus on an excise tax increase, attending to alcohol availability by coordinating and regulating liquor outlets across the country, and legislation of hours for outlets to sell outlets to better manage access.

Again, the Association for Alcohol Responsibility and Education (AWARE), an NGO set up to mitigate alcohol misuse and abuse in South Africa, launched an awareness campaign in 2019 as one of its various advocacy programmes. The campaign was jointly undertaken with the Foundation for Alcohol Related Research (FARR), one of the leading NGOs that has done extensive research on Fetal Alcohol Spectrum Disorder (FASD) in Gauteng and Western Provinces, and some parts of Eastern Province in South Africa. The campaign commemorated World FASD day that is celebrated every September 9th, with the tag, "Tomorrow Starts When You DON'T DRINK." The campaign is targeted towards attracting 19909 pledges towards a 100% FASD free society by the end of September 2019[18]. Part of the campaign strategy, though focused more on Western Cape, was to use the FASD Knot while making television and community appearances and create awareness. The knot (a chord tied in the knot known as a reef knot or Canadian knot) was worn on the chest to support and inform the world, and indeed South Africans about FASD.

According to the FARR website,[19] the knot symbolises the following:

[18]https://aware.org.za/media-centre/ https://aware.org.za/media-centre/ - Accessed on December 11, 2019
[19]https://www.farrsa.org.za/wp-content/uploads/2014/12/WhyFASDKnot.pdf - Accessed on December 11, 2019

1. A cord with worn ends – the umbilical cord that serves as the pipeline for a baby to receive food and, and sadly the alcohol drunk by the mother; the brain that can severely be destroyed by the alcohol.
2. Knot – a type of knot with strength that cannot break even with pressure, rather it will be strengthened. This is to show the support that the community should show the maternal drinkers and sufferers of FASD.
3. The circle inside the knot – reflects the uterus of the pregnant woman which is biologically to provide an environment for the child to develop, and that it should be free from alcohol.

The FARR also has a campaign programme called the Healthy Mother, Healthy Baby (HMHB). This programme is targeted at pregnant women in high-risk communities who report low or moderate level alcohol use during pregnancy, as well as those who report high-level use of alcohol (FARR, 2015). The women are recruited at primary healthcare clinics after they have completed the Alcohol Use Disorder Identification Test (AUDIT). After the result, they are placed in a risk group in the ranking of low to high alcohol use. They are encouraged to attend health talks on the consequences of drinking alcohol during pregnancy, but they also receive home visits from the healthcare workers to further the education and awareness campaign. The women that remain in the programme after childbirth continue to benefit from the health talk[20]. This approach of FARR (encouraging pregnant women who drink alcohol to attend health talks on the consequences of drinking alcohol during pregnancy) agrees with the need for public health campaigns to go beyond targeting antenatal clinics, but also reach the broader community, including family and social networks, where norms are established and reproduced (Watt *et al*., 2016).

However, this approach will not have an impact on pregnant women who use alcohol in Durban as FARR is hardly visible there. Additionally, the sociocultural influences that motivate alcohol use have to be addressed qualitatively with the pregnant women themselves.

[20]https://www.farrsa.org.za/wp-content/uploads/2014/10/What-we-Do-HMHBProgramme.pdf - Accessed on 14 July 2020

The women are stakeholders in the discussion, who can then advise on the type of message and medium of dissemination that is a culture centred (Dutta, 2008), and that will resonate with the pregnant women who drink alcohol in Durban, KwaZulu-Natal. This study undertakes a qualitative research approach through in-depth interviews to understand and mobilise communication tool(s) in addressing sociocultural factors among pregnant women who use alcohol in Durban, KwaZulu-Natal as it goes beyond generic roadshows and awareness activities. The objectives of this study address the crucial details required for any campaign or communication approach to have an impact.

Conclusion

This chapter summarises a few of the various theories previously deployed to address the phenomenon of alcohol consumption among pregnant women, from biomedical and psychological perspectives. It also reviews some of the communication models adopted both internationally and locally in South Africa. The chapter evinces that although the two theories are significant, the ecological and socio-cultural context of the pregnant women who drink alcohol and reside in Durban must be taken into consideration. This contextual background and socio-cultural factors should be analysed to ascertain an appropriate message before developing a communication model intended for prevention or reduction so that communication will be effective. The beneficial practices, shortcomings and challenges identified in the above review are considered in the data collection for the current study to ascertain the relevance in Durban, KZN context via direct engagement with pregnant women to discover if and how they may be incorporated in the model.

The next chapter discusses the study's theoretical framework that includes Participatory Health Communication and the Cultured-Centred Approach (CCA). They are engaged to interpret the findings from my interviews and generate a communication framework to understand the role of communication in addressing the socio-cultural factors and consequences that influence pregnant women to drink alcohol.

CHAPTER THREE

THEORETICAL FRAMEWORK

Introduction

This chapter discusses the theoretical framework and the constructs engaged to address the research objectives. The discussion enhances the understanding of the role communication plays in addressing sociocultural influences among pregnant women who use alcohol during their pregnancies in Durban, KwaZulu-Natal. The theoretical framework is informed by the broader approach of Social and Behavioural Change Communication (SBCC), Participatory Health Communication (Estrada *et al.*, 2018; Tufte and Mefalopulos, 2009) and the Culture-Centred Approach (Dutta, 2008) which will serve as the conceptual lens through which the research focus would be interrogated. The discussion in this chapter begins with an overview of these theories and approaches and then proceeds to a detailed engagement of each of them.

Social and behaviour Change Communication (SBCC) is the methodical submission of theory-based, researched focused communication strategies to attend to changes at the personal, structural and environmental levels (USAID, 2019). It involves the mobilisation and intentional use of communication approaches to encourage changes in knowledge, attitudes, norms, beliefs and behaviours, to achieve the organisation and deployment of messages and deeds across different channels, to get to various levels of the community, including the personal, community, services and policy (HC3, 2020). It is also an iterative method where the community discourse and work in unison to achieve social change in the community and improve the health and wellbeing of the community members (Figueroa *et al*., 2002). CFSC is concerned in elementary ways, with the sustainability of communication, social change and development, and it involves the employment of different communication techniques to address inefficient systems, processes or modes of production within a defined location that has witnessed remarkable technological advances (FAO *et al*., 2005)

SBCC and CFSC are fundamental to health communication, and they have their foundations in participatory communication, a model in development communication. According to

Parker and Becker-Benton (2018), the conceptual framework for SBCC considers the links between interpersonal factors and contextual dynamics, while CFSC draws on participatory dialogue and empowerment models. SBCC and CFSC essentially deal with human and community issues that address social systems like health and well-being, and education. Hence, they resonate with the objectives of this research, which is to provide the framework for social communication aimed at changing the behaviour of pregnant women from alcohol consumption.

Participatory Health Communication is central to this research, and it establishes that robust and diverse communication infrastructure is essential for communication to improve health (Estrada *et al.*, 2018). The study appreciates that with a weak communication infrastructure, health information will not resonate with the appropriate community, and in this case, pregnant women who drink alcohol in Durban. To this end, the study pursues a multilevel, ecological approach that will go beyond addressing the information inequality at the individual level and discuss the phenomenon with various pregnant women who drink alcohol.

Participatory health communication, according to Estrada *et al*. (2018) also identifies health communication resources that are necessary for outcomes to be safe. They also submit that trusted spaces and places serve three distinct communication functions:

1. Informational, which is related to or characterised by providing information on the structure and channel of health information to the members of the community
2. Conversational, this is where members of the community feel comfortable discussing health issues less formally.
3. Connection, being an existence of relationships built with members of the community that are linked or associated with the phenomenon.

This study involved pregnant women in a conversation through an in-depth interview, at a location they desired and felt safe to express their experiences for the researcher to appreciate the sociocultural factors that influence their decision to drink alcohol. Thus, PHC also serves as a basis for formulating a communication medium and message that addressed the

sociocultural factors that influence pregnant women to drink alcohol. The approach helps to understand and appreciate the structural issues within the antenatal healthcare and communication infrastructure that have failed to resonate an appropriate message with them, and not allow their participation. To this end, the participatory communication model becomes desirable for this study.

Dutta's (2008) Culture Centred Approach (CCA) which will be discussed later in this chapter has three constructs: structure, culture and agency. Structure denotes the material reality as defined by policies and institutional networks that privilege individual sections of the population and marginalise others by constraining the availability of resources (Dutta, 2007, 2011; Dutta, Ban and Pal, 2012). Further, Dutta (2008) sees structure as a mechanism that encourages the flow and dispensing of health resources in a society which in one breath encourage, and in another limits cultural participants' abilities to for invoking their agency to engage in activities and behaviours that influence their health and wellbeing. The structures include policies, medical infrastructure, food resources and transportation systems. He argues further that agency is the capacity of individuals, groups and communities to partake in deciding the health agenda at the community level as well as creating solutions for community health challenges. Culture is a multifaceted web of meaning, and it is in a state of flux (Dutta, 2007, 2011; Dutta, Ban and Pal, 2012). Culture is dynamic; it is always changing as it interfaces with structure, and is constituted through the interactions among cultural participants. Agency constitutes the capacity of humans to engage with structures that affect their lives, make meanings through the engagement, and at the same time, creates a meandering opening to transform these structures. Agency is the interplay with culture and structure (Dutta, 2007, 2011; Dutta, Ban and Pal, 2012). These constructs are deployed to explore the factors that influence maternal drinking of alcohol.

Doing this, the study is situated within the context of developing a communication approach that is intended for the pregnant women who drink alcohol in Durban to appreciate since they participated in the process. The study intends to also provide an approach that health communication stakeholders including health care and health communication researchers, governments at all levels and Non-Governmental Organisation (NGOs) that are health focus

to consider using in promoting health literacy that will empower the targeted beneficiaries to make informed health choices, particularly since they participated in the process and message development. In the subsequent sections of this chapter, each of the above-mentioned theories and approaches is discussed in detail.

Development Communication

To adequately address the theories of participatory health communication and culture-centred approach, there is a need to explicate the field of development communication which has always created deliberations among scholars and development experts (Quarry and Ramirez 2009). Development communication is also called communication for development. Servaes (2002) asserts that it is a social process, and the sharing of knowledge aimed at reaching a consensus for action that considers the interests, needs and capacities of all concerned. Development communication is the use of communication to facilitate social development (Quebral, 1973). It engages policymakers, establishes conducive environments, assesses risks and opportunities and promotes information exchange to create positive social change through sustainable development (Mefalopulos, 2008). As an active and dynamic area of study, it is grounded as a sub-discipline of communication science. Development communication is composed of other sub-disciplines in domains like strategic communication, participatory communication, crisis communication, risk communication, development journalism, international communication, online/internet media, health communication (which is the domain of this study), agricultural extension/rural communication, environmental communication and climate change communication. These sub-disciplines provide the foundation for development communication professionals and academics.

According to Pradip Thomas (2014), development communication is a variety of practical applications based on the integration of communication as a process and the leveraging of media technologies in social change. Also, development communication according to Manyozo (2012) refers to a group of method-driven and theory-based mobilisation of the instruments of communication like the media to influence and transform the political

economy of development in ways that allow individuals and communities to participate and determine the direction and benefits of development interventions. Further, Servaes and Malikhao (2005) say that understanding that some people are voiceless not because they have nothing to say, but because nobody cares to listen to them therefore suggests and encourages listening to the people as this will foster trust and dependability much more than haranguing. In a study done by Ogan (1982), he described development communication as a discipline in development planning and implementation in which adequate account is taken of human behavioural factors in the design of development projects and their objectives. Melkote & Steeves (2001) presented it as an emancipation communication that is aimed at combating injustice and oppression.

Thompson's contribution to discourses on communication development (1963) argues for three approaches to development communication:

1. Struggle to rescue development discourse from the perspective of the underclass by building their consciousness and knowledge of development;
2. Communication for development should be used to promote the culture and values of the underclass or subjugated people from the bourgeoisie and capitalist's cultural hegemony; and
3. Communication for development ought to be an exercise in advocacy that works towards the conversion of the political economy of development itself, to allow a more significant number of people to achieve what Quebral (2011) in agreeing with Thompson (1963) calls superior socioeconomic equality and individual potential

The structure of development communication in this regard should not be linear (Laswell, 1948) or one-way (Shannon and Weaver, 1949) because of the danger of assuming that the participants, for instance, pregnant women who drink alcohol in Durban (in the context of this study) understand the message disseminated, when they do not. Rather, the structure should be interactive (Schramm, 1955; Wood, 2009) in a form so that the participants (that is, pregnant women) will participate in determining the message that will resonate with them

in the communication effort. In a similar vein, Mansell andManyozo (2018) conclude that development communication is a mediation that seeks to create an environment for intervention and development process to have a dialogic communication approach where the agency is given to the individuals/communities, in this case. Hence, communication must be participatory. Dutta (2008) argues that development communication messages like health communication should involve the people and communities in a participatory manner in creating strategies and channels to communicate with them. It facilitates social change to the extent that it engages stakeholders and policymakers in asymmetrical power relationships (Mansell andManyozo, 2018), establishes conducive environments, assesses risks and opportunities and promotes information exchanges to create positive social change through sustainable development (Mefalopulos, 2008).

In their work, Lie and Servaes (2015) says development communication can be approached from two different models being diffusion model and the participatory model which is the use of communication to empower communities to visualise their aspirations and discover solutions to their development problems and issues (Melkote and Steeves, 2001; Servaes, 1999; Waisbord, 2001). The difference, as argued by Lie and Servaes (2018); Melkote and Steeves (2001); Servaes (1999); and Waisbord (2001), resulted in two communication models. They are the diffusion innovation model and participatory model; the former developed by Everett Rogers (1962) outlines the how, why and what rate new ideas and technology spread and the latter, participatory model which this research has mobilised involves the participation of the community to achieve change.

This study explores the role of health information for pregnant women who drink alcohol in Durban to be able to make informed choices concerning their health, assess the risk involved in drinking alcohol while pregnant and take decisions that will be beneficial to them. The researcher reviewed the models of development communication as postulated by Lie and Servaes (2015). The researcher's interest is to approach this study from the perspective of the pregnant women who drink alcohol in Durban and their sociocultural context, and the message that will resonate with them so that they can make informed health decisions. This study subscribes to the participatory communication model, as opposed to a top-down or

diffusionist model. However, the two models are discussed below to provide a comprehensive historical paradigmatic background.

Diffusion of Innovations Model

The diffusion of innovation model is a theory in communication that explains how, over time, an idea or product gains momentum and diffuses or spreads through a specific population or social system. In studying how a community or people understand and accept new and life-changing information, Everette Rogers developed the diffusion of innovation theory in 1962 (Rogers, 1962; Singhal, 2016) because he believed that individuals might not accept, nor respond to information disseminated to them for development simultaneously. He explains that over time, an idea or product gains momentum and diffuses or spreads through the people or social system before these people will eventually adapt or respond to the new idea or product after perceiving it to be new and innovative, and therefore capable of changing their situations.

The study of diffusion separates groups of people into personality, media behaviour, social status and how these categories influence their rate of adoption (Rogers, 1962; Singhal, 2016; Dyll, 2009). For example, early adopters are habitually youths, have higher financial and social status and are equipped with better cerebral ability than later adopters called laggards. Diffusion of innovations, therefore, emphasised the nature and responsibility of communication in facilitating the distribution of development information within the local communities. Singhal (2016), citing Rogers (1962) states that awareness, interest, evaluation, trial and adoption are the stages of innovation diffusion in every community.

It will be difficult to apply the diffusion innovation model in this study since the researcher's objective is to explore the socio-cultural context of the pregnant women who drink alcohol in Durban through an SBCC approach. Their involvement will enable the researcher to explore the appropriate messages and channels that will communicate to them. In this regard, the concepts and principles proposed by the diffusion innovation model are elitist and

external to pregnant women since they are not involved in the development of the process and will not take ownership of the process.

Participatory Model

Participatory communication is an approach based on dialogue, interaction and community engagement (Dyll, 2009; Govender *et al*., 2010; Lennie and Tacchi, 2013; UNICEF ROSA, 2018). It allows the sharing of information, perceptions and opinions among stakeholders and thereby facilitates their empowerment. It is not just the dividing and battering of information and experiences, it is also the discovery and development of new knowledge targeted at addressing situations that need advancement. Stakeholders often do not envision and define participation in development in the same manner (Tufte andMefalopulos, 2009). Therefore, they counselled that development practitioners have to be unambiguous on the concept and approach to stakeholders' participation in the development project, and clarity has to be achieved with dialogic communication.

The study involves pregnant women who drink alcohol in Durban while exploring how their sociocultural context influences their alcohol consumption, and how their agency can be mobilised to participate in establishing how best to communicate with them. Linear one-way communication (Laswell, 1948; Shannon and Weaver, 1949) is problematic for pregnant women because they are not involved in the development of the process. According to this model expounded by Laswell (1948) and Shanon and weaver (1949), 'beneficiaries' are usually only being informed of an outcome that may not resonate with them, and thus the promotion of behavioural change among pregnant women who drink alcohol in Durban. Thus, behaviour change is possible because the pregnant woman with their complete agency and sociocultural context can identify and eliminate communication barriers and structures that will not allow the messages to resonate with them. Their participation will not only contribute to the process of message development, but to outcomes like a preferred channel of communication that will resonate with them.

The objective of this research aligns more to participatory communication as it mobilises the participants' agency and involvement, and from their sociocultural realities, develop and

promote a process, messaging and outcome that will be beneficial in their making informed health choices (Dutta, 2008). Pregnant women can make important contributions in message development and pointing to the researcher the channel that will address their circumstances rather than a process and outcome being suggested to them to adopt. It is against this backdrop that this researcher has aligned with scholars like Airhehenbuwa (1995) and Dutta (2008) to appreciate the sociocultural context of pregnant women in Durban by using the participatory communication approach.

The Intersection between Health Communication and Participatory Communication

As argued by the National Communication Association (2013), health communication promotes health information to an audience so that they can make informed health choices and have positive health outcomes. The central point in this argument is that it must be tailored to an audience, and all the strategies must also focus on the audience on how they can improve their health literacy (Beato and Telfer, 2010; CDC, 2013; Ngigi and Busolo, 2019). To achieve this objective, the audience must be involved. Other scholars have also argued that to achieve health promotion in a community, the approach has to be dialogic and participatory so that opinions and perceptions held by the members of the communities can be understood and appreciated before a programme is launched (Dyll, 2009; Govender *et al*., 2010; Lennie and Tacchi, 2013; UNICEF ROSA, 2018). It will enable the health promotion planners to get grasped of the factors that are inherent in the community and also influences health decisions, in other words, the approach has to be cyclical (Dyll, 2009; Wood, 2009; Govender *et al*., 2010; Wiboolyasarin, 2012).

Sackey, Clark and Lin (2017) did a study in northern Ghana to explore the extent to which Non-Governmental Organisations (NGOs) use culturally appropriate communication strategies to involve community members in implementing their aid program. Also, their study had the purpose to investigate if NGOs used participatory communication strategies to include the intended recipients of aid in the decision-making process in a meaningful way. They found out that though they had contacted the local political and cultural authorities like the chiefs, and indeed the chiefs called the people together to inform them of the project, gaps

still existed because the people felt they did not have the opportunity to participate directly in the problem solving and decision-making process. In this regard, the current researcher fully integrates the pregnant women who drink alcohol to participate in the identification of the factors that influence them to drink alcohol, the development of appropriate messages, and the choice of channels that should be used in communicating with them, which also will resonate with them. This study is focused on how pregnant women who drink alcohol in Durban can participate in the process of developing health information that they will eventually become beneficiaries of. Their participation will enable health informational planners to appreciate the issues from their sociocultural perspective before the development of messages that will be required for dissemination, and also in the channel selection that will resonate with them. Hence, as mentioned earlier, the study is situated within the sub-discipline of health communication. Therefore, it is necessary to explicate a few issues relating to health communication which may enhance a deeper understanding of the study.

Health communication is the study and activities of disseminating and advocating health information like public health campaigns, health education, and exchanges between doctor and patient (National Communication Association, 2013). It is also communicating promotional health information, such as in public health campaigns, and health education (Dutta, 2008). The purpose of disseminating health information is to influence personal health choices by improving health literacy (NgigiandBusolo, 2019). Usually, health communication is tailored to an audience. Therefore, it seeks to refine strategies to inform people about ways to enhance health or to avoid specific risks (Beato and Telfer, 2010; CDC, 2013). Schiavo (2007) argues that health communication is multi-disciplinary, essentially focusing on influencing and supporting individuals, communities, health care professionals, policymakers or special groups to pursue, adopt and sustain a behavioural practice or social policy change that will improve health outcomes.

Tracing the development of health communication as a field, Kreps, Bonaguro, and Query (1998) assert that the early influence was hinged on the communication discipline emulating theories in other social science disciplines such as psychology and sociology which were involved in research of health care systems. Kreps *et al*. (1998) also posit that researchers in

psychology generated an enormous text that became very influential in the advancement of health communication study. The humanistic psychology progress of the 1950s and 1960s pioneered by scholars such as Carl Rogers (1951, 1957, 1961, 1962, 1967), Jurgen Ruesch (1957, 1959, 1961, 1963), and Gregory Bateson (1951) stressed why therapeutic communication was necessary for the promotion of psychological health and public health care delivery.

Health communication evolved as a field of study as scholars generated a body of literature that is varied, and as the role of communication in health care promotion grew more, scholars saw the need to legitimise it, and thus came together to form a Therapeutic Communication interest group of the International Communication Association (ICA) in 1972 (Kreps *et al.*,1998). Lie and Servaes (2015) argue that health communication research is dominated by theories like the theory of planned behaviour (Fishbein and Ajzen, 1975), the health belief model (Hochbaum*et al.*, 1974) and the elaboration likelihood model (Petty and Cacioppo, 1986). It is essential to note that health communication does not only require an individual behaviour change alone but also it can trigger the processes of social change (Dutta, 2008; Govender, 2013; Lennie andTacchi, 2013; Wilkins, Tufte and Obregon, 2014; HC3, 2017).

The rise of health communication is traceable to the increasing public health challenges were over the ages, and the need to specialise and foreground the execution of public health campaigns with communication methods and paradigms for social impact. To this end, sophisticated, and systematic strategies, scientific and technological tools became inevitable for proper application and evaluation of public health campaigns and impact for behavioural change (Salmon and poor sat, 2019). Health communication, therefore, is problem-based, focusing on identifying, examining, and solving health care and health promotion problems (Kreps *et al*., 1998). Also, while engaging the rise and development of public health communication, Salmon and Poorisat (2019) argue that it is a sociocultural practise which is traceable to early human civilisation, an attempt to warn, educate and influence behaviours of individuals and communities facing public health problems. It approaches using technology to reach a broader population. It is achieved by mobilising an interdisciplinary mix of public health, social science, and communication focusing on the nuances of public

health communication to achieve the desired goal, which most often requires a change of behaviour.

Further, health communication, according to Shiavo (2007), is audience-centred, and the audience should not only be seen as a target but as an active participant in the process of researching and developing methods and strategies of health promotions. It is also research-based because the overall premise of health communication is that the behaviour of people conditioned by the environment they live, and the people they interact with should change. For health communication to achieve behaviour change, it has to be strategic, and the process is driven. Programmes planned must accommodate the nuances of the community by showing deep understanding and patience, being creative in every supporting strategy to build the desired relationship. Thus, all programmes should be focused on the community, and respond to their specific needs, including the channel of communication that should address their desires (Shiavo, 2007). If the aim is not community-focused, Kreuter and McClure (2004) argue that there could still be some barriers to health communication. They stated that a fundamental barrier is a culture that ordinarily should be useful in enhancing communication roles. Thus, they posit that health communication scholars and experts should appreciate the culture of the community using the model of source, message and channels that will apply to the audience culture. Singleton and Krause (2009) posit that the integration of culture, linguistics and health literacy in health communication planning is essential in informing a culturally diverse audience, and it is useful.

There is a need for the health communication planner and the policymaker to work closely while researching the health needs of the community by involving the pregnant women who drink alcohol in Durban as this will help in identifying the structures and processes that can inhibit the success of their programme. This way, the health communication planners and policymakers will be in tandem in the basic understanding of the programmes, they can also mobilise necessary resources and equally make re-adjustments to the structures and processes that will build the capacity of the members of the community to make informed health choices (Dutta-Bergman, 2004).

This study will approach health communication from the perspective of horizontal communication where the pregnant women who drink alcohol in Durban become the main focus. The focus of the dissemination of health information according to Ngigi and Busolo (2019), is to make sure the pregnant women make informed health choices that will be of benefit to them. Therefore, the researcher will mobilise the participants within their sociocultural context to participate in the process of reviewing the health information, structures and resources so that they can make contributions on how the process can be to their advantage. The pregnant women will also make suggestions to the choice of a channel which they believe will resonate with them.

Participatory Health Communication

Participatory Health Communication is a theoretical construct that foregrounds the value of the inclusion of beneficiaries' voices in the construction of health campaigns (Lal *et al*., 1992; Parker, 2016; Estrada, 2018; De Hertogh and DeVasto, 2020). Participatory health communication is based on dialogue, and it allows the sharing of information, perceptions and opinions, and in case of Participatory Health Communication, health information, perception and opinions among the various stakeholders and thereby facilitates their empowerment particularly to achieve better health outcomes (Tufte and Mefalopulos, 2009). According to Estrada and Gamboa (2018), a diverse and robust communication infrastructure is essential for communication to improve health. They argued that a weak infrastructure can cause the failure of health information to reach appropriate audiences; this is a component of information inequality that contributes to health disparities.

The Participatory Health Communication construct is a focused stakeholder approach where interaction with the pregnant women who drink alcohol are necessary for identifying the issues and in addressing the factors that influence them to drink alcohol (Tufte andMefalopulo, 2009). Moreover, it is a community-focused theory because sociocultural factors are influencers on human behaviour (Dutta, 2008). It is therefore essential to understand that the pregnant women who drink alcohol are a community themselves because

of the shared activities that link them together, and their identities (Israel *et al*., 2010; Lewis and Lewis, 2015).

To comprehensively discuss Participatory Health Communication as a model of participatory communication, and put the concept into proper perspective, a brief explanation of the word health about participatory communication becomes necessary. The World Health Organisation (1948) defines health as a state of complete physical, mental, and social well-being and not merely the absence of disease or infirmity. However, Huber *et al*. (2011) argue that the WHO's (1948) definition was limited. They consequently explain health as the ability to adapt and manage physical, mental, and social challenges throughout life. This definition reveals that the individual or group of individuals involved should have a role to play in adapting and managing challenges as it concerns their health. In adapting and managing challenges, dissemination of information is a necessity, and this is where communication becomes a crucial consideration. The purpose of communication should be to make something familiar or to share meanings, perceptions, views, or knowledge, and this could be best achieved through active interaction of all parties involved or affected. Participatory Health Communication will, therefore, mean theories and practices of communication that involves people in making health decisions about themselves and the management of their well-being (Airhehenbuwa, 1995; Dutta, 2008).

For communication to improve health Estrada *et al*. (2018) argue that diverse and robust communication infrastructure which is the concept, ideology and process including content and language, is essential. When infrastructure is weak, health information will fail to reach appropriate audiences and create information inequality that contributes to health disparities. In addressing this information inequality, intervention should be multilevel and ecological, and consistent with how information should improve health (Estrada *et al*., 2018).

Therefore, a communication structure is necessary to disseminate health information about pregnant women who drink alcohol because they (Dutta, 208) will appreciate that the programme managers interacted with them before crafting the message(s) they are going to consume. A linear information structure (Dutta, 2008) may not adequately address their issues. It may become a barrier since the message might focus on individuals and thus miss

out on a multilevel and sociocultural approach that can address them as a diverse group or community (Estrada *et al*., 2018).

This study deployed the Participatory Health Communication approach to explicate ways to communicate with pregnant women who drink alcohol. This approach highlighted the importance of the participation of the pregnant women who drink alcohol in foregrounding the drinking issues that are natural to them in the development of any health campaign to achieve meaningful change in their behaviour (Airhihenbuwa, 1995; Basuand Dutta, 2008). Participatory Health Communication guided the researcher on how to interact with the pregnant women who drink alcohol in Durban to appreciate their sociocultural context, and understand how to develop a Social Behavioural Change Communication (SBCC) approach, the kind of message that can resonate and address them, and the best medium to use in disseminating the message. This dialogic process was through mutual interaction during the structured interview which discussed the factors in their cultural and social network to appreciate the influences that make pregnant women drink alcohol (Lewis and Lewis, 2015; Estrada, 2018), and is further explored through the adoption of the culture-centred approach and Social and Behaviour Change Communication (SBCC).

Social and Behaviour Change Communication (SBCC)

Behaviour change refers to the transformation or modification of human behaviour. In achieving this, the desired goal of behaviour change is articulated and objectified, and then information is presented to that individual or group of individuals for them to change their behaviour and achieve an outcome, particularly in health. Health communicators refer to behaviour change as efforts and theories put in place to change people's habits and attitudes and to prevent diseases (World Bank, 2002). In developing countries, efforts and strategies are focused on the prevention of those diseases to save healthcare costs (Jamison, BremanandMeasham, 2006). However, behavioural change effort only is limited because of the social nature of human who is influenced by their environments. Therefore, social change becomes imperative. While many health promotion programmes assume that behaviour alone needs to be changed, such change is unlikely to be sustainable without incurring some level

of social change (Kalichman and Hospers, 1997; UNAIDS, 1999). The strategies put in place for this prevention is referred to as behavioural change communication.

Behaviour Change Communication (BCC) is a communication framework that encourages individuals to change their behaviours through adopting healthy, beneficial and positive behaviour practices (Sandesh Adhikari, 2019)[21]. It helps in promoting changes in knowledge, attitudes, norms, belief, and behaviours of an individual. Govender (2013) describes BCC as a framework targeted toward promoting positive health outcomes. The framework is proven to have emerged from psycho-socio and cognitive theories in psychology and is premised on the understanding that people who are given knowledge, will change their attitudes and positively adapt their behavioural practices (Govender, 2013).

However, the BCC initiatives and programmes are not context-based. To this end, Govender (2013) argues that this challenge led to a paradigm shift towards a more socially based strategy called the social and behavioural change communication (SBCC)[22] approach. The communication approach to behavioural change should not only be content-based but context-based as the community that it is intended for should be understood from their sociocultural circumstances (Cardey 2006; Kunda and Tomaselli, 2009; Govender, 2013). Therefore, for effective communication intervention, the knowledge, values and behaviour of the pregnant women who drink alcohol (which is the context of this study) must be understood within their socio-cultural community.

SBCC is an interactive process of any intervention with individuals, groups or communities to develop communication strategies and promote positive behaviours which are appropriate to their settings and culture (Dutta, 2008), to address their health outcomes (UNPF, 2002). In achieving the objectives of SBCC, the communication must go beyond just providing information on how to behave but create an enabling environment that will not only get the community participation but must-have information and communication content that will facilitate education for the desired behaviour change. Similarly, Wilkins, Tufte and Obregon

[21] https://www.publichealthnotes.com/1142-2/ - *Accessed on September 17, 2020.*

[22] *The terms social behavioural change communications (SBCC) and social behavioural communication (SBC) are used interchangeably by different authors.*

(2014) submit that development communication and social change communication is about understanding and appreciating the role information and communication plays in causing a change in a community by identifying that people have a right to information that will bring the desired transformation and give them a voice (Dutta, 2011).

One of the ways to achieve the desired change is through practical applications and mainstreaming of communication and interventions approaches. The pregnant women who drink alcohol in Durban are important in the whole concept of SBCC. The enactment of their agency will play a necessary role in their negotiating the intersection between their culture and the structures which reflects itself in the antenatal health policies, antenatal facilities, and the communication process that is used in disseminating health information for them to make choices. The understanding and appreciation of the voices, beliefs and norms are strategic in the whole process of message development and dissemination. SBCC is premised in theory and evidence-based. Activities are developed based on empirical information, and it follows a methodical process, analyses the problem to understand and appreciate the barriers and motivators to change. It then develops a comprehensive set of tailored interventions that inspire the desired behaviours which is a multifaceted phenomenon, influenced by activities within the individual and beyond (HC3, 2017). Hence, this research undertook interviews with pregnant women who drink alcohol to understand the sociocultural influences that necessitate their decisions. Their stories and experiences will not only provide a more sociocultural understanding of the complex phenomenon in Durban, KZN, but the data generated will inform a communication approach that deepens an understanding of the sociocultural factors that encourage alcohol consumption amongst pregnant women, and the role of communication in addressing this.

While social and behavioural change communication (SBCC) is an interactive process to develop communication strategies to promote positive behaviours suitable for a particular community to address health challenges and encourage positive and desirable health outcomes, communication for social change (CFSC) involves the use of techniques to address inefficient systems and processes and ensure the members of that community acquire new knowledge and skills to experience and own change.

Communication for Social Change

Communication for social change (CFSC) refers to how people may be in control of the means and contents of the communication process (Dagron and Tufte, 2006). CFSC is dialogic, and a conversation during the engagement on the issue of social change. People in CFSC understand and appreciates who they are, what they need and want to improve their lives, and they have informed knowledge about these desires more than an external expert (Dagron and Tufte, 2006). CFSC must not be linear and centrally controlled communication but must be dialogic by promoting conversation among equal voices (Dagron and Tufte, 2006). They also posit that the subaltern communities must own the process, methods, content and tools of communication, and not just an outside process being handed over to them. The effort must go beyond individual behaviour change, and address the influence of culture, values, policy, culture and the whole development context. It must also strengthen cultural identities, trust, commitment, ownership, voice and community engagement and empowerment.

CFSC is an approach to development communication separated from the tradition of modernisation theory and focuses on participatory communication. It involves the use of various types of communication techniques to address inefficient systems, processes, or methods of development within a specific community, and different channels and approaches are used to help individuals among the targeted society to acquire new knowledge and skills (Jacobson, 2016). It will allow communities not only to experience change but to guide it as well (FAO, 2005). Furthermore, Thomas and van de Fliert (2014) approach CFSC from the perspective that development and social change takes place within a complex reality of individuals, families, communities, organisation and countries, and these elements come with different levels. They say that social change cannot be achieved by a regular scientific, technical or economic approach, but by a more holistic and participatory approach to social development and policymaking either at the top or the grassroots. The social change goes beyond changes in attitudes or behaviour, or awareness, but addresses the fundamental issues of change itself. Thomas and van de Fliert (2014) argues addresses the adoption of new

practices and ways of doing things either at the individual or community level are based on new ideas, new structures, new processes and new ethics that encourage new structures to reinforces the change.

CFSC is an iterative process that focuses on community dialogue and collection of action work together to produce social change in the community and for this study the pregnant women who drink alcohol in Durban to improve their health and welfare outcomes. The stimulus or catalyst process can be initiated by members of the community, but there should be a dialogue within the community at a larger level for a proper consultation for it to lead to collective actions and resolutions to the common problem. To this end, when the pregnant women who drink alcohol in Durban went through the dialogue and consultative process, it will lead to a shared and collective objective, decisions and action that they will be willing to use a solution in addressing the sociocultural factors that influence them to drink alcohol.

Behaviour change and social change, as argued by Jim Macnamara (2017), should not be seen so much as different approaches and strategies, but as a complementary approach within the SBCC framework also promoted by the United Nations Children's Emergency Fund (UNICEF) to address individual and social influences. Therefore, this researcher agrees with Macnamara (2017) that SBCC and CFSC are similar in addressing the individual and sociocultural factors that influence pregnant women in Durban who drink alcohol. Also, SBCC and CFSC initiate an iterative process for participatory dialogue with them to achieve social change in their community by paying attention to their social and cultural needs (Figueroa, Kincaid, Rani and Lewis, 2002).

Communication for social change entails dialogic and participatory communication, to create a cultural identity, trust, commitment, ownership, and empowerment so that change can take place. Integrating culture with social change dynamics. It is pertinent to note that culture and social change are based on the ability of the communities to come together and engage collectively in a dialogic manner in what Paulo Freire (1970) referred to as communal reflection or social praxis. According to Dutta (2011), the affected community is the locus, and their agencies are mobilised to seek out spaces for transformation, and thus draws upon their cultural resources. More so, communication for social change is generally appreciated

as a shift or change in people's lives that happens when they participate in the decision making processes. Thus, Ford et al. (2003) define social change communication as being a dialogue through which people define who they are, what they want and how they can get it (Ford, Odallo and Chorlton, 2003; Gray-Felder and Deane, 1999).

In light of the above conceptions, the current researcher approaches this study from a dialogic and participatory perspective with the pregnant women who drink alcohol in Durban to identify their ideas, experiences, customs and their social behaviour to appreciate the role of communication in addressing sociocultural factors that influence them to drink alcohol and make them part of the process of social change.

Culture-Centre Approach (CCA)

The culture-centred approach, propounded by Mohan Dutta (2008), concerns itself with the voices of marginalised groups and explores the interaction between culture and structure that create conditions of marginalisation (Dutta-Bergman, 2004a, 2004b; Dutta, 2007, 2008, 2011; 2020; Dutta, Ban and Pal, 2012). The interactions between the continuous and dynamic elements of culture provide the context for cultural meanings that are in flux (Dutta, 2007). The current research favours the culture-centred approach which recognises the agency of the pregnant women in negotiating structures and in seeking spaces for change (Dutta, 2011). As mentioned earlier, the CCA approach to health communication revolves around the concepts of structure, culture and agency. The interconnectedness of these components is shown in figure 4.1 below.

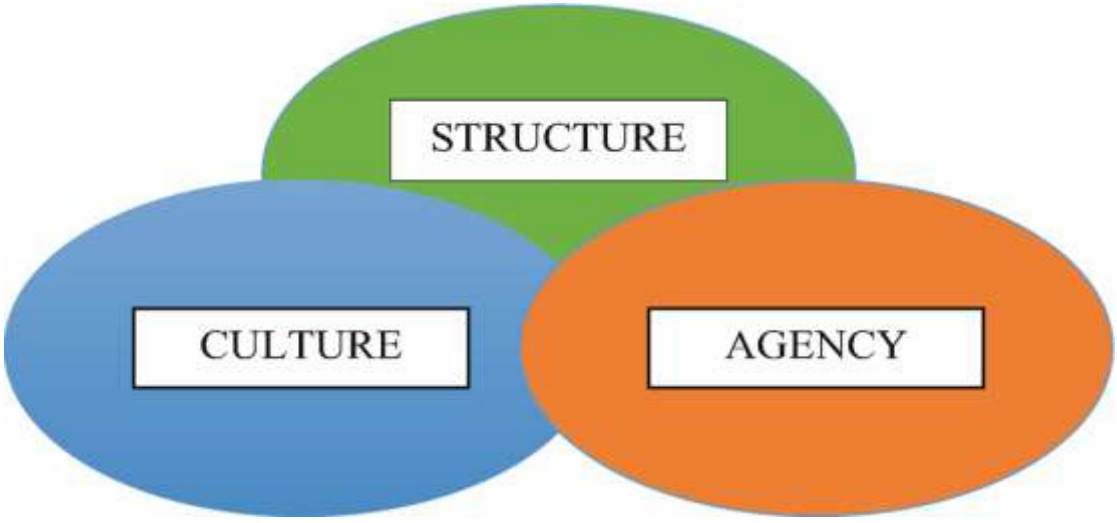


Figure 4.1: Culture-Centered Approach to Communication for Social Change (Dutta, 2020)

The diagram illustrates the interactions of culture, structure, and agency as the principles of the culture-centred approach employed in this study to compliments participatory health communication. They are discussed in detail hereafter.

Structure as a Principle of the Culture-centred Approach

Structures refer to the processes of organising both material and communicative resources that can enable and constrain access to resources (Dutta, 2008; 2014). The communicative processes depict rules, roles, and formalities that constitute the realms of participation and representation, while the other understanding of structures portrays the institutions, organisations, and systems within societies or communities that frame how material resources are distributed (Dutta, 2014). Structures can enable and limit access to resources, it can be stable or fluid, and it interacts with cultural contexts to circulate meanings and position as sites for enactment of the agency at the individual, relational, familial, and community levels. Communication dissemination is constituted within the structures of organising and offers an opportunity for shifting the dominant organising of structures (Dutta, 2014).

Structures, as described by Dutta (2008), are the organisations, processes and systems in a society which determine how that society is organised, and how it functions, and the members of that community interact. Policies and institutions and the network define it, and it gives an advantage to some privileged members of a community over others who cannot access the resources. Dutta (2008) argues further that at the interaction of the international and national levels, structures refers to political and social actors and multinationals that drives the policy formulation and work with structures at the local level. It is important to note that these structures limit the resources accessible by members of a community (Dutta, 2008).

Structures also represent the distributary systems for health resources in societies which simultaneously limit and create cultural participants' opportunities for enacting agency to engage in practices that influence their health and well-being.

Culture as a Principle in Culture-centred Approach

Culture is dynamic and constitutes the framework of meanings which is continuously changing over sometime in its relationship to the organising structures and through the everyday participation of individuals and communities in meaning-making (Dutta, 2009). It is contained within the context meanings are located, experienced and negotiated. In a broader sense, it is appreciated in terms of values, beliefs, norms, rituals, and codes which are gotten through the meanings that individuals, relationships and communities experience (Dutta, 2014). Culture is a term that encompasses the social behaviour and norms in human societies including the knowledge, beliefs, arts, laws, languages, customs, capabilities, and habits of the individuals in these groups (Edward Taylor, 1871; Betsch*et al.*, 2016).

Furthermore, culture drives the culture-centred approach, foregrounding the participation of community members in social issues, and the construction of meanings. It is constituted through the act of participation of local community members, and it is therefore continually constructed by its members (Dutta, 2008). According to Betsch*et al.* (2016), Culture can be reinforced in a community through social norms visibly and invisibly like beliefs that are communicated down the generations, and it can be reinforced through the structure in the society like the health care systems, and the health communication infrastructure. These

structures influence the behaviour of people in every way and serve as the basis for meaning and interpretative meanings that build the appreciation of health care.

Culture is critical in the articulation of health studies (Arhinhenbuwa, 1995, Dutta, 2008), and indeed a significant driver in participatory health communication that informs health opportunities. On this basis, this study employed the culture-centred approach as the theory that will serve as the plank to appreciate and understand the socio-cultural factors that influence pregnant women who drink alcohol in Durban. The study, therefore, explored factors like the participants' family, friends, and the neighbourhood/environment they live in. These sociocultural factors may influence the participants and motivate their drinking alcohol.

Agency as a Principle of the Culture-centred Approach

Agency is the capacity of cultural members in the community to express their choices and participate in negotiating the structures that can inhibit them from access to resources. According to Dutta (2014), the agency is an everyday activity of making meaning that can negotiate the structures, and innovating strategies to addressing the structural barriers that are experienced by individuals, families, communities, and collectively develop solidarity to resist inequitable structures. Agency is an action or intervention that can produce a particular effect in a community, and thus it is the capacity of the individual based on information and resources available that can motivate that action. Scholars in discussing agency described it as the capacity of individuals, groups, and communities to participate actively in determining the health agendas at the local level and creating solutions for community health problems (Dutta, 2007, 2011; Dutta, Ban and Pal, 2012; Koenig, Dutta, Kandula, and Palaniappan, 2012). In this regard, the experiences of the pregnant women become useful to appreciate their capacity in expressing the appropriate messages that will resonate with them and the channels that they recommended to communicate to them messages.

As argued by Dutta (2008), members of the community, in this case, the Durban based pregnant women, should be integrated into any process that will affect them so that they will have a voice in the process and exercise their agency. In this regard, the researcher ensured

that the pregnant women are involved in the process using the participatory health communication model so that they can discuss the structures that are not helpful to them and determine the necessary changes that are important to them (Dutta, 2011).

In addition, the culture-centred approach is integrative as it should provide a dialogic and communicative context for the pregnant women and the health workers that are bound together through the duration of the pregnancy. This integrative relationship will initiate the understanding of health meanings in the context of the pregnant women, interpret these meanings, and express them within the same cultural context so that the pregnant women can exercise their agency to make the right health choices (Dutta, 2011; Lubombo, 2014).

Furthermore, this researcher submits that the biomedical and psychological approaches (reviewed in chapter two of this study) may limit the agency of the pregnant women who drink alcohol in Durban. Thus, there is a need for a sociocultural approach that includes historical, political, religious, economic and social factors that influence culture in health literacy and, and communication, hence the adoption of a culture-centred approach as one of the theories of the study (Lupton, 1994). The researcher, therefore, went beyond the biomedical and psychological approach and adopted a culture-centred approach to interacting with the pregnant women, had a dialogue with them in a consultative and iterative process on the factors that influence them to drink alcohol while pregnant. The researcher was also able to appreciate the kind of messages that will resonate with them during advocacy, and the appropriate medium that should be used for any campaign.

Again, Dutta (2008) asserts that agency is enacted at the intersection between culture and structure, that is, the women's agency is affected by cultural and structural constraints in their environment. This study located the culture of the pregnant women within their community, and how they are able through their agency to construct and to make meanings from the structures that exist in their community. This intersection is helpful to the researcher to appreciate the constraints that structures within their sociocultural environment including the antenatal clinic and the communication process have created, and how they can use their agency to improve the setting by participating in the process for change, and ultimately come out with a new structure and culture that will empower them to make informed health choices.

Based on the discussion, the outline of CCA signposts the methods in which participatory spaces may be galvanised within communities as opportunities for the articulation of their agenda and strategies to solving issues that emerge from community voices rather than being reeled out and dominated by the overarching agenda of funding partners or agencies, state actors, civil society actors, and private corporations (Dutta, 2008).

The culture-centred approach locates culture at the centre of the process, it explores how cultural meanings are co-constructed by participants in their interactions with the structures that surround their lives and examines the communicative processes by which marginalisation takes place in the community. The strategy also submits that culture and health are integrated. It provides the communicative perspective for health meanings in communities. It is also through the expression, interpretation and reinterpretation of culturally disseminated meanings that individuals perform their agency (Dutta, 2011). Thus, communicating health will involve the discussion of meanings that are developed within the context of identities and relationships like family and peers, communities, social norms and structures, and that these phenomena are interdependent.

Therefore, the pregnant woman who lives in Durban and drinks alcohol may not necessarily be doing it of her volition. There may be some socio-cultural factors that affect and influence her behaviour. The outcome and experiences of that behaviour can affect her relationships with family, colleagues and friends. It can also affect her community and the structures embedded in the community like the communication framework, and health care systems particularly the antenatal clinic.

From the culture-centred approach to social change, allowing the pregnant women voices to come afore through consulting with them is important because it allows them the opportunities to interact in processes aimed at locating their social development challenges as much as they can articulate answers to these problems (Dutta, 2011). In the (South) African perspective, culture and beliefs exercise a huge influence on the thoughts and actions of people (Ovens, 2003) including maternal drinkers of alcohol. Based on this reality, this study seeks to gain a deeper understanding of the sociocultural factors that influence drinking alcohol, and the role communication can play in addressing those factors. The study takes

the position that communication should promote an environment of interaction with pregnant women which is necessary for evolving a participatory health communication approach that will address the socio-cultural factors (Estrada *et al*., 2018). Thus, the tenets of the culture-centred approach being culture, agency and structure are apt in this regard as culture affects people's health behaviour (Dutta, 2008 Airhihenbuwa, 2010, Airhihenbuwa *et al*., 2014, Dutta and Thaker, 2016).

The culture-centred approach also cautions that the focus of every research should be on the subaltern community rather than erroneously playing into the communication construct and narratives of the power elite (Dutta, 2015). He further argues that researchers should resist the mainstream development and communication approach and agenda encouraged by the power structure, and decentralised and de-colonised the process by getting the subaltern communities involved (Dutta, 2015) in the communication for social change. This researcher relied only on the dialogue had with the pregnant women who drink alcohol to allow them to express how best to serve their interest in communicating with them, and the appropriate message that will resonate with them and empower them to choose a channel that will address their communication needs.

Conclusion

This chapter has discussed the mobilisation of participatory health communication based on the framework of the Social and Behaviour Change Communication (SBCC) and Communication for Social Change (CFSC) through the lens of a culture-centred approach. Using this lens, this study advocates that pregnant women who drink alcohol in Durban should be involved in an iterative and dialogic manner so that the sociocultural factors that influence them will be identified. This chapter also discussed and justified the preference of the culture-centred approach as the model to interrogate the structures, culture and agency that can inhibit or give voices to the pregnant women to appreciate the factors that serve as influences on them in making informed health choices and decisions. The next chapter will discuss the methodological approach the researcher adopted in this study.

CHAPTER FOUR

METHODOLOGY

Introduction

The methodology has been described as the engine room of research (Govender, 2019) because it is the process that gives birth to data collection. This chapter presents a description of the research process. It discusses the research paradigm used to explore the phenomenon of alcohol use during pregnancy by women, and how their experiences are interpreted based on the data collected. This research fits within the social constructivism paradigm and adopts a qualitative methodology approach, which is applied in conceptualising the research design, towards facilitating the data collection and analysis processes to achieve the research objectives.

The chapter also discusses social constructivism as an epistemological paradigm argued by Kim (2006) as being the importance of culture and context in understanding what occurs in society and constructing knowledge based on this understanding (McMahon, 1997; Derry, 1999). This paradigm informs the discussion and analyses the phenomenon. The chapter also describes the various stages of the research, which included the selection of respondents, the data collection process, and the process of data analysis.

Ethical considerations are discussed to show the validity and reliability (Woodrow, 2014) of the research, with discussion on the consent from the participants, and the type of interview approach adopted. The data collected was analysed using the Applied Thematic Analysis (ATA)[23] by Guest, MacQueen, and Namey (2012).

Research paradigm

A research paradigm is characterised through the ontology of what is reality, and the epistemology of how this reality is known (Guba, 1990). This study is ontologically and epistemologically located within the cultural studies of social constructivism/interpretivism perspective (Denzin and Lincoln, 2005) informed by Paula Saukko's (2005) integrative

[23]Applied Thematic Analyis by Guest, MacQueen, and Namey (2012) is referred to as ATA

analytic framework that interlaces different epistemological positions within the qualitative research paradigm.

Describing the epistemological positioning of research is important for, among others, supplementing researchers' perceptions when defining the focus and aims of studies, when collating and designing the research approach, and in articulating characteristics of participants, or groups of participants sought to contribute to specific research (van Nierkerk 2005). Hoffman (1981) explains that epistemology reflects rules that people use to make sense of their world. Aurswald (1985) expands this by asserting that epistemology is a set of imminent rules used in thought by large groups of people to define reality and is the study or theory of the nature and grounds of knowledge.

The research paradigm used for this study employed for this study is social constructivism (Kuhn, 1962). According to McKinley (2015), social constructivism is a learning theory that is based on the ideas of Vygotsky (1978) which says that human development is socially situated, and knowledge is constructed through relating with others. He argued that the formation of constructivist ideas is when two people's ideas concur with their experiences and that writers mobilise their sociocultural consciousness as a key point in building their identity.

Social Constructivism evolved from a constructivism paradigm and is closely aligned with the theories and works of Jean Piaget published in 1936 (Butts & Brown, 1989). Piaget (1936) states that learning involves individual constructions of knowledge, and describes learning as occurring through interactions with one's environment and culture, which forms the basis of their experiences. It is also associated with the development theories of Vygotsky and Bruner, as well as Bandura's social cognitive theory (Kim, 2001). Vygostky (1978) argues that learning is a social construct that is facilitated by language through social discourse, and it stresses the principal role of communication and social life in meaning configuration and cognition (Boudourides, 2003), and it also foregrounds the co-construction of knowledge by learners (Taylor *et al*., 1997). This means that learning is not just an internal procedure, nor an inactive shaping of behaviours.

Creswell (2009) asserts that social constructivism serves as a useful theoretical framework as it allows necessary qualitative analysis to reveal insights on how people interact with the world. Collins (1981) sees social constructivism as a philosophical approach to study that tends to suggest that the natural world has a small or non-existent role in the construction of scientific knowledge, and Earnest (1999) believes that knowledge is a creation of cultural and social construct, and it agrees that individuals create meaning through relating with each other and their communities. It advances that learning is a social process (McMahon, 1997) that occurs when people engage in social activities.

Social constructivism has its roots in the 1932 work of Alfred Schutz titled *Phenomenology of the Social World* (Michael Barber, 2012; Dermot Moran, 2017) and was popularized in the United States of America (USA) by Peter Berger and Thomas Luckmann in their 1966 book, *The Social Construction of Reality*. Social constructivism agrees with interpretivism that meaning is formed and negotiated by humans, and also concur on the same objective of understanding lived experiences. However, social constructivism is different from interpretivism, maybe, a more far-reaching adaptation of it because it stresses language and interactions as intermediaries of meaning. It also brings the ambivalent sense that concepts, however socially constructed, correspond to something real in the world, which reflect in our knowledge.

Social constructivism serves as the position and paradigm that informs the data collection process and the interpretation after the interviews with the pregnant women as members of a group with their realities and voices (Kim, 2001; Kukla, 2000). From these definitions, perspectives and appreciation of social constructivism by various scholars (Kuhn, 1962; McKinley, 2015; Butts and Brown, Kim, 1989; 2001; Kukla, 2000; Creswell, 2009; Collins, 1981; McMahon, 1997), the researcher ensembled pregnant women through a recruitment process that ensured that they all drink alcohol, are within the age bracket of 18 to 35 years and live in Durban for a structured interview.

Their shared experiences helped the researcher in appreciating their sociocultural context as a community (Airhenbunwa, 1995; Dutta, 2011) as explained in chapter two, made meanings of their voices and constructed the kind of messages that they believed will resonate with

them to promote social and behavioural change through an acceptable communication medium, which is the objective of this study.

The phenomenon this research probed into is based on the experiences of Durban pregnant women who drink alcohol which is of human interest, and worthy for research purposes because of the consequences that it has on human existence like giving birth to a child with Fetal Alcohol Spectrum Disorder (FASD) according to Olufunto*et al*., (2015). Social constructivism emphasises the importance of sociocultural context in the process of knowledge construction and accumulation.

The researcher explored the maternal drinking phenomenon by collecting data through interview sessions with the pregnant women who drink alcohol and shared experiences of these women. It was from that interaction that an approach evolved to establish a sociocultural communication framework that provided a more nuanced understanding of how to address the phenomenon of alcohol consumption during pregnancy.

The researcher, therefore, made meanings of these interactions through interpretation that helped to construct the data from the experiences and backgrounds of the respondents (Thanh and Thanh, 2015). The interpretations were foregrounded from the data in the interviews with the pregnant women (Ritchie *et al*., 2013), through a qualitative methodology as there is a connection between the method and interpretative paradigm (Thanh and Thanh, 2015).

The researcher used the social constructivism design to explore the socio-cultural context of the pregnant women before interpreting the data from their experiences and background (Thanh and Thanh, 2015). To put the use of the social constructivism paradigm in perspective, Thomas, Menon, Boruff, Rodriguez and Ahmed (2014) reviewed the applications of social constructivist learning theories in knowledge translation for healthcare professionals through a study in Canada. They concluded that there is a strong constructivist underpinning that is used to produce information and knowledge within the broader knowledge translation process.

With particular reference to a study in South Africa, Pretorius and Stuart (2003) argue that social constructivism is necessary if any interpretation of the experience of HIV/AIDS has to

incorporate the effects of culture, gender and broader political structures on individuals' responses to and understanding of the disease. To this end, social constructivism is an important paradigm in health communication and health-related research. The experiences of the respondents in this study were understood and interpreted based on the sociocultural meanings, realities and influences that drive pregnant women to drink alcohol. The kind of messages that will resonate with them and how best to communicate with them was explored from their perspective during the interview.

This researcher employed the social constructivism position to probe into what the sociocultural factors that influence pregnant women who drink alcohol in Durban are, and from that knowledge, was able to evolve messages that will resonate with them during advocacy, and also the communication medium that will be effective in advocacy (Deacon *et al*., 2007; Than and Than, 2015).

Epistemology

The word epistemology is derived from the ancient Greek word *episteme*, which means knowledge, and, *logy* derived from the Greek word *logo*, which means discourse. Epistemology is, therefore, the study of the nature of knowledge, justification, and the rationality of belief. It speaks to the philosophical analysis of the nature of knowledge and how it relates to such concepts as truth, belief, and justification (Steup, 2005; Zalat, 2014; Borchert, 1967).

The data was gathered from structured interviews with pregnant women who drink alcohol in Durban, and that gave the researcher the lens to understand the discourse from their sociocultural perceptions, experiences, and choices and enabled the researcher to appreciate how behavioural changes can be socially constructed through understanding their sociocultural realities.

Knowledge is a creation of cultural and social construct (Earnest, 1999), and individuals create meanings through relating with each other and their communities. It postulates that learning is a social process (McMahon, 1997) that occurs when people engage in social

activities. Moon and Black (2014) argue that the relationship between a subject and an object can be explored on how the idea of epistemology influences research design.

In his work, Lubombo (2014) argues that epistemology becomes apparent and compelling when the researcher is relating with the participants based on the adopted approach. He that consequent on that epistemological premise of if the phenomena are divorced from the deeds of the researcher, participants are seen as partners in the creation of knowledge, or as inactive subjects in the study (Rubin and Rubin, 2005; Cater and Little, 2007; Snape and Spencer, 2003; Tomaselli, Dyll-Myklebust and van Grootheest, 2013). The qualitative approach is usually associated with the former.

This study is characterised by a relational epistemology as knowledge and meaningful reality are constructed in and out of the relationship between the participants and their world and is developed and put in a social context (Crotty, 1998:42).

There is a dismissal of an idea that objective truth exists be constructionist epistemology, rather they argue that truth or meaning comes to be based on our interactions with the realities that we deal with in our world. The real world does not pre-exist in isolation and is independent of human action or figurative language, to this end, the constructionist research is in general contextual appreciation of a defined challenge like maternal drinking in Durban (Moon and Blackman, 2014).

To this end, the phenomenon of maternal drinking exists because of the pregnant women who drink alcohol. But to understand the factors that influence maternal drinking in Durban, the researcher had to contextualise the study within the sociocultural realities of the pregnant women who live in Durban and drink alcohol. It was in this interaction that meaning was made and understood (Airhenbuwa, 1995; Dutta, 2011).

This researcher, therefore, agrees that knowledge is a social and cultural construct and that meanings are created through learning and interactions with the communities where the individuals live. To this end, this study will be approached from the epistemological standpoint of co-creating knowledge through interactions with pregnant women who drink alcohol. This point of view also informed the study using a qualitative research design, and

the structured interview to make meanings from their experiences and their sociocultural realities.

Ontology

Ontology is the philosophical study of the concept of being, existence, and reality (Abdelhamid Ahmed, 2008). There are however contradicting versions of the nature of reality namely objective reality and subjective reality, and these versions have divided social science research and disciplines (Hesse-Biber and Leavy, 2006). In his work, Lubombo (2014) agreed with the notion and submits that objective reality can be described as a positivist method to knowledge that is many times connected with quantitative research. It focuses on the possibility of the factual world with a singular, conventional, and demonstrable certainty or truth that researchers set out to observe.

Subjective reality contrarily illustrates that reality is fashioned from the discernment and resultant actions of the social actors and is believed to be the foundation of qualitative research. It honours the predictability of various socially constructed realities which relies on many perspectives or several points of view (Lubombo, 2014; Hesse-Biber and Leavy, 2006:177; Patton, 2002).

This position of this study is characterised by constructivism in the interpretive paradigm. Schwandt (1998) argues that the constructivist or interpretivist believes that to understand this world of meaning, it must be interpreted, and the researcher must articulate the process of meaning construction, and clarify what and how meanings are used in language. Constructivism in ontology argues that certain objects do not exist independently of the mind, but are constructed by the mind rather than discovered. Therefore, constructivists say that our submission of understanding of objective knowledge and truth is the outcome of perspective, and knowledge and truth that are produced and not discovered (Schwandt, 1998).

The researcher understood the phenomenon by making sense from the in-depth interview with the pregnant women who drink alcohol by first appreciating the sociocultural context of their being in Durban and the factors that influence their choices and decision to drink. This standpoint also influenced the use of the qualitative approach as the research design and the

use of interviews as the data collection tool, and this helped in interpreting and constructing the being and reality of the phenomenon.

The research participants' experiences and socio-cultural realities provided the researcher with the lens to analyse, appreciate and construct their being and reality in their respective socio-cultural contexts. He was able to understand how to communicate with them on the demerits of drinking alcohol while pregnant with an appropriate message, and through a medium that will resonate and make meaning to them as explained in chapter three. This construction of truth and reality is based on the framework of their socio-cultural context in Durban.

To this end, the researcher premised this study as a social inquiry whose ontological and epistemological paradigms employ the qualitative window to knowledge construction not simply because it is attractive to sociocultural inquiries and studies, but because it allowed an in-depth understanding of experiences of pregnant women who drink alcohol in Durban. It also offered a critical social analysis on how involving these pregnant women helped in not only understanding and appreciating the motivating sociocultural factors, but also in evolving an appropriate message that will resonate with them through their acceptable communication medium (Airhenbuwa, 1995; Dutta, 2011; Lubombo, 2014).

Qualitative Research Approach

This researcher adopted a qualitative approach, which is a scientific method of observation to gather non-numerical data (Greg *et al.*, 2013; Chong and Yeo, 2015; Pritha Bhandari, 2020). This approach was adopted because it captured the meanings, concepts, definitions, characteristics, and experiences of the Durban pregnant women who drink alcohol. In addition, the qualitative research approach helped to explore the phenomenon of maternal drinking and offer an in-depth analysis of the issue of pregnant women and alcohol drinking.

Qualitative research is analysed as a practice of appraising researched subjects in their natural environment, and then transforming and making logic of the studied phenomenon through the elucidation of gathered field notes, photographs, conversations, and other similar representations (Greg *et al*., 2013, Chong and Yeo, 2015). It is also concerned about an

individual's suppositions and principles; therefore, it tends to gather enriched data for interpretation (Hancock, 1998), and sometimes goes beyond just interpreting the data but also making meaning out of the data assembled from the interactions with the respondents and their respective population.

Qualitative researchers are committed to the naturalistic perspective and the interpretive and social constructivism understanding of the world or human experiences (Denzin and Lincoln, 2005; Lubombo, 2014). Different from quantitative research that places importance and reliance on numbers, qualitative research attempts to make sense by socially assembling phenomena in terms of the subjective oral and written expressions of meaning given by research participants as windows into their inner lives Denzin and Lincoln, 2005; Lubombo, 2014).

Kaya Yilmaz (2013) argues that qualitative and quantitative research are different based on their epistemological, theoretical and methodological underpinnings. He said that the quantitative approach is premised on the objectivist epistemology, while the qualitative approach promotes a viewpoint of constructivist epistemology, and the exploration of sociocultural contextualisation of phenomena, and describe the perspective of the people involved while recognising the relationship between the researcher and respondent based on the appreciation of the context.

It is important to state that the risk factors of pregnant women who drink alcohol have been examined quantitatively among South African women. However, there are no sufficient qualitative investigations that articulate and contextualise the underlying motivations, beliefs, and attitudes that influence these risk factors especially in Durban, KwaZulu-Natal (Olusanya, *et al*. 2015).

This method will be the best approach to understand the participants' sociocultural beliefs, experiences, attitudes, behaviour, and interactions with the phenomenon (Pathak *et al.*, 2013). It will, therefore, seek to interpret meaning from these data to add value to the understanding of the researcher on how to communicate in addressing sociocultural influences among pregnant women who drink alcohol in Durban, KwaZulu-Natal.

To underscore the efficacy and congruency of the qualitative approach, research was conducted by Van der Wulp*et al* (2012) in The Netherlands to gauge the experiences of Dutch midwives, pregnant women and their partners. It was discovered through in-depth interviews that the majority of the midwives revealed that they recommended complete abstinence for the pregnant women who drink alcohol; however, they did not provide pro-active but only reactive advice, when the pregnant women admitted alcohol consumption.

The use of qualitative approach and in-depth interviews employed in the research showed that the advice by the Dutch midwives to the pregnant women and their partners were unhelpful; it appeared to be judgmental and indifferent to the sociocultural context of the pregnant women. Understanding the socio-cultural circumstances of pregnant women before constructing a communication campaign is key. This is better understood and appreciated according to some authors, through having an interview with a qualitative research approach (Kaya Yilmaz, 2013; Kuhn, 1962; McKinley, 2015; Butts and Brown, Kim, 1989; 2001; Kukla, 2000; Creswell, 2009; Collins, 1981; McMahon, 1997).

In his work, Van der Wulp*et al* (2012) who approached the research from a constructivist paradigm using the qualitative approach and in-depth interview method advised on an introduction of standard advice about alcohol consumption for any pregnant woman. They also argued that alcohol use in pregnancy could change when information is not only directed to the pregnant women who drink alcohol, but also to their social environment through mass media campaigns. This recommendation draws from the usefulness of a qualitative research approach and in-depth interviews method.

Similarly, this researcher adopted the same qualitative approach and structured interview method to draw from the nuanced understanding of the experiences of pregnant women. The researcher also sought to understand the appropriate messages that will resonate with the Durban pregnant women, and how to communicate with them based on their socio-cultural context (Kaya Yilmaz, 2013; Kuhn, 1962; McKinley, 2015; Butts & Brown, Kim, 1989; 2001; Kukla, 2000; Creswell, 2009; Collins, 1981; McMahon, 1997).

Study Location

The location for this research was the antenatal clinic in King Edward VIII Hospital (KEH) that caters for pregnant women in Durban. This site was chosen because the research is located in Durban which is the largest city in KwaZulu Natal Province, and according to the 2020 population estimate of Durban, it has a population of 3.79 million people, with women making up 1.4 million (51%) of the population[24].

King Edward VIII Hospital was also chosen because according to the Department of Health in KwaZulu-Natal, it is a major provincial public hospital in Durban, it has been standing since 1936[25], and has been catering for the health and well-being of Durban dwellers, including the female population who use there for their antenatal care till date. Also, the antenatal clinic promotes an antenatal health programme of pregnancy and safe motherhood[26] which is a strong indication of care for pregnant women and their wellbeing.

Another consideration was that the hospital was the venue that hosted a study carried out by Manikkam& Burns (2012) to determine a high prevalence of antenatal depressive symptoms and thoughts of deliberate self-harm to ascertain and support a policy of routine screening for antenatal depression in South Africa, and KEH was chosen because of the high traffic of antenatal outpatients.

King Edward VIII Hospital (KEH) was built on a massive site of 42 acres and enjoys a heritage from both the Zulu and British royal families. The hospital was named after King Edward VIII, who abdicated the throne in 1936, a week after the opening of the institution, and it is situated in what used to be one of King Shaka's residences[27]. The building has a suitable space for a study (Gagnon, Jacob & McCabe, 2014).

King Edward VIII Hospital has 852 beds with +/- 22, 000 outpatients monthly in 33 wards. It is a tertiary level hospital that provides antenatal and health services to the whole of KwaZulu-Natal and part of Eastern Cape which made it apt for the study since the target and

[24] https://www.statista.com/statistics/1127496/largest-cities-in-south-africa - Accessed December 15, 2020
[25] http://www.kznhealth.gov.za/KingEdward/history.htm - Accessed on August 1, 2020
[26] http://www.kznhealth.gov.za/KingEdward/Newsletter/March-2019.pdf - Accessed August 1, 2020
[27] http://www.kznhealth.gov.za/KingEdward/history.htm - Accessed on August 1, 2020

accessible population were readily and purposively available (Gagnon *et al*., 2014; Asiamah, Mensah mandating-Abayie, 2017).

It is also the teaching hospital for the University Of KwaZulu-Natal Nelson R. Mandela School Of Medicine and has a Nursing College. Ross, Naidoo and Dlamini (2018) in a study affirmed KEH as a veritable and accredited hospital by the Health Professions Council of South Africa (HPCSA) to train health professionals and interns. The proximity, history and service delivery of the antenatal clinic service informed the choice of the venue of the study location.

In a national survey done by Peltzer, Davids and Njuho (2011), efforts were made to measure the extent of alcohol use and problem drinking among South Africans from the ages of 15 years and older. The participants from KwaZulu-Natal that took part in the survey were 20.2% of the survey population. The study agreed with the South African Demographic and Health Survey (SADHS, 2016) that big cities like Durban showed that women who engage in risky or harmful drinking were associated with an urban dwelling. In another study to ascertain the prevalence and correlation of alcohol consumption among HIV-positive pregnant women in KwaZulu-Natal, it was stipulated that, of the 1,201 women evaluated, 18% reported drinking during pregnancy, and 67% of drinkers usually binged when drinking (had 3+ drinks in one sitting). Over one-third of the drinkers binged two times in a month or more. Women who live in urban and peri-urban locations were more likely to drink, also the women with higher economic status and superior social engagement. The study also stated that married women were less likely to drink, and women who had a greater history of sexual risk-taking were more likely to drink (Desmond *et al*., 2011).

According to Desmond *et al*. (2011), health care workers in KwaZulu-Natal must be conscious of the fact that maternal drinkers always do so at the risk of babies by ingesting a high level of alcohol. They also argued that factors connected with drinking point towards sociocultural environmental influences that need counteraction by better distribution of information about the dangers of drinking, and greater support for abstinence or moderation.

Sample Population

In his work on a sample population, Donald Polkinghorne (2005) asserts that the population required for a qualitative study is selected to provide "…substantial contributions to filling out the structure and character of the experience under investigation (p, 1)". Such contributions can only be drawn from fruitful archi-types of the phenomena under investigation (Polkinghorne, 2005, Rubin and Rubin, 2005), and must possess some common characteristics that were defined by the sampling criteria and in this case, established by this researcher.

Researchers should distinguish between general, target and accessible populations (Asiamah, Mensah and Oteng-Abayie, 2017). By not properly delineating between the three can affect the credibility, which is the essence of a research study. This delineation they argued is necessary to put the sample population in perspective to justify the data collected (Asiamah*et al.,* 2017).

The general population is the entire population of individuals with a characteristic of interest, while the target population is the group of individuals that the intervention intends to conduct research in and draw conclusions from (Turner, 2013). It is also the entire aggregation of respondents that meet the designated set of criteria (Burns & Grove, 1997)

While the researcher intended to research pregnant women who drink alcohol as a general population, the researcher was also guided with the research objective which is to underscore the role of communication in addressing the sociocultural factors that influence the behaviour in Durban as explained in chapter two. The researcher then set out to achieve a sample population being the selected pregnant women based on the inclusion criteria. The accessible population were the ones that were eventually chosen for participation in the study based on their consent.

The target population required for this research are pregnant women who drink alcohol. The researcher therefore further established inclusion criteria to define the demography of the pregnant women to be those who live in Durban to appreciate their sociocultural context. Research participants had to be between the ages of 18 and 35 years, which is a good

productive age for women according to the American College of Obstetricians and Gynaecologists (2018). In addition, women in this age group are mature to narrate their experiences as identified also by the South Africa Demographic and Health Survey 2016 Key Indicators Report on Alcohol consumption and risky drinking by women.

Selecting a suitable sample size for qualitative research requires some guidelines as it is an important indication of the quality of the research. Sample adequacy is the appropriateness of the sample composition and size. They submitted that it is important in qualitative research to establish the trustworthiness of the research (Sandelowski, 1996; Spencer, Ritchie, Lewis and Dillon, 2003; Fuschand Ness, 2015; Robinson, 2014).

The sample population in qualitative research tends to be small to support the depth of contextual and experiential analysis of the respondents that is fundamental to the mode of inquiry through the in-depth interview (Sandelowki, 1996). Credibility was not, however, compromised because the focus of qualitative research is not to study participants to make any generalisations about a larger population or place from which participants are selected but to gather rich data that will validate the research (Lubombo, 2014).

Apart from the insight that the research participants offered to the discourse, their availability and willingness to discuss the issue conveniently was another consideration for them to reflectively discern aspects of their own experience and to effectively communicate what they discern through (a mutually intelligible) language (Polkinghorne, 2005). The sample size targeted in this research for structured interviews were 30 participants, to attain sufficient, rich, and extensive data. Qualitative research usually employs few participants that can provide the required contextual insight into the research (Snape and Spencer, 2003; Rubin and Rubin, 2005).

Sampling Method

Researchers employ sampling methods that provide them with an approach that can best extract information for their studies (Taherdoost, 2016). Etikan and Bala (2017) submit that sampling can be used to make inferences about a population or to generalise about existing theory, and it depends on the choice of sampling technique.

In taking steps to define and recruit samples for academic research, it is important to ensure the validity and replicability of qualitative studies and to avoid bias into research findings because of poorly selected participants (Guetterman*et et al.* 2015; Benoot*et et al.* 2016). To achieve this, the researcher defined the population to be pregnant women who drink alcohol in Durban (see chapter two), and thus narrowed the choice purposively to a sub-set of the population in King Edward VIII Hospital (Taherdoost, 2016; Etikan and Bala, 2017).

This study, therefore, employed a purposeful sampling method as proposed by Patton (2002) to identify different categories of participants. He said that purposeful sampling strategies for primary research were used to describe the logic of purposeful sampling techniques as:

> Lying in selecting information-rich cases for study in-depth. Information-rich cases are those from which one can learn a great deal about issues of central importance to the purpose of the inquiry, thus the term purposeful sampling. Studying information-rich cases yields insights and in-depth understanding rather than empirical generalisations (Patton, 2002, p.230).

It is a non–random method, but a deliberate method to choose the participants because of desired qualities that they have which is suitable for the research objective. The sampling method does not require any theory to determine the population, but for the researcher to make contact once the received gatekeepers' letters were received from the approving institutions.

The researcher then purposively identified the participants who were willing to be part of the research effort based on their experience on the research topic. The researcher explained the informed consent form (appendices 1 & 2) with an understanding that participants can discontinue the research if they are no longer comfortable with it (Bernard, 2002; Creswell *et al.*, 2011).

Pregnant women between the ages of 18 and 35 years were the ones that signed the informed consent form. The justification for this age group is based on three studies:

1. The South Africa Demographic and Health Survey 2016 Key Indicators Report on Alcohol consumption and risky drinking by Women also focused their survey on the same age bracket
2. The second study was on the Maternal Alcohol Use during Pregnancy in a General National Population in South Africa Survey conducted by Peltzer and Pengpid, (2019)
3. The third study is on the productive years of childbearing for a woman (The American College of Obstetricians and Gynaecologists, 2018).

Inclusion and Exclusion Criteria

The inclusion and exclusion criteria for the participants are stated in the table below:

Table 5.1 showing the inclusion and exclusion criteria

S/N	Inclusion Criteria	Exclusion Criteria
1	The participant must be a pregnant woman between the ages of 18 and 35 years old because that is not only a legal mature age but will be able to narrate their experiences and are in their most productive age (American College of Obstetricians and Gynaecologists, 2018)	The participant must not be below the age of 18, and must not be above the age of 35
2	The participants must attend antenatal at the research location being King Edward VIII Hospital in Durban	The participant is excluded if she is not attending antenatal clinic at the research location
3	The participants must be residents of Durban and surrounding areas irrespective of their racial, marital, and socioeconomic background, and she drinks alcohol	The Participant is excluded if she lives outside Durban and does not drink alcohol
4	The participant is included if she drinks alcohol	The participant is excluded if she does not drink alcohol
5	The participants must either speak English or isiZulu languages	The participant is excluded if she does not speak English or isiZulu languages

Recruitment: Engaging with the gatekeeper King Edward VIII Hospital staff

The researcher contacted the research office of KEH, and an indemnity form was signed approving access to the respondents at the Antenatal Clinic (ANC) at KEH. The research office thereafter referred the researcher to the administration block to meet the matron at the Obstetrics & Gynaecology department. The matron took the researcher to the ANC where a meeting was held with the matron, and the head of the antenatal nurses on the conduct of the data collection. It was stressed that the participants should not be put under any kind of stress because of their emotional state, and the interviews should not belong.

Due to the sensitivity of the topic, the researcher assured them of the caution of not having an interview that will be long and cause distress to the participant as also stated by Suzanne Mooney (2014) and Lou Clark (2017) in their study on interviewing vulnerable groups. The researcher acknowledged the importance of protecting the participants from secondary psychological trauma by ensuring all participants know their rights to enclose and disclose what they are comfortable with. A psychologist was also engaged to be available for counselling (Appendix 3) should any of the participants require post-interview counselling other than the one being provided at the antenatal clinic. A toll-free counselling service was made available for the participants should they feel they want to contact the psychologist in private. After the assurances, an office was then provided for use.

However, the participation of the participants was protected using an informed consent form in English and isiZulu (Appendices 1 &2) which was given to them, and it explained the premises of the study, the aims, and objectives and how the data will be collected. The informed consent form also explained to the participants that their involvement in the study is voluntary and that they had the right to withdraw from the study at any point. The researcher also informed them that they would be identified as participants rather than their real names and that their biodata was treated with the utmost confidentiality. This information allowed them to make informed, the un-coerced decision about participating in the study.

The recruitment of the respondents was done in line with ethical standards. The researcher and procedure adopted respected the rights of the participants, guided, protected, and ensured that the interests of the participants were paramount (Neuman, 2014). The recruitment strategy involved having a meeting with the head matron in the gynaecology and obstetrics unit, and the head of the antenatal clinic who coordinated the introduction of the researcher to the participants. The researcher was allocated a private office to coordinate the procedure of identifying and recruiting the participants.

The participants, who do not understand and speak the English Language, were communicated within isiZulu by a female research assistant. The researcher recruited an isiZulu female because of language and gender sensitivity which the researcher was mindful of throughout the research process (Ingeborg, Börnhorst, Günther and Brand, 2014; Clark, 2017). The researcher informed the participants of their rights to participate or withdraw from the research.

Data Collection

Data Collection is the process of gathering and measuring information from participants in an established systematic manner that will enable the researcher to answer the stated research questions, and evaluate outcomes (Gill *et al.*, 200). The researcher adopted the interview approach because the purpose was to explore the views, experiences, sociocultural beliefs and motivations of the pregnant women on the sociocultural factors that influence them to drink alcohol, the appropriate messages that will resonate with them, and how to communicate with them. Interviews are believed to provide a deep understanding of social phenomena than would be obtained from purely quantitative methods, such as questionnaires (Silverman, 2000). The topic of alcohol consumption by pregnant women has been studied before, but from a quantitative approach, therefore the significance of this study is to provide a nuanced and exploratory study of the factors that influence this and the communication methods that may best mitigate it.

Structured Interview

Due to the sensitivity of the topic and the emotional state of the participants, the researcher adopted the structured interview approach which will not subject them to a long session that might cause trauma. A structured interview is a technique for knowledge acquisition. It is a qualitative research methodology that enables the researcher to develop an interview schedule that itemises the wordings and sequencing of questions (Kvale and Brinkman, 2008; Lindlof and Taylor, 2002; Patton, 1991). According to Lindelof and Taylor (2002), interview schedules can be considered as a way of increasing the reliability and credibility of the research data.

A structured interview is goal-oriented in the sense that it encourages a systematic approach in the exchange between the researcher and the participants to extract information for review and interpretations (McGraw and Harbison-Briggs, 1989; Agarwal and Tanniru, 1990). However, in practice, the researcher can ask to follow up questions to any part of a response by the participant (Agarwal and Tanniru, 1990), and Mathers, Fox and Hunn (1998) also argued that it is not unusual for a structured interview to have a few open-ended questions to capture additional information for analysis.

The interviews were recorded on an electronic recording device. The structured interviews took place at the antenatal clinic of King Edward VIII Hospital in Durban between December 18 and 19, 2019. Through visitations to the antenatal clinic before obtaining approval started on the 16 of December 2019, and after the structured interview, there were visitations for follow up and clarification till 23 December 2019 while other clarifications were done on the telephone. At the end of the sessions, the research assistant translated the interviews done in isiZulu into English before transcribing them.

Using Applied Thematic Analysis (ATA) for Data Processing

This study used Applied Thematic Analysis (ATA) for the data analysis approach (Guest, MacQueen and Namey, 2012). ATA was adopted to gather the emerging themes and patterns from the interviews and to analyse the data and achieve the research objectives. Guest e*t al* (2012, p.14) explain that:

> The approach borrows what we feel are the more useful techniques from each theoretical and methodological camp and adapts them to an applied research context. In such a context, we assume that ensuring the credibility of findings to an external audience is paramount, and, based on our experience, achieving this goal is facilitated by systematicity and visibility of methods and procedures.

Using ATA, the researcher identified codes from the text and transferred them into the codebook. The codebook is where the researcher listed and defined codes that guided his keeping track of how the codes are used, and how the researcher made sense from the data. The researcher also counted some words and phrases from the data to serve as a basis for a preliminary quantitative data presentation to inform the qualitative analysis.

ATA is pragmatic, rigorous and inductive, yet it draws from different theoretical and methodological perspectives. It is not restricted to using grounded theory where theory is built from the data, or to phenomenology that deals with subjective human experiences, it also includes subjects on social and cultural phenomena (Guest *et al.*, 2012). The researcher however used social constructivism to interpret the data because it is a qualitative study.

The major objective of ATA is to provide answers to research problems in a practical way, and this underscores why the term applied is used in front of thematic analysis. ATA shares the inductive qualities of grounded theory (Corbin and Strauss, 2008; Glaser and Strauss 1967) where themes and theories emerge from the data. In this way, the thematic development is consistent and congruent with the data, and the analytic approach is organised in terms of data processing. In this research approach, it is the participants' perceptions, feelings, and lived experiences that are paramount and that are the object of study as it is a qualitative study, thus, its concerned with the lived experiences of the participants.

ATA also relates with interpretivism which social constructivism shares a qualitative approach, because it is concerned with a more penetrating meaning in discourse and understanding multiple realities that are represented in a collection of personal narratives or observed behaviours and activities (Geertz, 1973). The interpretivist paradigm believes that

reality is multi-layered and complex, and a single phenomenon can have more meanings, and researchers gain a deeper understanding of the phenomenon and its complexity in its unique context instead of trying to generalise the base of understanding for the whole population (Creswell, 2007).

While ATA is a qualitative design approach, it allows researchers to apply the principles that positivism holds so that interpretations are developed from the data. To this end, the use of measurement and quantification is encouraged. ATA as argued uses quantitative techniques, in combination with interpretive and other techniques, to confront a research problem from a qualitative perspective (Guest *et al.,* 2012). However, for this study, the ATA will use a quantitative data presentation to inform the qualitative analysis. After the data collection stage, the researcher was guided by the four phases (initialisation, construction, rectification and finalisation) of data and theme development as articulated by Vaismoradi*et al.* (2016) to present, organise and explaining the ATA processes used in managing the data.

Phase 1: Initialisation

In their ATA work, Guest *et al.* (2012) describe data as the textual representation of a conversation, observations or interaction gathered together for analyses. This research adopted a structured interview as a basis of taking data collection. The researcher in this study thus commenced the development of a codebook which is the step-by-step process where the observed meanings from the literature and data are written down into types and categories according to their relationship in terms of meaning. The literature and data are read iteratively, re-read and corrections made to suit codes and categories, or even new insights and information that are gained.

To develop a codebook (Appendix 4), the researcher relied on the guide of Guest *et al.*, (2012). The researcher read the transcribed interviews over again, and also read his field notes, while noting his research objectives and questions. Occasionally, the researcher stopped to tag data based on the theme that was emerging. The researcher hereafter considers the meaning of the text and how it links to the theme.

The research questions and objectives, literature from previous research on factors that influence maternal drinking were used as a guide in developing the pre-defined codes (pre-defined codes are converted information like letter, word, image or idea from literature and relevant theories for use in this research work) in the codebook.

The first step the researcher took was to get to know the data by familiarising himself with the recorded interviews. It is important to get a thorough overview of all the data collected before the commencement of examining individual items. This involved transcribing audio, reading through the text, and taking initial notes, and generally looking through the data to get familiar with it. The interviews were recorded in an electronic device, and observations notes were also taken to note the researcher's field experience.

The researcher thoroughly reviewed the observational field notes and the recorded interviews. Then the researcher transcribed interview recordings into written notes. Transcribing is a process of converting the oral interview conversation into a written format that is agreeable for closer analysis (Kvale, 1996). Transcribing is the primary step of analysis where researchers can have an overview of the data by immersing themselves in it. This researcher immersed himself in the data and reviewed it over again. The researcher did the transcribing of the interview done in the English language himself and reviewed the data again. The interviews conducted in isiZulu were transcribed by the research assistant who is female and Zulu. Thereafter, the researcher immersed and familiarised himself with the data together with the research assistant, comparing them with the observation notes taken.

The researcher then went beyond counting explicit words or phrases and focused on the identification and descriptions of implicit (deductive) and explicit (inductive) reasoning within the data (Guest *et al*., 2012) to contextualise the approach of this research.

Logical Reasoning in Contextualising the Research Approach

Applied Thematic Analysis is a type of inductive analysis of qualitative data that can involve multiple analytic techniques (Guest *et al.,* 2012). The researcher, therefore, applied the inductive and deductive approach to put the data in perspectives that are suitable for this study.

The proponents of ATA further state that: "it is what you do with qualitative data, and not the methods themselves, that define whether you are engaged in a research endeavour that is interpretive, positivist, or a hybrid of the two" (Guest *et al*., 2012, p.5). The approach in this research fuses three realities arising from the dialogue between the researcher and participants (being the pregnant women who drink alcohol in Durban); lived experiences of the participants; as well as the historical context in which their experiences are located.

The dialogic conversation with the respondents was interpreted and appreciated based on these lived experiences. The researcher recognised the fact that he was involved in the construction of reality as presented by the respondents while designing and presenting the research (Saukko, 2003; Denzin, 1997). Also, he acknowledged that there was a biographical positioning of him, and the respondents as social actors. Therefore, from observations during the interview, the researcher viewed the conversation as being influenced by the way social discourses or cultural values characterised or mediates how people should interact as human beings (Lubombo, 2014).

Another motivation the researcher employed in the discourse is the understanding that though the respondents and the researcher are from different cultures, they recognised that they are working together to achieve a common purpose. Since this study was interested in establishing the role of communication in addressing the sociocultural factors that influence pregnant women who drink alcohol, assessing the contextual, historical, socio-cultural development and realities were key, and then working together to achieve a purposeful outcome.

The researcher then searched for explicit (inductive) codes from interview data that was generated from the structured interviews with the pregnant women, and implicit (deductive) codes from literature in chapters two and three, and theories guided by Participatory Health Communication and Culture-Centred Approach (CCA) theories as explained in chapter four.

Phase 2: Construction

According to Guest *et al.* (2012), coding is the linking of specific codes to specific data segments. Coding according to Vaismoradi *et al* (2016) is an element of data organisation.

This organisation assisted the researcher to construct the codes and clarify inductive and deductive data. The codes were defined with meanings given within the context of this study (See Codebook as appendix 4)

The researcher created a coding rule that a code that was resident in the data (interview extract) was organised into inductive, and the ones that were inferred from pre-defined codes (pre-defined codes are converted information like letters, words, phrases, images or ideas from literature and relevant theories for use in this research work) in the codebook were organised as deductive. The point is to organise them into logical segments so that the data can be distinguished into different codes. He as well thoroughly reviewed the observational field notes and the recorded interviews before and after the transcription. All these were before deciding on what to extract from different participants based on the research objectives and questions; put them in identical tables according to the research questions to link them with respective pre-defined codes.

As explained by Guest *et al* (2012), codes are a textual description of the semantic boundaries of a theme or a component of a theme. It is a word or short phrase that metaphorically assigns a collective, significant, essence-capturing attribute of a portion of language used while making a narrative about the data (Saldana, 2009). Each code describes the idea or feeling expressed in part of the literature used and allowed the researcher to gain a condensed overview of the main points and common meanings that recur throughout the data. After that, there was a need to code the data by extracting sections from the literature being phrases or sentences, and coming up with codes to describe them. This is explained further in chapter five.

The researcher made a numerical and percentage biographical representation of the participants (being the pregnant women who drink alcohol in Durban) to establish their population in terms of age, marital status, employment status and educational level. He also presented the frequencies and percentages by respondents on what and how they preferred issues that would affect them.

The allocation of values was done to justify the analysis in an objective method to guide the researcher's understanding of how to communicate, what type(s) of a message to communicate, and the channel or medium the communication should adopt and address the sociocultural factors that influence maternal drinking (Neuman, 2003). ATA allows and encourages analysis of data from a quantitative point of view based on the positivism paradigm through word count by applying arithmetic and numerical techniques to determine frequencies of the data as it is necessary (Guest *et al.*, 2012)

In line with the submission that ATA (Guest *et al.*, 2012) can take a positivist approach sometimes to report numbers and percentages to provide a more objective and numerical value for analysis. This researcher mobilised this analytical approach because it is pragmatic, and it will not only present proportions of participants who prefer a certain approach and model, it will justify it numerically. It will also present the distribution of the participants' demography numerically and proportionally to justify the quantum of the pregnant women who drink alcohol, their preferences in terms of messages and channels and their perception of the research objectives. It will also present their respective statuses for more objective impact analysis and significance in the study.

Phase 3: Rectification

This stage, according to Vaismoradi*et al* (2016), is the process of checking again to see if any data was not illuminated. The researcher reviewed the whole process of initialisation and construction again by immersing himself in the process, and then started relating emerging themes to knowledge gotten from various literature and the theories, and then categorised the data. Category refers to the descriptive level of the literature, and its explicit manifestation of the participants' interview extract (Draucker, Martsolf, Ross, 2007; Vaismoradi, Jones, Turunen and Snelgrove, 2016).

The categorisation is a constituent of the qualitative data analysis through which scholars endeavour to cluster observed patterns in the data gathered into meaningful categories. Through this process, categories are created by assembling and chunking groups of

previously coded data. Chunking is taking an individual piece of information or data and grouping them into larger units (Vaismoradi, Jones, Turunen and Snelgrove, 2016).

The researcher read the codes over again to place them into explicit (inductive) and implicit (deductive) categories. The explicit categorisations were ideas that came from the data set while doing the data segmenting (the process of taking the data and dividing them up and grouping similar data based on the chosen parameters so that you can use it more efficiently). These facilitated the development of themes. For instance, personal disposition, peer and social group (Ghuman*et al*, 2012), and family pressure (Ojo *et al.*, 2010) are some of the codes that fit into the sociocultural influence as a deductive category.

The researcher related the themes to established knowledge-based on literature and theories. According to Guest *et al* (2012), a theme is a unit of meaning that is observed or noticed in data. Saldan (2009) sees a theme as a phrase or sentence that identifies what a unit of data is all about, and what it means. A theme is abstract and it links expressions from the data (Ryan and Bernard, 2003). Themes are generally broader than codes and categories, and the combination of several codes forms a single theme. Nevertheless, to develop a theme, iterative or forward-backwards movements and comparison of code clusters about the whole data are required (Vaismoradi*et al*., 2013, 2016).

Phase 4: Finalisation

According to Vaismoradi *et al* (2016; 2019), the finalisation phase is the point at which researchers write their findings and connect the various themes to the research questions. The write up of findings can take the form of a "storyline" that gives a holistic view of the study phenomenon (Vaismoradi *et al*, 2016; 2019). This phase is useful to demonstrate the possible theoretical data saturation as the conventional principle of finalising data collection and analysis.

This "storyline" provides an opportunity to discuss how the study was executed and the process of data analysis, and suggest further ideas for data collection to improve saturation of theme. The storyline developed at this stage is based on the data from the interview with

the pregnant women who drink alcohol in Durban and addresses the sociocultural factors that influence them.

Trustworthiness of data

The epistemological position that knowledge is socially constructed and not discovered informed the collection and analysis of data which influenced the researcher's perceptions and interpretation of the contextual meanings emerging from the findings (Van Nierkerk 2005).

Some positivist researchers have often wondered how reliable the data of an interpretivist/social constructivist researcher will be since it is not based on empirical interpretation, but rather meaning interpretation by the researcher. This, therefore, calls for the case of trustworthiness of the data of a qualitative researcher.

Trustworthiness according to Sandelowski (1993) should not be viewed from the standpoint of a positivist researcher but should be seen from the judgment the interpreter gives it as long as it conforms to the element as articulated by Lincoln and Guba (1985). Joko Gunawan (2015) also argues in the same line and counsels that the researcher should ensure rigour in the management of the data through a systematic process.

Susan Morrow (2005) also said that the rigour in qualitative research should be in tandem with the criteria elaborated by Lincoln and Guba (1985) to be credible, transferable, dependable and confirmable especially in a naturalistic inquiry. Korstjens and Moser (2018) in their work practical guidance to qualitative research agree on the same criteria as elaborated by Lincoln and Guba (1985), though they also made a point for reflexivity which is the self-reflection about the researcher's biases and preconceptions.

Lincoln and Guba (1985) posit that the trustworthiness of research is key in evaluating its worth. They argue that trustworthiness involves the establishment of credibility, transferability; dependability and confirmation of the research as fundamental elements in the trustworthiness of research.

For this researcher to confirm the credibility of the research data, the researcher employed the strategies outlined by Lincoln and Guba (1985) and Tracy (2010). The researcher spent time with the participants in the antenatal clinic, observing and inquiring about their sociocultural setting, to understand the kind of community the participants lived in.

The researcher also spoke with other pregnant women after the interview with the 30 participants who share common sociocultural settings to validate some of the participants' responses. Engagements and observations of the participants during the duration of the data collection provided the researcher with more depth on the sociocultural realities of the respondents.

For the researcher to address the subject of transferability, adequate literature was reviewed and the phenomenon was copiously described on the topic to get external validity as suggested by Lincoln and Guba (1985). Sufficient detail was given in all the text to show patterns, not just on the participants' experiences, but also in their sociocultural context (Holloway, 1997). From the broad description of the phenomenon, it, therefore, can be evaluated to the extent to which the conclusions drawn on the sociocultural factors that influence pregnant women to drink alcohol in Durban are transferable to other times, settings, situations, and people. The researcher demonstrated how the data were recorded and transcribed before commencing the systemic and procedure of how the data were applied by disclosing the methods of data presentation and analysis, detailed enough for the reader to determine the credibility of the process (Newell *et al.*, 2017).

Ethical Considerations

The relationship between a researcher and research participants involves power and trust (Neuman, 2014). To this end, the researcher adopted ethical considerations to show the validity and reliability (Woodrow, 2014) of the research. The researcher obtained a gatekeeper's letter (Appendix 5) from the clinical department of King Edwards VIII Hospital (KEH) in Durban to research their antenatal clinic. Approval was also granted by the

Department of Health (DoH) (Appendix 6), KwaZulu-Natal (KZN) province, and the ethics committee of the School of Applied Human Sciences, College of Humanities in the University of KwaZulu-Natal (UKZN) in Durban, KZN (Appendix 7).

The researcher maintained the advice of the antenatal staff not to subject the participants to a long conversation that will distress them and also informed every participant of their right to either speak English or isiZulu and also to withdraw from the interview process anytime she feels like withdrawing. They were informed that their names would not be mentioned and that their identities would be kept in absolute confidentiality. Their consent was also gotten before the interviews were recorded. As earlier stated, all participants who declared their interest to participate also agreed to sign an informed consent form either in English or isiZulu (Appendices 1 and 2). They were provided with a comfortable environment for them to sit in throughout the interview sessions.

Conclusion

This chapter detailed the methodology employed in this study. It reviewed the paradigm that the researcher adopted which is social constructivism. It also reviewed the research design being the qualitative design. The chapter also discussed the sampling and the sampling population, and the importance of structured interviews as the method of data collection.

The chapter also discusses ATA as the data analysis tool mobilised to analyse the data through a phenomenological perspective. The chapter also discussed the use of inductive and deductive reasoning in making sense from the data and discussed how the researcher used initialisation, construction, rectification and finalisation as an organisational strategy to present the process of data processing as prescribed by ATA. The next chapter presents the data collected from the field, and to articulate the data with examples of how the meanings were developed.

CHAPTER FIVE

PRESENTATION AND MANAGEMENT OF DATA

Introduction

Qualitative researchers, no matter what data analysis process they employ, are solely responsible for ensuring the reliability of their research (Nowell *et al.*, 2017). This can be achieved by the researcher indicating how data analysis have been conducted through recording, systematising, and revealing the methods of analysis with enough detail to enable the reader to determine whether the process is credible (Nowell *et al.*, 2017).

This chapter presents the demographic information of the participants based on data gathered through structured interviews with pregnant women at King Edward VIII Hospital (KEH) in Durban, KwaZulu-Natal, who use alcohol. It also demonstrates the operationalisation of the applied thematic analysis, in that it presents the data by the pre-determined codebook (See Appendix 4) as described in Chapter Four.

The chapter also discusses the process adopted in organising the data using a defined coding procedure as the first step to understanding the relationships among emerging categories in the raw data and the conceptual framework of this study (Chong and Yeo, 2015).

Participant demographic data

The researcher conducted 30 interviews to gather rich data to achieve the research objectives of this research particularly understanding a communication approach that can address the sociocultural factors that influence pregnant women to drink alcohol.

The table below shows the biographic and demographic data generated from the interviews as items of analysis using small units of truth tables and frequencies (Bernard, 1996; Guest, *et al.*, 2012). It also shows the biological age, marital and employment status, the level of education, and the years the respondents have been resident in Durban.

Table 6.1: Demographic Profile of Respondents

No	PARTICIPANTS	BIOLOGICAL AGE	MARITAL STATUS	EMPLOYMENT STATUS	LEVEL OF EDUCATION	YEARS OF RESIDENCY IN DURBAN
1	PARTICIPANT 1	27	MARRIED	UNEMPLOYED	GRADE 8	10
2	PARTICIPANT 2	19	SINGLE	UNEMPLOYED	MATRIC GRADE 12	7
3	PARTICIPANT 3	31	SINGLE	UNEMPLOYED	MATRIC & PARAMEDIC	NOT DISCLOSED
4	PARTICIPANT 4	33	MARRIED	EMPLOYED	DEGREE	33
5	PARTICIPANT 5	26	SINGLE	UNEMPLOYED	MATRIC – GRADE 12	26
6	PARTICIPANT 6	35	DIVORCED	EMPLOYED	GRAE 11	35
7	PARTICIPANT 7	34	SINGLE	UNEMPLOYED	GRADE 12	1
8	PARTICIPANT 8	33	SINGLE	UNEMPLOYED	GRADE 12	4
9	PARTICIPANT 9	35	SINGLE	UNEMPLOYED	GRADE 10	10
10	PARTICIPANT 10	32	SINGLE	EMPLOYED	NOT DISCLOSED	28
11	PARTICIPANT 11	35	SINGLE	EMPLOYED	GRADE 10	10
12	PARTICIPANT 12	33	SINGLE	UNEMPLOYED	GRADE 11	33
13	PARTICIPANT 13	35	SINGLE	UNEMPLOYED	GRADE 11	7
14	PARTICIPANT 14	35	SINGLE	EMPLOYED	GRADE 12	35
15	PARTICIPANT 15	22	NOT DISCLOSED	EMPLOYED	MATRIC	22
16	PARTICIPANT 16	35	SINGLE	EMPLOYED	GRADE 12	14
17	PARTICIPANT 17	35	SINGLE	UNEMPLOYED	GRADE 11	4
18	PARTICIPANT 18	25	SINGLE	EMPLOYED	GRADE 12	8

19	PARTICIPANT 19	35	SINGLE	EMPLOYED	NOT DISCLOSED	9
20	PARTICIPANT 20	35	SINGLE	EMPLOYED	GRADE 12	13
21	PARTICIPANT 21	25	SINGLE	EMPLOYED	GRADE 12	18
22	PARTICIPANT 22	18	SINGLE	UNEMPLOYED	GRADE 12	1
23	PARTICIPANT 23	35	SINGLE	EMPLOYED	GRADE 12	10
24	PARTICIPANT 24	29	SINGLE	UNEMPLOYED	GRADE 12	8
25	PARTICIPANT 25	26	SINGLE	EMPLOYED	GRADE 12	10
26	PARTICIPANT 26	27	SINGLE	EMPLOYED	GRADE 12	15
27	PARTICIPANT 27	35	SINGLE	EMPLOYED	GRADE 12 – DIPLOMA	35
28	PARTICIPANT 28	23	SINGLE	UNEMPLOYED	GRADE 12 – DIPLOMA	4
29	PARTICIPANT 29	35	SINGLE	UNEMPLOYED	GRADE 11	6
30	PARTICIPANT 30	35	SINGLE	UNEMPLOYED	GRADE 11	9

The demographic data were further broken down into frequencies and percentages (some values are rounded to the nearest percentage point) which indicate age distribution, marital status, level of education and employment status of the respondents, as indicated in the table below.

Table 6.2: Statistical Distribution of Participants' Demography

Age Distribution in Values and Percentage

AGE 18 – 20	*AGE 21 – 25*	*AGE 26 – 30*	*AGE 31 – 35*
2	4	5	19
7%	***13%***	***17%***	***63%***

MARITAL STATUS

SINGLE	*MARRIED*	*DIVORCED*	*OTHERS*
26	2	1	1
87%	*7%*	*3%*	*3%*

LEVEL OF EDUCATION

BELOW MATRIC	*MATRIC*	*POST – MATRIC*	*DEGREE STATUS*	*OTHERS*
8	16	3	1	2
27%	*53%*	*10%*	*3%*	*7%*

EMPLOYMENT STATUS

EMPLOYED	*UNEMPLOYED*
13%	17
43%	*57%*

In line with the submission that ATA is a qualitative approach, but can sometimes take a quantitative technique to report numbers and percentages objectively (Guest *et al*., 2012). Table 6.2 shows that participants between the ages of 18 and 20 years make up 7%; those

between the ages of 21 and 25 make up 13%; ages between 26 and 30 years make up 17%; while the ages between 31 and 35 years make up 63%. The majority of the participants (87%) were single, while 7% were married, divorcees and other types of relationships shared 3%.

In terms of educational status, 53% of the respondents have matric (Grade 12), and respondents below matric with varied grades are 27%. Respondents with a university degree constitute 3%, and a post-matric diploma share 10%, while others constitute 7% of the sample, meaning they have never been to school. With employment status, 57% of the respondents are unemployed, while employed respondents are 43%.

Presentation of Interview Extracts, Pre-Defined Codes, Codes and Categories

The following table demonstrates how a selected pre-defined code has been developed from both the literature and theory that is relevant to this study, which forms part of the deductive process explained in the methodology. The researcher developed a codebook (Appendix 4) which provides information on the structure, contents and layout of the study with the definitions of codes and their meanings within the context of this study, the interview extract, the labelling of codes, the categories and the themes. The researcher also defined the deductive codes based on literature. The table below is an example, but the details will be discussed further in this chapter.

Table 6.3: shows an example of the formation of deductive codes

ACTION (PRE-DEFINED CODES)	DEDUCTIVE CODES	INTERVIEW EXTRACT	CATEGORY
Literature from NIAAA, (2008) on the personality trait	Personality Trait (NIAAA, 2008),	"I'm currently drinking alcohol but not always" …. "I started drinking in 2012, and I drink maybe after 3 months" …	Individual Behaviour *(The impact that personal decisions, actions and inactions have on the participants)*

Literature from ICAP, (2009) on Social factors	Social Factors (ICAP, 2009)	"I drink at parties when I'm with friends, at Kitchen party, baby welcome and Baby depart, and when I attend cultural events" ….	Group Influence *(The influence from peers and friends of the participants)*

Reading through the data, the researcher identified the emergence of other codes that are not directly in the literature word-for-word, though some are alluded to in literature, they are words from the data (interview extract), and these data informed the inductive codes.

The table below presents an example:

Table 6.4 showing an example of formation of inductive codes

ACTION	**INTERVIEW EXTRACT**	**INDUCTIVE CODES**	**CATEGORY**
Interview extracts from a participant state that she wants to receive messages	*"Yes, I want to receive the message…."*	Desire for message	Approach on communication (*A synergised strategy to disseminate messages to the participants*)
Interview extracts from a participant state that she will inform other pregnant women of the disadvantages of drinking.	*"...So that I can help others and tell them about the disadvantages of drinking when you are pregnant…"*	Desire to disseminate the message	

As stated in Chapter Three, the researcher adopted the ATA in the analysis of this study because of the unique features that it employs in enabling the researcher to include the

analysis of data from a quantitative point of view by applying arithmetic and numerical techniques to determine frequencies of the data as it is necessary (Guest *et al.*, 2012). This study used these quantitative techniques to determine the frequencies (being numbers of times the researcher counted a word or phrase with various interviews with the 30 participants and documented in the codebook) and proportions of the data developed from the word/phrase count in the interviews with the participants.

The quantitative is applied in addressing in the study's research questions three to investigate participants acceptable medium that can be mobilised in communicating and addressing these sociocultural factors that influence them to drink alcohol.

The table below shows the quantities and percentages (some values are rounded to the nearest percentage point) obtained from the data, and worked out to allow for quantitative and proportional presentations from the data:

Table 6.6: Words and Phrases Counted from 30 Participants' Interview on Acceptable Medium to Communicate

WORDS/PHRASES ***(USED BY 30 PARTICIPANTS)***	**QUANTITY** **(*THE NUMBERS OF TIMES PARTICIPANTS USED WORDS/PHRASES IN THE INTERVIEW AND WAS COUNTED)***	**PERCENTAGES** **(*PROPORTION CONSIDERED FROM PARTICIPANTS ROUNDING UP TO 100%)***
I want to receive the message through WhatsApp	18	60%
I want to receive the message through Facebook	14	47%
I want to receive the message through Short Message Service (SMS)	9	30%
I want to receive the message through Instagram	2	7%

I want to receive the message through Radio	7	23%
I want to receive the message through Television	8	27%
Community Engagement	3	10%
I want face-to-face communication	1	3%

From the enumeration of the interview extracts from 30 different participants on acceptable mediums (refer also to codebook, appendix 4), some of the participants had two to three choices of acceptable mediums. The researcher, however, accommodated all their choices in the enumeration to give every participant a voice.

Thus, 18 participants making up 60% wanted to receive the message on WhatsApp, while 14 participants making up 47% wanted to receive it on Facebook. Also, 9 participants making up 30% wanted to receive the message on Short Message Service (SMS), and 2 participants making up 7% wanted to receive the message via Instagram. The table further shows that 7 participants (23%) wanted the message on the radio and 8 (27%) want to receive the message on television. Also, 3 participants (10%) said community engagement was an acceptable medium, while 1 participant (3%) preferred face-to-face communication.

The tables also show various examples of how inductive and deductive codes were developed, and why the categories were labelled. It as well shows how the counting of the words/phrases that occurred in the interview extract was arrived at numerically and proportionally, the data corpus which highlights the formation of the codes and categories are attached in the codebook (appendix 4).

For presentation (see appendix 4), the researcher highlighted the interview extract and condensed the various codes into review comment boxes to associate the interview extracts

with participants from whom they were obtained. The total interview extracts came from 30 respondents, but some of them are tabulated randomly. They are, however, presented based on the respective research questions. The third research question has numerical and proportional presentations as a sub-table to research question three.

Below are examples of the formation of the codes after they have been pre-defined from literature and the extract from the interview by participant 12.

Figure 6.1: Interview Extracts and the Code from Participant 10

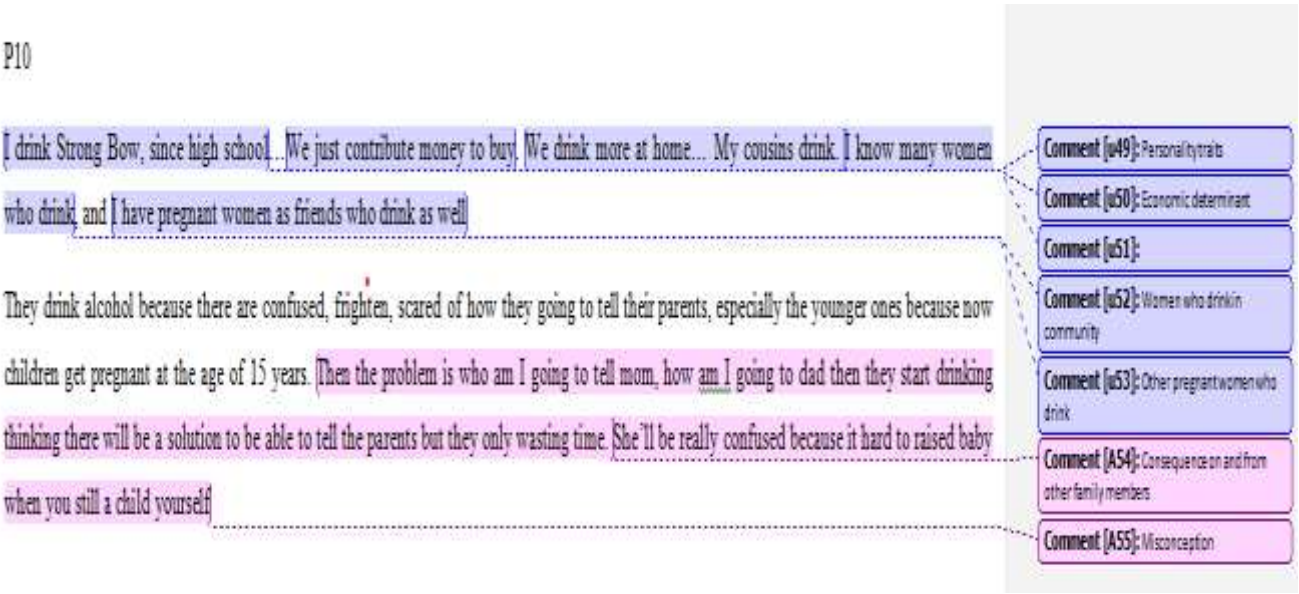
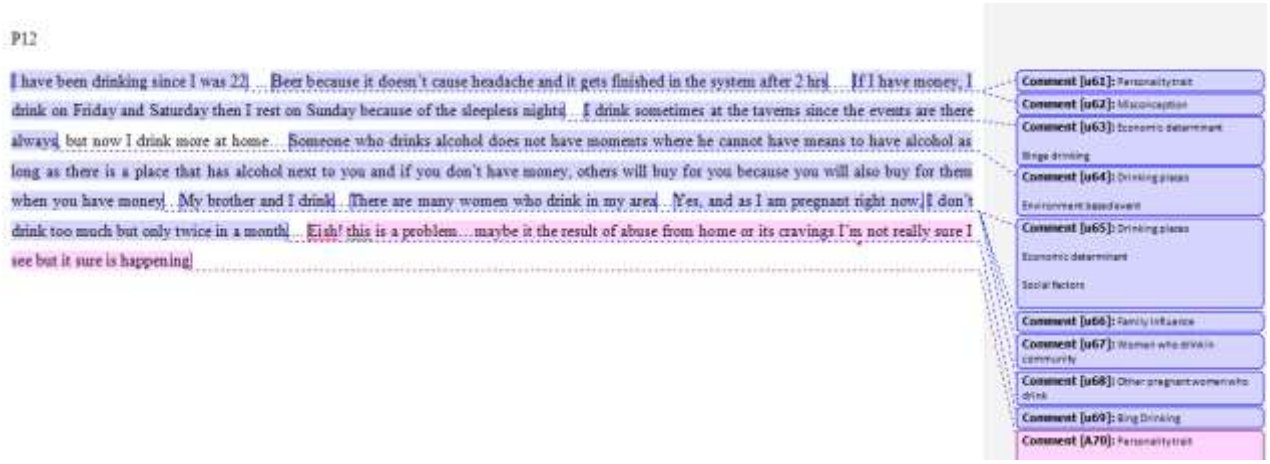


Figure 6.2: Interview Extracts and the Code from Participant 12



Finalisation phase of theme development

After the iterative processes of going back and forth over and through the data from the interviews, the pre-defined codes based on the interview extract from the participants to achieve inductive codes and deductive codes from the literature and theories as explained in chapters 5, the researcher reached the finalisation phase of the theme development. A theme is a unit of meaning that is observed or noticed in a data (Guest *et al*., 2012), a phrase or sentence that identifies what a unit of data is all about, and what it means (Saldan, 2009) or an abstract that links expressions from the data (Ryan & Bernard, 2003).

Conclusion

The chapter discussed how ATA was mobilised to explain the presence of the data. It presented tables on the demographic information of the participants. It showed examples of how inductive and deductive codes were also developed. The chapter also presented a table of words and phrases counted from structured interview extracts to quantitatively show the acceptable medium that can be mobilised in communicating and addressing sociocultural factors that influence participants to drink. The chapter also discussed the formation of codes, categories and the themes. The next chapter presents and analyses the themes with a view to making meaning from them.

CHAPTER SIX

ANALYSIS

Introduction

This chapter presents an analysis of the data obtained in the study, using Applied Thematic Analysis. The analysis is guided by the four research questions generated in chapter one, which constitute the themes of the analysis. Also, the study's theoretical framework, the social constructivism paradigm, is engaged in the interpretation of data to make meaning of the experiences of the respondents and also provide insights into the research questions and objectives.

Analysis of the Respondents' Demography

From the presentation of data collected at King Edward VIII Hospital in Durban, KwaZulu-Natal in Chapter Five, table 6.2 illustrate analyses of the demographic and biographic data.

As shown in Chapter Five, Table 6.2 shows that there were more women between the ages of 31 and 35 years that participated in the interview, and this constituted 63% of the respondents. The other age brackets were 21-25 years, 26-30 years and 18-20years; and these constituted 13%, 17% and 7%, respectively. It also shows that 87% of the participants are single, 7% are married, while divorced and others who are in a relationship have3%.

The table further shows that 57% of the respondents were unemployed while 43% were employed. Also, 53% of the respondents had matric (also called Grade 12), while respondents below matric level with varied grades were 27%. A participant with a university degree was 3% and a post-matric diploma constituted 10%, while another 7% had never been to school.

In a national survey done by Peltzer, Davids and Njuho (2011) to measure the extent of alcohol use and drinking problem among South Africans from the ages of 15 years and older, 20.2% of the participants were from KwaZulu-Natal province where Durban is the biggest city. The report showed that among women, risky and harmful drinking was associated with urban dwelling and lower education This study corroborates the analysis shown in table 6.2 (chapter six) which reveals that the participants in the interview, who live in Durban,

KwaZulu-Natal's biggest city, carry a significant percentage of the participants that have matric and lower than matric.

In another study done by Peltzer and Pengpid (2018) which estimated the pattern of alcohol use among South African adults with men and women as participants, the results obtained from the participants' socio-demography and health status indicators revealed an association between lower socioeconomic status and hazardous or harmful alcohol use. This report also aligns with the information obtained in this study, that low socioeconomic status which is caused by unemployment as shown in table 6.2 (chapter six) is a predictor for alcohol consumption.

A pregnant woman who is between the ages of 31 and 35 years with an education level that is matric and below may not have the kind of opportunities those women with a university degree and above have in getting a job (SADHS, 2016). The unemployment status will lead to a low socioeconomic status, and a motivator to attend parties where free drinks will be available, and drinking pubs or shebeens where men who are most likely married will also be available to buy drinks for these women. Hence, because the power dynamics favour these men in terms of sexual negotiations and money, they are likely to have unprotected sex and unplanned and unintended pregnancy (Johnston *et al., 2010*; Jacques-Tiura*et al., 2015*).

In the subsequent sections, the focus is concentrated on thematic analysis using a culture-centred approach (Dutta, 2008) to answer the research questions. The analysis is, however, still within the frame of ATA (Guest *et al.*, 2012).

Theme 1: Motivations for Maternal Drinking

This theme is connected to research question one: What sociocultural factors influence the pregnant women in Durban, KwaZulu-Natal to drink alcohol?

In the context of this research, the relationship between factors and motivations for maternal drinking is that while a factor is a fact or influence that contributes to an outcome, motivation drives the factor. They are the motives that drive the participants and are influenced by sociocultural variables.

Table 7.1 Codes, Categories and Themes of Sociocultural Factors that Influence the Pregnant Women in Durban, KwaZulu-Natal to Drink Alcohol

CODES	CATEGORY	THEME
Individualism	Individual behaviour (The impact that personal decisions, actions and inactions have on the participants)	Identifying the motivations for maternal drinking
Hesitation		
Misconception		
Moral and religious affiliation		
False sense of tranquil		
Personality Trait		
Environment based activity	Influence from Domain (The impact of the socio-cultural activities and structures have on the participants)	
Women in the community who drink		
Other pregnant women who drink		
Drinking places		
Family influence	Household (The impact from relatives of the participants)	
Economic Determinant	Affordability (The power of the participants to be able to buy or unable to buy alcohol)	
Social factors	Group influence	

Binge drinking	(The influence from peers and friends of the participants)	

In line with the study's first objective, this theme, motivations for maternal drinking, explores the intrapersonal, attitudinal, and sociocultural influences that make pregnant women use alcohol in Durban, KwaZulu-Natal. From the data presented from the interview with the participants at the antenatal clinic of King Edward VIII Hospital in Durban, various reasons serve as motivations for the participants to drink alcohol. These motivations have been further put into categories in this discussion, to reduce them to an explainable phenomenon.

In line with ATA (Guest *et al.*, 2012), the researcher made a quantitative presentation of the socio-cultural factors that influence and motivate pregnant women in Durban, KwaZulu-Natal to drink alcohol, to show the frequencies from respective codes that emerged from the interview extracts with 30 different participants. These codes give credence to the formation of the categories, and they are: Individual Behaviour (which has 55 codes); Influence from Domain (with 66 codes); Household has 26 codes; Affordability has 12 codes, while Group Influence has 18 codes (see Codebook: Appendix 4).

Individual Behaviour is the disposition that personal decisions, actions and inactions have on the participants. This category covers codes like genetic pre-disposition, hesitation, misconception, moral and religious affiliation, false sense of tranquillity and personality traits.

The second category is the Influence from Domain, which is defined here as the impact of the socio-cultural activities and structures on the participants. This category covers codes like environment-based activity, women in the community who drink, other pregnant women who drink and drinking places.

The third category is the Household, which is the impact from the relatives on the participants and speaks basically to family influence on the participants. The fourth category is Affordability, that is, the power of the participants to be able to buy or unable to buy alcohol. This speaks to the economic determinant code. The fifth category is Group Influence which

is the influence from peers and friends of the participants, and it explains the codes on social factors and binge drinking.

The theme of motivations for maternal drinking is discussed about the categorisations of the data and in the light of the theory of the culture-centred approach (Dutta, 2008).

Influence from close Contacts

An individual can be influenced by close contacts with others who drink alcohol like family and friends. This participant said:

> *Parties and all other ceremonies have alcohol because people want to drink and be happy, so we drink there… My dad drinks and some of my cousins' drink ciders at a car wash next to my place. Cars are parked and people drink until morning. It is always busy.....I think pregnant women drink because they want to make their friends happy (Interview with participant 16 on December 19, 2019. Age 35)*

This participant comes from a family where the father drinks; the participant stated that her father drank alcohol. Family studies have consistently demonstrated that there is a substantial influence on an individual that comes from a family where alcohol is used (ICAP (2009; Room, 2013; Song, 2013; Sudhinaraset et al (2016), Therefore, the participants' response indicates that the family structure that has a parent who drinks can affect the disposition of pregnant women to drink.

However, the participant has the agency to re-negotiate her disposition through the engagement of counselling and treatment as part of health care structures in society. However, as argued by Sudhinaraset *et al* (2016), it is not as easy as a wave of the hand because of the strong family and friends influence acknowledging the fact that she has spent a considerable amount of time from her youth with these categories of people.

Song (2013) in his work titled social capital and health, argued that all individuals dwell in a network of social relationships and that their health conditions can be contingent on structural

attributes of their network contexts as also submitted by Dutta (2008). So, the individual is influenced by the family and friends' activities around them which are core in the structure of social relationships.

In a study on a personality trait, Room (2013) concluded that consuming alcoholic drinks is a personal behaviour, but the behaviour is influenced at multiple levels by social context, culture, and society (Song, 2013; Sudhinaraset *et al*., 2016). This personal behaviour is the total of the capacity of the participant to negotiate between the culture and structures within her community, it is referred to as agency and located in the theory of CCA by Dutta (2008).

Personality, therefore, is the characteristic set of behaviours, cognitions, and emotional patterns that evolve from biological and environmental factors (Corr and Mathews, 2009).

In one of the extracts from a participant, she said:

> *Ha! Hey! Jesus. Flying Fish…. I was doing Grade 11, 2016 when I started drinking….*
>
> *Maybe once after 2 months…. With friends obviously and when there are functions sometimes, I do…… Weddings but even in funerals……Yes, I can buy drinks sometimes for myself…. We do drink when we like. It's just my sister that drinks*
>
> *Mostly men, and elderly women, those of old age drink a lot in my neighbourhood*
>
> *(Interview with participant 2 on December 18, 2019. Age 19)*

The participant's response above shows some excitement (in her voice) when she told her story about when she started drinking alcohol. She started drinking when she was in Grade 11, before her matric graduation. This is an indication of being influenced by her family structure, friends and environment. Notwithstanding those influences, she has the agency to express her choice and negotiate not to participate in drinking alcohol. Her tendencies seem to desire some fun and sensation-seeking disposition. However, studies have found that higher levels of alcohol use among parents and peers are associated with increased alcohol use among adolescents and young adults (Cruz *et al*. 2012; Dawson 2000; Mares *et al*. 2011;

Osgood *et al*. 2013; Trucco *et al*. 2014; Varvil-Weld *et al*. 2014; Wallace *et al*. 1999; Walsh *et al*. 2014; Williams and Smith 1993) and this is responsible for her disposition.

The age of the participant (which is 19 years) also corroborates with the position of ICAP (2009) that, an individual's age contributes to determining a drinking pattern. A young individual like the participant likes to engage in experiments and drinking behaviour than older individuals. This fun and sensation seeking tendencies are factors that affect the participant (Epstein *et al.,* 2002) Also, a study by the South African Demographic and Health Survey (SADHS, 2016) shows that high drinking behaviour is common with younger females.

In any case, while a family setting that encourages drinking alcohol might influence young people to start drinking at an early age, a study has also shown that as these young people grow older, the influence shifts to influence by their friends (Song, 2013; Sudhinaraset *et al*., 2016)

Another participant also said:

> *I started drinking when I was 13 years… I like to drink 4th Street…. I drink at home sometimes but more at parties, weddings and cultural events…. Women drink in my community…. I know some pregnant women who also drink*
>
> *(Interview with participant 22 on December 19, 2019. Age 18)*

This participant drank at home while she was 18 years. She also indicated that she had started drinking at 13 years. It is pertinent to note however that early or adolescence drinking is not unusual. Peltzer, Davids and Njuho (2011) confirmed in their study which targeted 15 years and above, that drinking can start early in that stage of development. Morojele and Ramsoomar (2016) also posit that adolescent drinking was not unusual in South Africa.

The foregoing indicates that the socio-cultural context in which the pregnant woman lives creates an influence that affects her agency to drinking, and this fact should be taking into consideration in addressing the factor that motivates them to drink alcohol. Thus, Room's

(2013) position is shared by this study. Agency can therefore be described as the capacity of individuals to make contributions to their health needs at the local level and this can help communication planners create solutions for their community health problems (Dutta, 2008).

The culture-Centred Approach advocates for the voices of the participants to be taken into consideration in any effort to address these sociocultural realities of pregnant women. In this case, the agency of the participants becomes imperative in pointing out the structures that encourage the culture in their communities, and how best the structures can be re-negotiated to the benefit of the community members.

These risk and sensation seeking tendencies described by Room (2013) could also lead to the participant showing hesitation which is the delay by the participant deciding to quit drinking. One of the participants said:

> *I started drinking at age 22… I use to drink a lot but I have reduced…. I am want to stop… I only drink occasionally now…. I drink sometimes at home and also at parties…. Sometimes we friends contribute money to buy… I think it is because of stress and the relief it with alcohol*
>
> *(Interview with participant 25 on December 19, 2019. Age 26)*

This participant expresses willingness to stop drinking but shows hesitation. There is a possibility of her struggling to make the decision. It is therefore important to recognise the effort she is making to have reduced her intake of alcohol, and showing a desire to stop drinking altogether, but will require a reinforcement of messages through the Social Behavioural Change Communication (SBCC) that will continually educate her on the consequences of maternal drinking and make her decision easy. However, to achieve this, healthcare and health communication planners must appreciate the argument as advanced by Dutta (2008) that the agency of the participant is important. The reasons for her hesitation to quit drinking must be understood from the perspective of the prevailing culture in her sociocultural environment, and the structures that might inhibit that decision.

Therefore, the experience of the participant becomes necessary in understanding and appreciating the reasons for the hesitation. Agency, according to Dutta (2014) is an everyday

activity of making meanings and negotiating structures. It also helps the participant in evolving ways and strategies to addressing barriers that can make her stop drinking. To this end, the involvement of the participant will help health care and health communication professionals to rely on the told experiences of the pregnant woman in other develop a strategy and message that can reinforce her decision to quit drinking, and arrive at the decision by understanding the situation/context of the participant before designing and creating any message (Packard, 2014). This way, the participant would have been involved in the health agenda of their community (Dutta, 2007, 2011; Dutta, Ban and Pal, 2012; Koenig, Dutta, Kandula, and Palaniappan, 2012).

Some participants, however, mention stress as a factor. From the interview extract, some participants expressed that some pregnant women drink alcohol, and somehow think that it will help them in managing stress. A participant said:

> *Ahhh! I just think maybe, you know when you are at a party, we are together, the peer pressure, we just want to have this one, two drinks, and ahh that is for us who are married, we don't have much. For some that we talk to with, the ones that are not married, some of them is the stress, maybe, the boyfriend is not supporting her, maybe the father of the baby is ill-treating her, so maybe the stress and they just want to have this one good night sleep*
>
> *(Interview with participant 1 on December 18, 2019. Age 27)*

Another participant said:

> *I drink but most people drink Heineken and I tasted it first 2018… Parties, they (drinks) are always there, and a lot of people drink at parties because there are no other occasions that serve alcohol like parties... Others it because one wants to have an abortion and minimize stress*
>
> *(Interview with participant 3 on December 18, 2019. Age 31)*

These participants' views lend some credence to the submission of Matesebe, Tsetse and MacLeod (2019) that, one of the factors identified for maternal drinking in a low resource area of Eastern Cape was the lack of support from partners, or even denial of paternity of the pregnancy, or cheating by partners. Nevertheless, the participant still averred that alcohol ingestion could lead to abortion.

According to a 2020 study on miscarriage risk by Vanderbilt University Medical CenterinTennesse, the USA published in the American Journal of Obstetrics and Gynecology and published again Science Daily journal[28], it argues that each week a woman consumes alcohol during the first five to 10 weeks of pregnancy is associated with an incremental 8% increase in the risk of miscarriage, according to a new study. However, there is a risk involved in drinking alcohol while pregnant that may not have been factored in by the participant; the risk is both to the unborn child and the mother herself.

Another participant said:

> *I have been drinking since I was 22... Beer because it doesn't cause headache and it gets finished in the system after 2 hrs... If I have money, I drink on Friday and Saturday then I rest on Sunday because of the sleepless nights.*
>
> *I drink sometimes at the taverns since the events are there always, but now I drink more at home.*
>
> *Someone who drinks alcohol does not have moments where he cannot have the means to have alcohol as long as there is a place that has alcohol next to you and if you don't have money, others will buy for you because you will also buy for them when you have money ...My brother and I drink ... many women drink in my area*
>
> *Yes, and as I am pregnant right now, I don't drink too much but only twice a month.*

[28] https://www.sciencedaily.com/releases/2020/08/200810102430.htm - Accessed on the 19th March 2020

(Interview of participant 12 on December 18, 2019. Age 33)

The studies by Crawford-William *et al*. (2015) and Ross *et al*. (2012) concluded that addiction due to alcohol abuse will lead to further depression and it poses a public health threat. A study by Haffejee*et al*. (2018) with pregnant women attending a public health care facility in KwaZulu natal province states that only 36% of women reported that their pregnancy was intended. This, therefore, corroborates the earlier studies (Naimi*et al.,* 2003; Orr *et al*., 2008; Seggie, 2012) that link unwanted or unintended pregnancies with alcohol.

To some participants, however, moral and religious affiliation could serve as the strength they require to quit alcohol. A participant said:

I can't drink at home because we are Christians, but my cousin drinks… I drink at parties because there is always free alcohol at parties… Some women drink in my area; I know a pregnant woman that drinks and smoke also… I think it is because their baby daddies denying their pregnancy, others are chased out of their homes so there are relieving stress

(Interview with participant 27 on December 19, 2019. Age 35)

In their study, Rozin and Singh (1999) argue that moralisation of a phenomenon can be used to convert preferences into value, and also within a culture in the community. Their argument stems from the fact when a phenomenon is moralised and internalised, the outcome will be a healthy value that can affect health decisions. This argument does not take into consideration the socio-cultural environment that the participants live in. Morals can be an outcome of religious influences as articulated by Immanuel Kant (1788) in his postulation that divine principles influence the conduct of an individual.

The participant said that she cannot drink in her home because the family subscribes to Christian beliefs, but she drinks at parties. This underscores the point as argued by Dutta (2008) that the environment plays a major role in motivating individual behaviour. In this light, therefore, the agency of the participant is important since it is the capacity to decide for herself what is best. The involvement of the participant will enable her to express how morals

and religious affiliation can be of benefit to her community in the decision of abstaining or reducing alcohol consumption. She can negotiate with the structures within her community which may even include religious houses to change the prevailing culture within her community.

Influence from Domain

Another influence speaks to the environment that the participant lives in, and it also determines some activities that influence the participant to drink alcohol. Room (2013) and ICAP (2009) cited the environment as one of the multi-level factors that affect an individual. The environment is essentially influenced by the culture that prevails over it.

A pregnant woman characteristically interacts with the environment to form a personality, and that interaction with the environment is a combination of social and cultural factors, which can be used to describe the awareness of circumstances surrounding her, and how her behaviour is affected specifically by the environment (Catherine Sanderson, 2010). This motivation is influenced by activities that are based on her environment.

This sociocultural environment hosts the social network of the pregnant woman which includes family members, peers and acquaintances that attend social events together. This network also brings social bonding, and it means that people depend more on others for guidance like direction and social interactions, and it also makes them more susceptible to influence (Nezlek and Smith, 2017).

Another participant said:

> *I'm currently drinking alcohol but not always" …. "I started drinking since 2012, and I drink maybe after 3 months" … "I drink at parties when I'm with friends, at Kitchen party, baby welcome and Baby depart, and when I attend cultural events" …. "Yes, lots of them, my brothers drink….*
>
> *My parents are all dead. My aunts and uncles, others are in Cape Town, others are in Joburg and others are in Zimbabwe, but they drink*

(Interview with participant 1 on December 18, 2019, Age 27)

This participant started drinking back in Zimbabwe, perhaps due to individual behaviour or household or perhaps other social factors like friends. When she changed her environment to Durban, South Africa, she continued drinking. The cultural influences from her former friends and family in Zimbabwe have been reinforced by the environmental determinants of her being in Durban.

This also addresses the issue of immigration as discussed by (Sudhinaraset *et al*., 2016) who had argued that the frustration of settling down into a new community can lead an immigrant into drinking, and because most immigrants start by settling in a low-income neighbourhood where there is a culture of drinking alcohol, it will also influence or reinforce the drinking habit. In this case, the behaviour of the immigrant from Zimbabwe was reinforced.

Also, within her environment are women who drink alcohol. A participant said:

> *I drink Strong Bow, since high school…We just contribute money to buy. We drink more at home… My cousins drink. I know many women who drink, and I have pregnant women as friends who drink as well*
>
> *(Interview with participant 10 on December 18, 2019. Age 32)*

The presence of other women who drink alcohol in her community serves as a motivation for her to also drink. The influence of the environment as postulated by Dutta (2008) is strong.

Another participant said:

> *I started drinking in 2012.*
>
> *Social events like parties, all parties, clubs… People were buying drinks for me*
>
> *Yes. My in-laws, my family members do drink as well, my sister but my parents don't drink*
>
> *Yes, there are lots of them (women in my neighbourhood) that drink. They drink beer, they drink gin and now I see that gin is in town now, and with all other sorts*

... Not really. But I've seen women that drink when they are pregnant although I don't know them personally

(Interview with participant 4 on December 18, 2019. Age 33)

This participant also noted that other women in her neighbourhood drink, and she could identify the drink that was in vogue, as well as the type of alcohol that these women drank. Being able to tell the type of drink the other women are used to, is an indication that she has a close relationship with them.

A participant said:

I have been drinking Castle Lite since 2012…. where I stay especially when we have a celebration and my friends sometimes contribute… I have relatives who drink, and I have also seen other pregnant women drink.... I think they drink because of stress, maybe the person who impregnated her denies the pregnancy, then leading her to drink that what I think

(Interview with participant 9 on December 18, 2019. Age 35)

The fact that this participant sees other pregnant women who drink alcohol in her environment is reinforcement for her to drink also while pregnant.

Another factor, though already documented in the literature, is the venue of the drinking, that is, where the drinks are bought and sold, usually having a lounge to sit in if one wishes wish.

A participant said:

Parties and all other ceremonies have alcohol because people want to drink and be happy, so we drink there… My dad drinks and some of my cousins' drink ciders at a car wash next to my place. Cars are parked and people drink until morning. It is always busy.... I think pregnant women drink because they want to make their friends happy

(Interview with participant 16 on December 19, 2019. Age 35)

This participant's description of the 'place' introduces another perspective to the influence of domain. It is implied that there was a car wash close to the place of drinking, and the car wash does act as some sort of a tavern in the community where alcohol is sold. This has the capacity of affecting the drinking culture of the neighbourhood because they, including the participant, can easily have access to alcohol. The participant highlights that this car wash that also serves as a drinking place is open for 24 hours from her description.

This is a major structure that encourages drinking in the environment of the participant. The availability of drinking places also known as shebeen in low-income communities' dates back to the 20th century when the Durban system of having beer halls were adopted nationally, and the revenue derived from the municipal beer halls were used to administer Africans in the urban areas according to Whelan (2015).

Another participant said:

> *I have been drinking since I was 22.*
>
> *Beer because it doesn't cause headache and it gets finished in the system after 2 hrs... If I have money, I drink on Friday and Saturday then I rest on Sunday because of the sleepless nights... I drink sometimes at the taverns since the events are there always, but now I drink more at home.*
>
> *Someone who drinks alcohol does not have moments where he cannot have the means to have alcohol as long as there is a place that has alcohol next to you and if you don't have money, others will buy for you because you will also buy for them when you have money ...My brother and I drink ... many women drink in my area*
>
> *Yes, and as I am pregnant right now, I don't drink too much but only twice a month.*
>
> *(Interview of participant 12 on December 18, 2019. Age 33)*

The proliferation of shebeens in the low-economic environment is a structural factor that was postulated in Culture-Centred Approach (Dutta, 2008; Collins, 2016), and the presence of the shebeens in the community points to the importance of taking into consideration structural vulnerabilities that exist in the community when designing communication messages. The structure can be human resources that distribute the alcohol in the drinking places; it can be policies or even physical structures like the building of the drinking places that affect the

culture of the community. Therefore, there is a need for maternal health planners to interact with pregnant women so that they can share their experiences and how the drinking places creates the environment for them to continue drinking.

From her expression, she submitted to the influence of the prevailing culture in her environment or community wherewith her friends attend social and cultural events together where she gets alcohol to drink. There are activities that where she lives that encourage her to indulge in. Collins (2016) argues that socioeconomic status (SES) is one of the many factors influencing a person's alcohol use and related outcomes, though according to her, the people with lower SES tend to bear the negative consequences of alcohol use.

Household

This is the influence family members have on participants either husbands, siblings and/or other relatives. A family is a social group and they tend to exact social influence on the behaviour of the participant. Every family develops its values, norms and ways of doing things over time and this becomes the family culture. According to Dutta (2008) in the culture-centred approach being the theory mobilised in this study, culture drives a group and foregrounds the participation of the family members on social issues and the construction and continuous construction of meanings within the family. A participant who lives among family members who drink alcohol is likely going to drink also.

A participant said:

> *I drink wine since I was 16 or 18 years. I drink with my friends, and occasionally with my family at traditional events too. But all my siblings drink*
>
> *I buy for myself or people buy for me, it depends*
>
> *(Interview with participant 15 on December 18, 2019. Age 22)*

The participant drank with her family member at traditional events which are usually cultural events in Africa. Such events bring families together as they celebrate the traditional events.

Another participant stated also that many members of her family drank:

I drink sometimes with my friends, and at parties…I also drink when we make alcohol for cultural events…My uncle and aunt drink and their kids, my relatives also drink. A lot of women in my neighbourhood drink a lot

(Interview with participant 19 on the 19, December 2019. Age 35)

The participant revealed that not only did her uncle and aunt drink alcohol, but their children did also. This shows a strong drinking culture in the family and family structure has a strong social influence on individuals (Song, 2013). This further establishes that influences from family are one of the multi-level influences that will motivate a pregnant woman to drink alcohol. Culture is therefore critical in the articulation of health communication (Arhinhenbuwa, 1995, Dutta, 2008), and indeed a significant driver in participatory health communication that informs health opportunities. The participants must be involved in all interventions so that they can unpack the cultural influences before any programme is designed. The participants, having an understanding of the prevailing culture in their family, can share their experiences, and suggest strategies that will be useful in a health communication approach that will address the influences from family members.

Affordability

This factor is economic, and it is the ability of the participants to be able to buy alcohol or not. The demography of the participants shows that 57% of the participants are unemployed while 43% are employed.

A participant said:

I have been drinking since I was 22... Beer because it doesn't cause headache and it gets finished in the system after 2 hrs... If I have money, I drink on Friday and Saturday then I rest on Sunday because of the sleepless nights... I drink sometimes at the taverns since the events are there always, but now I drink more at home.

Someone who drinks alcohol does not have moments where he cannot have the means to have alcohol as long as there is a place that has alcohol next

to you and if you don't have money, others will buy for you because you will also buy for them when you have money ...My brother and I drink ... many women drink in my area

Yes, and as I am pregnant right now, I don't drink too much but only twice a month.

(Interview of participant 12 on December 18, 2019. Age 33)

The participant here narrates how she buys drinks for herself when she has money, but if she does have money to buy, others will buy for her.

The above indicates that an employed pregnant woman has a higher agency to buy alcohol in their neighbourhood if there are places where she can buy them. This agrees with the position of Collins (2016), that people with higher socioeconomic status (SES) have a higher income that can enable them to buy alcohol. Conversely, people with low SES may not have the resources to buy it. A systematic review suggested that adult unemployment was associated with increased levels of alcohol use (Bryden *et al.* 2013). A study by Wood and Bellis (2015) for the Health Equity Pilot Project (HEPP) of the European Union (EU) concludes that men and women with a lower SES or less education are less likely to be current drinkers and are more likely to abstain than those with higher SES/education. However, men and women with lower SES/education experience the highest rates of alcohol-related mortality, suggesting that when it is consumed, alcohol has more of an effect on health among individuals from lower SES/education groups.

Another participant said:

I started drinking at age 19, and I drink any Cider occasionally at home, at parties and weddings

No, we put money together to buy the drinks

My Cousins drink

(Interview with participant 5 on December 18, 2019. Age 25)

The participant also reveals practice friends or families of putting money together to buy drinks for themselves. This shows that the participant and her friends have the agency to raise funds simply just to buy alcohol for leisure. This attitude is more plausible if the participants are employed as argued by Collins (2016) and Wood *et al* (2015) that people with higher social-economic status (SES) have the tendencies to buy themselves alcohol. The culture appears to be a norm in their social group, and where they do not have social events to attend, they can put money together and buy alcohol for themselves.

Group Influence

This category is motivated by social factors (ICAP, 2009) like the group of friends the pregnant woman belongs to.

A participant said:

> *I started drinking at 21, and I used to like beer. I like hot stuff with my friends nearby*
>
> *I would say all the events since even in the funerals nowadays drinks are served... Sometimes we contribute to buy drinks... My aunt drinks these days... There are lots of women that drink and it is worse these days*
>
> *(Interview with participant 6 on December 18, 2019. Age 35)*

This participant expresses approval for her friends who are always with her when they drink. It supports the fact that they seem to have developed a bond within their social group. A study by ICAP (2009) agrees that social factor is a major motivator for a pregnant woman to drink, and the influence is majorly based on group solidarity. Room (2013) says that this kind of bond within the social group is a sign of mutual trust and status. He said that the group would like to have fun by seeking some time out sometimes in a pub, or parties or any social events where they can extend their bonding. Song (2013) also argued in this line that the structures of social networks which he likened to social capital like friends and family have a strong influence on the individual, and like Room (2013) said, there is a strong bond that exists

within the group. Sudhinaraset et al (2016) also take the same position on individuals like the pregnant women being influenced by the environment she grew up like the family structure which gradually shifts to influence by friends as she grows up.

Another participant who also shares this kind of bond with her friends who belong to the same social group said:

> *I started drinking at 20, and I can drink for a whole week. I drink at parties and other ceremonies too.*
>
> *We contribute with friends or we get boys to buy for us at the club whenever we visit there. My brothers drink too*
>
> *(Interview with participant 17 on December 18, 2019. Age 35)*

The social group shares a strong culture of attending social events together as alluded to by scholars and works from ICAP (2009); Song (2013); Room, (2013); Sudhinaraset et al (2016) and Dutta (2008). These scholars maintain that, within a group, members make meanings out of their interactions because they have not only bonded, but have defined their own set of values, norms and behaviours, and attending parties and other social events is a way of building group trust. Members are likely to interpret the bonding as trust and develop their meaning from the standpoint.

A participant said:

> *I am planning to quit drinking. But we drink on New Year's Eve…. I don't attend traditional events. Its parties and when there are ceremonies…. Most of my relatives who drink have passed on…. So many women in my neighbourhood drink including other pregnant women... I think when a person likes to drink, they drink, and then even when pregnant they just drink, it in their blood*
>
> *(Interview with participant 11 on December 18, 2019. Age 35)*

The participant says though she may be planning to stop drinking, she is involved in binge drinking on occasions like New Year's Eve. She does not binge alone on those occasions; she does that with her friends, with whom she belongs to the same social group. According to CDC (2020), binge drinking is defined as a pattern of drinking that brings a person's blood alcohol concentration (BAC) to 0.08 g/dl or above. This typically happens when men consume 5 or more drinks or women consume 4 or more drinks in about 2 hours.

In their work on binge drinking, Krieger, Young, Anthenien, and Neighbors (2016) concluded that binge drinking is a result of factors like developmental, social and demographic factors such as age, sex, and race. They argued that these factors motivate the individual including the pregnant woman to binge with friends, mates from schools and the social group they belong to, and this happens more in social events like New Year's eve. They also cited environmental influence and person-level risk factors as some of the factors that encourage binge drinking.

In another study by White, Tapert, and Shukla (2018), they also argued that binge drinking is a result of influence by social groups, though they argued that a survey done in the USA has shown some decline among men, but it remains high among female which is the gender of the pregnant women.

A pregnant woman who belongs to a social group and that social group attends parties and other social events where alcohol is served could become a motivation for that pregnant woman to binge. As Dutta (2008) argued in his theory of culture centred approach, there is a likelihood for the participant to be influenced in the social group since they share a common bond and trust.

McKetta and Keyes (2019) in their National Surveys on Drug Use and Health (NSDUH) to monitor substance use and health, examined trends in binge drinking according to age, sex, and pregnancy status; the authors found increases in binge drinking and stated that women are increasing drinking and it is attributable to long-term patterns of alcohol use that began earlier in the life course, as well as concurrent secular trends like social and environmental,

that increase drinking across all age group in more recent times. This position is also supported by Keyes and Hasin (2016).

Apparently, the pregnant women in Durban have an idea of the dangers of drinking alcohol while pregnant and must have received information about it but seem not to have acted on that information because it was not necessarily targeted given their sociocultural situations. Most of them only are being reminded at the antenatal session which sometimes is crowded and the antenatal nurses are either have too many people to handle or are fatigued to design any articulated and targeted communication that understands their nuances. This gives credence to the study done by Symons, Carter, Oscar, Pearson, Bruce, Newett and Fitzpatrick (2020) that the reduction in reported prenatal alcohol exposure in the Aboriginal community in the Western Australian setting during the period of prevention activities provides initial evidence for a community-led strategy that might apply to similar communities. This study has involved pregnant women to focus on the socio-cultural nuances of the Durban women and develop a communication approach that will address their situation.

Theme 2: Developing of a Programme and Strategy

Developing a programme and strategy relates to research question 2: What are the appropriate messages that can be developed and used in communicating and addressing sociocultural factors that influence pregnant women who drink alcohol?

Table 7.2: *Codes, Categories and Themes of the Appropriate Messages that can be developed and used in Communicating and Addressing Sociocultural Factors that Influence Pregnant Women Who Drink Alcohol*

CODES	CATEGORY	THEME
Awareness campaign	Communication Approach (A synergised strategy to disseminate messages to the participants)	Developing a programme and strategy
Community engagement		
Desire to disseminate the message		

Desire for message		
Reinforced message		
Face-to-face communication		
Consequences on other family members	Education on the consequence of drinking (An advocacy programme to educate and inform the participants on the consequences of alcohol, and how to get support)	
FASD		
Help centre and counselling		
Risk of HIV		
Vulnerability		
Drinking places		

One of the objectives of this study is to explore the appropriate message that can be developed in communicating and addressing sociocultural factors that influence pregnant women who drink alcohol in Durban, KwaZulu-Natal, and to achieve this objective, the study sought answers through a structured interview with the pregnant women who drink alcohol on the appropriate message that will resonate with them. To achieve this objective, the researcher identified some codes which have been categorised into two.

The first category is the approach to communication which is a synergised strategy to disseminate messages to the participants. It speaks to the fact that the communication approach must first appreciate it from the standpoint that their health conditions can be contingent on structural attributes of their network contexts especially their family and friends (Song, 2013). There is a need to understanding that situation before embarking on any communication analysis. The concept was provided by the SBC3 in Mumbai, India who believe that social behavioural change communication begins with formative research. To this end, Dutta's (2008) work on a culture-centred approach becomes instructive because it does not only address the culture of the pregnant women who drink alcohol in Durban, but

address the structures within the community, and also their agency. As argued by Kreuter and Lezin (2002) in their work on social capital, as long as data seeks to appreciate the sociocultural environment of the pregnant women and not just scientific reduction and model, an awareness campaign, community engagement, desire to disseminate the message, desire for the message, reinforced message, and face-to-face communication can be developed as a strategy.

A study was done by Savic, Room, Mugavin, Pennay and Livingston (2016) on Defining drinking culture which they argued that much of the alcohol research discussion on drinking culture was focused on national drinking cultures in which the cultural entity of concern is the nation or society as a whole (macro-level). This way as they argued, information is missed out at the micro-level to understand the Social compliance and social stigma for non-participation in the drinking culture.

In a study by Banister, Piacentini and Grimes (2019), they argued that non-participants in a cultural practice like drinking culture tend to develop two overall identity refusal positions (resistance and othering), through which they seek to disengage with the collective identity of the non-drinker. These positions are underlined by four categories of identity talk; denial and temporal talk (distancing through resistance), and disconnect and concealment talk (distancing through othering), which are used to repudiate non-drinking as culturally and personally meaningful respectively. This study narrowed its search to the micro-level, Durban which shows that the pregnant women here may have heard about the consequences of drinking alcohol, but there is no nuanced understanding of them, and why they exhibit hesitation to quit drinking and social tolerance of drinking itself.

The second category is the education on the consequence of drinking which the researcher describes as an advocacy programme to educate and inform the participants on the consequences of alcohol, and how to get support. This category is supported by codes like consequences on and from other family members, Fetal Alcoholic Spectrum Disorder (FASD), helps centre and counselling, risk of HIV, Vulnerability and drinking places.

An appropriate message for this study means a message that is suitable and apt, compatible and attuned or fitting and correct and that will resonate with the pregnant women who drink alcohol. In other words, the content of the message must not only be appropriate, but participatory that the participants be involved in the development of the messages in a manner that is acceptable and appreciated to them to achieve making informed health choices.

Communication Approach

This category speaks to a strategy that is evolved to disseminate messages on the phenomenon to the participants' community. This approach is participatory and the voices of the participants must be projected in the dissemination of the messages.

In an interview with one of the participants, she said:

> *Yes, I want to receive the message…. So that I can help others and tell them about the disadvantages of drinking when you are pregnant….*
>
> *They should tell us what the advantages of drinking are when you are pregnant. The advantages and disadvantages*
>
> *(Interview with participant 1, December 18, 2019. Age 27)*

The participant says that there will be a need for information on the advantages and disadvantages of maternal drinking. Kreuter and Lezin (2002) and Song (2013) agrees in their analysis of social capital that the health condition of an individual can be contingent on structural attributes of their network contexts especially their family and friends. This participant expresses that same understanding by offering to become an advocate of safe drinking during pregnancy. She speaks to the need for an awareness campaign. Packard (2014) argues that by evolving a communication strategy like the awareness that can cause a behavioural change, three levels must be involved, and they are individual, community and social levels. Awareness in this context is regarded as a sustained effort with the involvement of the healthcare professionals including the participants in a manner to develop messages that will create information to the members of the community in this case pregnant women who drink alcohol in Durban. It is this approach to communication with the inclusion of the

participant that will determine the kind of community engagement that can be developed as a strategy.

Another participant said:

> *I want the message. If it can come like adverts so that it can also help the community. Many people do not know the dangers of drinking alcohol when pregnant in the community*
>
> *(Interview with participant 27, December 19, 2019. Age 35)*

The participant expressed the need for a strategy that can help the community because many may not be aware of the dangers of maternal drinking. However, there is a need for health care professionals and communicators to ponder on why there is limited knowledge about the dangers of maternal drinking. Kreuter and Lezin (2002) and Song (2013) have already researched into this and warned of the danger of not interacting with the participants adequately so that a proper appreciation of their social capital and web of social networks can be understood. Sudhinaraset et al (2016), ICAP (2009), Song (2013) and Room, (2013) had also said that the social influence of an individual including the Durban pregnant women is high.

There is a possibility of some barriers in the past effort that may have arisen from a structural point of view which may have been not understanding the sociocultural context of the pregnant women before designing a communication strategy (Packard, 2014). In his theory of culture centred approach, Dutta (2008) argues that structures can also be the processes of organising materials and communicative resources that can either enable or constrain access to information. Thus, if the participants' agencies are not engaged as argued by Packard (2014) and JSI (2020) so that they can negotiate with the structures that can serve as constraining to their getting the needed information, it will still not benefit the community which the effort is meant to engage. Therefore, understanding the pregnant women and their community by including them being members of the community themselves will create the needed dialogue, contextual and situational analysis, and the agency of the participant becomes useful in identifying constrain that had hitherto become a barrier for effective

community engagement in the developing a proper and result oriented health communication strategy.

The participants themselves from the interaction with the researcher had expressed a desire to disseminate the message also. A participant said:

> *I will want the message because it will give me information to help myself, my friends and my relatives who do not know also…I want to know the dangers of alcohol and how it affects unborn child*
>
> *(Interview with participant 21, December 19, 2019. Age 25)*

The participant said the information will empower her to educate not just herself, but her family and friends that form her social group which Dutta (2008) explained that they develop trust in such groups. There seems to be a lack of awareness among her social group, and this can be one of the reasons why they will drink alcohol together while on a social outing or engagement. To this end, the inclusion of the participant in planning a social behavioural change communication approach in a dialogic and interactive manner (Lal *et al*., 1992; Parker, 2016; Estrada, 2018; De Hertogh and DeVasto, 2020) will give energy to a proper message development that will not only be beneficial to the community but also to the social group that the participants belong to.

Participatory health communication according to Tufte and Mefalopulo (2009) is a stakeholder focused approach where the participant is a major stakeholder who can make input that will enrich the communication strategy using her agency to break the structures that may constrain effective dissemination of messages. The researcher while interacting with the participants can then evolve the best approach to reach her community and social group. According to JSI (2020), a project called Through Our Eyes Participatory Communication Project was launched across some African and Asian countries in 2010 and concluded that the engagement of participants in the dissemination of the message will give better credence to the output because the community members can trust the participants the same way they trust each other in their social groups.

Another participant said:

They should send us messages about it, it can be of help to my other friends and relatives too that are drinking while pregnant to stop for a while

The message should be about the danger of drinking while pregnant

(Interview with participant 18, December 19, 2019. Age 25)

The participant said that the health information on maternal drinking can be of benefit to her friends. This is so because she belongs to a social group that consists of her friends (ICAP, 2009) and her family (Ojo *et al*., 2010), and there is a culture within the groups that she belongs to. Her agency becomes important in the dissemination of health information as she can also become a communication vector by becoming an advocate agent to other pregnant women or even women that are planning to get pregnant. This concept becomes an advantage not only to develop appropriate messages through a social behavioural change communication approach (Estrada *et al*., 2018) which will not only address the information inequalities, but will encourage participants and health planners to interact in understanding the socio-cultural situation and context of the participants' social group, and develop message based on their peculiarities (Song, 2013, Kreuter and Lezin, 2002)

For the participants to have a desire to disseminate the message also means that they have a desire for the message. Bhuvaneswar, Chang and Stern (2007) had also pointed out that in their study that many pregnant women are not aware of the consequences of drinking alcohol during pregnancy.

A participant said:

It is important that people are taught the dangers of drinking because they fight and hurt each other when they are drunk…. I want the message, I want to know more

(Interview with participant 23, December 19, 2019. Age 35)

The participant said she required the message because she wanted to know more. The fact that she mentioned people fighting themselves raises suspicion of occasional disagreement within her social group, and a possible brawl when they are drunk because of the effect of

alcohol. Kreuter and Lezin, (2002), De Dreu (2014) and Song (2013) submits that within a social group, there are bound to be conflict as it is part of the social dynamics.

However, to create an intervention and materials that will drive the social and behavioural change communication strategy, it becomes even imperative for the inclusion of the participant in designing any programme and strategy for communicating to her community because of their social capital (Kreuter and Lezin, 2002; Song, 2013). The interaction of participants will assist in pulling down whatever barriers that might exist, and this will help in re-creating new roles and culture within their community for better understanding and health decisions (Dutta, 2014). The programme planners will need to involve the agency of the participant to know how to develop a message that will resonate with them as envisage by SBCC which foregrounds the voices of the participant in message development.

Another participant said that:

> *Yes, I want to receive the message…So that I can know what I didn't know. Like, why is it wrong or right? ... The one that says, alcohol kills. I can stop; I'm scared of death*
>
> *(Interview with participant 2, December 18, 2019. Age 19)*

The participant did not only want to receive an appropriate message that would resonate with her; she also indicated a sense of morality by requesting to know why the phenomenon is detrimental to her wellbeing. She wanted to know why it is wrong, and according to her, the knowledge will lead to her abstaining from alcohol consumption which in her understanding, might lead to her death.

The participant expresses the desire to know the consequence of drinking alcohol, and how that can affect her wellbeing which is exercising her agency and social capital (Kreuter and Lezin, 2002; Song, 2013). However, the culture-centred approach (Dutta, 2008) argues that culture should be a major consideration in the contemplation of health communication. It will be elitist for programme planners to moralise the issues of maternal drinking without understanding the socio-cultural factors (Kreuter and Lezin, 2002; Sudhinaraset *et al*, 2016; ICAP, 2009; Song, 2013; and Room, 2013) that motivates the participants to drink alcohol.

These sociocultural factors can range from influence from family, friends, environmental factors like easy access to alcohol, exposure to media adverting of alcohol. The agencies of the participants are important because the communication and health planners can study them to fully appreciate the situation before any advocacy plan is developed.

Another participant also averred:

> *I do not think the message will do anything. People know they should not drink and smoke, they still do it anyway...But maybe if the message will explain very well about the dangers of drinking, it will help us, will help my family and friends too*
>
> *(Interview with participant 30, December 19, 2019. Age 35)*

This participant believes that people who are aware of the dangers of drinking still go on ahead and indulge in harmful drinking behaviour. Therefore, there is a need for a reinforced message to influence a more positive behavioural outcome. The essence of any health campaign or advocacy is to promote healthy behaviour and discourage unhealthy ones, thus there is a need for continuous reinforcement of the messages (Randolph, 2004). The involvement of the participant in developing a programme and strategy will inform the stakeholders why there is a need for continuous reinforcement of the messages to their community as they understand better the prevailing culture in their community that motivates them to undertake certain behaviours. As argued by Packard (2014), JSI (2020) and SBC3 (2018), there is a need to properly understand the situation the participans live in, and perhaps do a proper communication audit and analysis before designing any communication strategy. There is a possibility of a structural problem like the location of a shebeen in their community which serves as a motivation for such behaviour since the participants can readily access alcohol. Dutta (2008) also argues that structures influence behaviours and that is the reason why the sociocultural context must be properly analysed.

However, the participants with their agency will better identify the structure that has influenced their culture within the community. The voices of the participant in developing a message to address and negotiate with the structures will facilitate the reinforcement of the

messages through a new culture and norms. Haldane, Chuah, Srivastava1 and Singh, Koh, Seng and Legido-Quigley (2019) agrees also that Community participation is beneficial to the development, implementation and evaluation of health services and any health communication campaign.

Education on consequences of drinking

Education on the consequences of drinking entails stakeholders creating an advocacy programme that will provide education and information for participants on the consequences of alcohol, and how to get support. To underscore this concept, the researcher relied on the interview extract and interaction with the participants to achieve a programme development.

A participant said:

> *Yes, I want to receive the messages because some women when they are drunk, they forget what happened and this is not right also for the children*
>
> *(Interview with participant14, December 19, 2019. Age 35)*

This participant is concerned about the consequences on and from other family members, particularly her children. The stakeholders need to include the experiences of the participants and their realities in this regard so that their voices will influence programme design (Kreuter and Lezin, 2002; Sudhinaraset *et al*, 2016; ICAP, 2009; Song, 2013; and Room, 2013). The health workers and communicators do not have the experience that conveys the import of the message, but the participants have the experience and know the culture first hand since they are living it, and can make contributions that will be useful in developing an educational message. The participants become stakeholders the moment they are involved by the health communication planners in the contextual analysis of the community through research and situational analysis before the development of the message, and for and for an adequate Social behavioural Change Communication effort and approach (Estrada *et al*., 2018).

Not getting the pregnant women to be involved in developing a communication programme will lead to a structure that will deny them of their voices, and the message may not be educative and appreciated because it may not address their sociocultural context (Kreuter and

Lezin, 2002, Song, 2013, Packard, 2014). The CCA (Dutta, 2008) describes structures as a principle that can enable and limit access to resources (Dutta, 2014). Developing a programme and strategy for communication with the participant will need to address the sociocultural factors that influence them to drink alcohol in their community.

Another participant stated:

> *They should send the message to pregnant women and women too because when women are drunk, they live their children unattended and they get raped*
>
> *(Interview with participant 17, December 19, 2019. Age 35)*

From this expression, it is obvious that the participant is concerned about the safety of her other children, and recognises the fact that being drunk can also endanger her child especially the girl-child that will lead to sexual violence. Institute of Alcohol Studies (2014) says that alcohol harm is experienced not only by drinkers but by those around them including families, friends, and colleagues. It also says that there is a strong relationship between alcohol and domestic abuse, violence and sexual assault.

In a research work by Zamawe, Banda and Dube (2015) in Malawi, it was concluded that the use of mass media in promoting the involvement of men in antenatal care, childbirth and postnatal care is effective. Husbands of the respondents who listened to a PLM radio program planned on maternal health were 1.5 times more likely to accompany their partner to the antenatal clinic. This kind of exposure will for men go a long way for husbands or partners of Durban women who drink alcohol can become another point of caregiver, protector and enforcer for his wife.

The participant was therefore expressing a valid point about drinking alcohol as a possible promoter to sexual violence mostly perpetrated by men who might take advantage because of the state of the individual. These are some of the perspectives that become useful when the social context of the pregnant woman is being analysed. The voices and contributions of the pregnant women will produce a rich perspective for programme development so that they can develop a message that can be used in creating interventions and materials for change

that will resonate with them. Brining in the agency of the participant on an SBCC concept is based on dialogue, allows the sharing of information, perceptions and opinions among the various stakeholders.

Some participants also talked about the effect of alcohol on unborn children which cause FASD. A participant said:

> *Yes, I don't have a problem with receiving messages like that. It will also help me in telling people about it too.*
>
> *I suggest the clinic prioritise the messages about the effect on the child*
>
> *(Interview with participant 7 on December 18, 2019. Age 34)*

This participant brings in concern for the unborn child and requested that the healthcare managers in the antenatal clinic should prioritise the message on the child. A survey done nationwide by Peltzer and Ramlagan (2009) showed an increase in the nationwide estimate of 13% of pregnant women using alcohol. Commenting on Peltzer's and Ramlagan's report, Adebiyi, Mukumbang and Beytell (2019) posit that such behaviour leads to a pregnant woman having a child with FASD. Furthermore, after birth, the baby may suffer a range of physical, neurological, behavioural and intellectual abnormalities that become more evident over time.

Thus, health communication planners must therefore involve pregnant women to understand and appreciate their sociocultural context an appropriate education on the consequence of FASD before a communication programme and strategy is established. The participants will exercise their agencies in foregrounding the sociocultural factors that motivated them to drink, identify the structural challenges within their community to make inputs that would be mobilised in addressing these cultures and structure for effective health communication.
Some participants also expressed opinions over the risk of HIV as a result of maternal drinking. A participant said:

> *I would like the message, but I don't know the kind of message to send since people are not even afraid of HIV*

(Interview with participant 16 on December 18, 2019. Age 35)

This participant has brought another important perspective to the study. She alluded to the fact that some pregnant women may not be afraid of HIV. A study by Desmond *et al.* (2012) on alcohol consumption being a health risk for HIV+ pregnant women in KwaZulu-Natal (KZN), reported that 17% of their respondents (207/1201) drank in the month before being aware of their pregnancy.

Also, there is a complex relationship between the use of alcohol and risky behaviours. A study done by the World Health Organisation (WHO, 2018) concluded that a higher quantity of alcohol in-take rather than the frequency influences the choices of selecting a sexual partner, and also unprotected sex.

Other studies have also shown that the use of alcohol is associated with an increased risk of acquiring HIV infection and with negative effects on people living with HIV/AIDS in terms of treatment outcomes, morbidity and mortality (Miguez*et al*., 2003; Bryant, 2006; Neuman, Monteiro & Rehm, 2006; Baliunas *et al*., 2010; Rehm *et al*., 2010; Schuper *et al*., 2010; Neuman *et al*., 2012; de Oliveira *et al*., 2016; Reis *et al*., 2016; Gross *et al*., 2017).

The agency of the participants in providing the perspective of some women not being concerned about HIV will create a dialogue between the stakeholders in a model that will foreground all the perspectives of the participants on the subject of HIV, and enable the health communication planners to take into consideration the culture and structure of the community that has affected their access to information and education on HIV.

Again, some participants also talked about the presence of drinking places in their community. A participant said:

> *I want to receive the message, and I will forward it to others. But people do not listen; maybe places selling alcohol should be closed*
>
> *(Interview respondent 20 on December 19, 2019. Age 35)*

The participant pointed out the issue of drinking places being a structure in the community that encourages drinking among pregnant women because it makes alcohol accessible and

easy to buy. As it is today, the drinking places form part of the social and economic life of various communities, and the supplies are mostly from the big corporations that brew alcoholic beverages (Olivier *et al*., 2016). Hence, the women consistently engage and negotiate with the structures in such communities. These structures are the government who are revenue beneficiary from the drinking places or (Shebeens); the local Shebeen owners to whom drinking is a source of business; some members of the neighbourhood where they are located as the business serves as a source of employment for them; and the big corporations that are the supply chain to the shebeens.

To effectively manage this structural issue, the agency and the voices of the participants become imperative. The voices of these participants can make a significant impact for the government to attend to the proliferation of Shebeens in the community through a policy review due to its consequences on pregnant women and unborn children.

The recent KwaZulu-Natal Liquor Licensing Act, 2010 (Act No. 06 of 2010), became effective on 28 February 2014, and among other things, they have a statutory mandate to:

1. Consider, grant or reject liquor licence applications in the province
2. Issue licences according to the terms of Chapter 6 of this Act
3. Improve access of liquor licences in the Province
4. Guarantee a fair, equitable and transparency in the issuance of liquor license
5. Work with members of the executive council, relevant departments, municipalities and the liquor industry in the province to apply and promote national and provincial liquor policies, norms and standards
6. Implement and support activities that tackle the objects of the Act as provided for in Section 2(b) and (d) of the KZN Liquor Licensing Act. No. 06 of 2010 as amended.

The health intervention and communication planners can therefore work with the participants who can activate their agency to provide their input and engagement of the local community leaders (Song, 2013), and also the government to review the KwaZulu-Natal Liquor Licensing Act, 2010 (Act No. 06 of 2010).

The health care professionals, communicators and the other stakeholders can evolve a memorandum of understanding highlighting the consequences the proliferation of drinking places (a major structure that can affect the culture of the community) have on the participants' communities for further engagement with the government and community leaders as well as the owners of the drinking places before designing their social behavioural change communication (Parkard, 2014)

A participant made a case in her interview for women and how people take advantage of pregnant women when drunk. She said:

> *Yes. I would like to receive messages because people like to fight when they are drunk, and men like to take advantage of women when they are drunk*.
>
> *(Interview with participant 13 on December 18, 2019. Age 35)*

This experience of getting involved in unprotected sex with a random partner who took advantage of women can be traumatic for the victim. According to a study done by Pegram, Abbey, Helmers, Benbouriche, Jilani and Woerner (2018) on men who sexually assault drinking women, they intended to measure the similarities and differences with men who sexually assault sober women and non-perpetrators. The study submitted that men who had previously assaulted a drinking woman gave their simulated date more alcohol to drink and perceived her as being more disinhibited (which is an action that seems tactless, and not thinking ahead of you nor follow social rules or compliance). Their findings demonstrate the power of alcohol expectancies and stereotypes about drinking women.

The notion of some men seeing a woman that drinks as disinhibited, and therefore susceptible and positioned as a sex object is at the heart of power dynamics between the male and female gender. In a World Health Organisation (WHO) study titled Alcohol, gender and drinking problems: perspectives from Low-Middle Income Countries (LMIC) done by Julio Bejarano-Orozco Costa Rica in 2005, he concluded that the meaning of alcohol in Costa Rica is linked with social integration, and drinking is defined as a way to facilitate social solidarity. Alcohol is seen as a culturally legitimate way to relieve the anxiety produced by social interaction, and that is why the cultural modelling of the young male includes alcohol for every social

activity in which they get involved (WHO Report, 2005). In another study by Hunt and Antin (2019), they also agreed with the study in Costa Rica and concluded that intoxication from alcohol has long been associated with men and masculinity. They argued that within many cultures, to drink is to be masculine and to drink heavily and become intoxicated is to be even more masculine, and drinking and intoxicated behaviour among men is argued as acceptable or normative because it works to affirm masculinity and increase male bonding and solidarity.

According to another study done by Scott-Sheldon, Carey, and Carey (2008), they concluded and supported the popular belief that unprotected sex is associated with alcohol use at the event level. However, another study by Weinhardt and Carey (2000) to ascertain if alcohol leads to sexual risk behaviour argued that dispositional or personality traits or attitudes and beliefs influence both behaviours. They furthered that people who are likely to use alcohol more heavily may also be more likely to engage in more sexual risk behaviour because of a specific personality trait, or a constellation of attitudes and beliefs, rather than because of a unique relationship between alcohol use and sexual risk behaviour

There is a need for the health and communication planners to form a cohort from the community of pregnant women who drink and properly understand the experiences, fears and other sociocultural influences that affect the participants. The shared experiences and opinions of the participants become useful since they have the agency for advancing their cause and negotiating with structures that may serve as a barrier from them changing their behaviour. The structures that their agencies suggest might change the culture of their communities and help them make decisions about drinking to reduce their vulnerability (Song, 2013).

A participant raised the issue of help centres and counselling for pregnant women who drink alcohol. She said:

> *Yes, I would like to receive the messages. It might help me and someone close to me…. It should tell us maybe if you get addicted which places to go to.*

(Interview respondent 5 on December 19, 2019. Age 26)

The participant said there was a need for information on how to access counselling in the event of being diagnosed as addicted. She has made a case for the location and promotion of help centres for participants, to get help. There are help centres in various health care facilities and other help centres like The South African Depression and Anxiety Group (SADAG)[29] which is involved in patient advocacy, but because of the special situation of the participants, there is a need for special centres and counselling sections for them.

According to Mitchell, Porter and McKnight-Eily (2018), the United State of America government has instituted a universal implementation of alcohol screening and brief counselling, including to pregnant women and persons of reproductive age. This could help with the achievement of a newly proposed Healthy People 2030 goal to increase alcohol abstinence among pregnant women if the same template is applied in Durban (Kleinman, 2017; U.S. Department of Health and Human Services, 2019). In their systematic review, O'Connor, Perdue, Senger, Rushkin, Patnode, Bean and Jonas (2018) found that alcohol screening and brief counselling sessions were associated with significantly increased maintenance of alcohol abstinence among pregnant women, with abstinence 2.26 times more likely in the intervention group than the control group. They counselled that nurses can talk to patients about the potential harms of excessive alcohol use and can routinely incorporate alcohol screening and brief counselling interventions into their work.

There is therefore a need for stakeholders to have a group where participants can discuss their dependency struggles with alcohol, and the success of the participants overcoming the challenge will motivate the others. Dutta (2008) and Room (2013) stress the importance of group relationships as it brings trust among group members. The experiences shared in this group meeting can form the basis for developing an educational programme and messages that will resonate with the participants. This is a critical structure (Dutta, 2008) that would be required in the participants' community.

[29] https://www.sadag.org/index.php?option=com_content&view=article&id=2920&Itemid=424 – Accessed on: March 19, 2021

Theme 3: Preferred Communication Medium and Message

This theme is directly related to research question three: What is the acceptable medium and message that can be mobilised in communicating and addressing these sociocultural factors?

In the context of this research, the medium is the agency or channel through which information is transmitted between participants; the message is the statement or information that is shared between participants.

Table 7.3: *Codes, Categories and Themes of the Acceptable Medium that can be Mobilised in Communicating and Addressing these Sociocultural Factors.*

CODES	CATEGORY	THEME
The desire for messages on television and radio	Mass Media (A medium with a mass appeal)	Preferred communication medium and message
Desire to receive a message on SMS	Social Media (A medium with interactive features to share information on the go)	
The desire for messages on Instagram		
The desire for messages on Facebook		
The desire for messages on WhatsApp		
Cost of communication infrastructure	Affordability (The power of the participants to be able to buy or unable to buy communication device)	

Awareness campaign	Approach on communication (A synergised strategy to disseminate messages to the participants)	
Reinforced message		
Desire to receive a message on notice board	Other Media (Another medium that is not electronic and digitised)	
Desire to receive a message on face-to-face communication		
Lack of antenatal attendance	Individual behaviour (The impact that personal decisions, actions and inactions have on the participants)	
Language	Effective Communication (A mode of communication that is intelligible by the participants)	
FASD	Education on the consequence of drinking (An advocacy programme to educate and inform the participants on the consequences of alcohol, and how to get support)	

Approach on communication

One of the ways of communicating for education purposes is through an awareness campaign. Awareness campaigns are designed and targeted at an issue or phenomenon so that the target audience will have information and be empowered in making choices.

A participant said:

> *I don't know much about the message but I will like to hear about it. The message can come on television so that everybody can watch it in the house*
>
> *(Interview respondent 19 on December 19, 2019. Age 35)*

The participant said she might not have adequate information on maternal drinking, but she would like to have the information. This makes it necessary for health communication and health professionals and planners to approach the dissemination of the information from an awareness point of view for education purposes.

There has been some global campaign launched like the one launched by the European Fetal Alcohol Spectrum Disorders Alliance (EUFASD Alliance) to harmonise the campaign against maternal drinking (Bazzo*et al.,* 2014) and to empower a network of global stakeholders' non-governmental organisations. However, the campaign did not resonate with the participants in Durban, KwaZulu-Natal because it did not consider their sociocultural dynamics. By implication, their nuances like their personal behaviour, their social factors of friends, their family group and their environment were not considered in the formation of the message and the management of the communication medium. (ICAP, 2009; Ojo *et al*., 2010; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016).

An awareness campaign had also been launched several times (Burgoyne, 2005), but many times, they are fragmented, and not sustained. After the distribution of flyers and other banners, the recipient only read them for that time, and many times disposes of them. According to Dutta (2008), participants need to take part in the development of health messages that are directed towards them, and therefore, Social Behavioural Change Communication is efficient and effective in this regard (Lewis and Lewis, 2015). They take ownership of the medium, it empowers them, gives them a voice and the message will resonate more with them because they have the opportunity to exercise their agency (Dutta, 2008) which is the capacity to act and engage in the social structure that is the medium they have chosen to interact with. It is therefore important that their voices are heard, not only in framing their messages but also in selecting the medium that they believe they can identify with the most.

An example of including socio-cultural considerations in a Social Behavioural Change Communication Change campaign is demonstrated in a non-profit organisation, IAMovement that coordinated a programme to effect positive social and environmental

change to promote a diversified and inclusive Trinidad and Tobago in 2018. It mobilised approximately 1,400 people to participate in 40 community climate talks programmes held in schools, public and private organisations, communities and public spaces throughout the country. Through the *Small Change* documentary and the *Climate Talk* events, IAMovement built public awareness on climate change issues, and thus concluded after the programme that the lesson they have learned was that short films which are audio-visually appealing and have strong cultural and local content were useful for advocacy (CSOs4GoodGov project, 2018)

Social Media

For this campaign to be disseminated, there is a need for the employment of media platforms for the dissemination. This is necessary as it serves as a vehicle that will bring the message to the participant.

The participants express some of the social media platforms as their acceptable medium. A participant said:

> *Yebo, I understand… Send me an email, I'm joking, WhatsApp*
> *It's because there is data, you see, hey it's difficult with Facebook*
> *But the message can be sent every day*
> *Maybe Facebook…. Data is an issue*
> *(Interview with Respondent 2, December 18, 2019. Age 19)*

The participant expressed her preference for WhatsApp as a medium of communication because the messages could be sent every day. She, however, indicated that data, which is a critical component of enabling the WhatsApp application to work on the smartphone, would be an issue.

Of the 30 participants interviewed in this study, 18 participants making up 60% wanted WhatsApp to be the communication medium, however, for health intervention and communication planners to use this medium effectively, some considerations must have to be reviewed with the pregnant women. One of such considerations is the economy of the

pregnant women not just to buy a smartphone which is a necessary tool for the use of WhatsApp, but also to be able to sustain the use of the medium through the constant purchase of data units that activates and enables the platform. This is a cost that should attribute to social media as a communication infrastructure.

In a study done by Oviatt and Reich (2019), they agree that pregnant women use the internet and social networking sites to meet a variety of pregnancy-related needs as well as to help make decisions regarding their pregnancy. They also submitted that knowing more about the current landscape of social networking sites as it relates to pregnancy can inform future work that wants to leverage social media for education or support. However, Darrell West of the Centre for Technology Innovation of the Brookings said that roughly 4.2 billion people are outside the digital revolution. With Internet usage growing globally by 9 per cent a year, around 58 per cent of the world lacks Internet access. These individuals especially in the developing countries are unable to enjoy the social, economic, and civic benefits including healthcare that is derived from digital connectivity (West, 2015). It stands to suggest that a pregnant woman with higher socioeconomic status (SES) has a higher opportunity and propensity to have access to a smartphone that is internet enabled (Collins, 2016).

A participant said:

> *English Language…. SMS. I can receive SMS even when there is no data… Yes, they should show us symbols, you see, we who are pregnant whenever we are shown the pictures of the children that were not breastfed, we are scared… The clinics should send these messages because they always see these things*
>
> *(Interview with participant 4 on December 19, 2019. Age 33)*

This participant raised the issue of receiving messages when there was no data, which relates directly to the cost of communication infrastructure. The demography of the participants in this study shows that 57% of the participants are unemployed while 43% are employed. Collins (2016) argues that socioeconomic status (SES) is one of the many factors influencing a person's alcohol use and related outcomes, though according to her, the people with lower

SES tend to bear the negative consequences of alcohol use. Conversely, a pregnant woman with low socioeconomic status (SES) may not be able to afford or sustain the data required for managing a smartphone.

Notwithstanding, the inclusion of the participant in identifying their nuanced socio-cultural situation as canvassed for in the culture centred approach (Dutta, 2008) and Social Behavioural Change Communication (SBCC) (Parckard, 2014) will allow the agency of the participants to negotiate if this medium as a structure is suitable for them. It is important to note that messages and pictures on this platform can easily be forwarded to the social group, friends (ICAP, 2009) and family (Ojo *et al.*, 2010) of the participants.

Another participant said:

> *Yes. I want to hear the message. It will help me more and my friends too…The message can come on Facebook and Instagram because more people are on Facebook*
>
> *(Interview with participant 27 on December 19, 2019. Age 35)*

This participant makes a case for Facebook and said that it would help her friends being her social group because her friends are connected to her on Facebook, thus it is easier for them to read the information on her Facebook wall.

Facebook is an online social media and social networking service that can be accessed from devices with internet connectivity, such as personal computers, tablets and smartphones. After registering, users can create profiles revealing information about themselves. They can post text, photos and multimedia which are shared with any other users that have agreed to be their "friend", or, with a different privacy setting, with any reader. Users can also use various embedded applications, join common-interest groups, buy, and sell items or services on Marketplace, and receive notifications of their Facebook friends' activities and activities of Facebook pages they follow[30]. In a study done in South Africa by Johnston *et al.* (2013),

[30]https://about.fb.com/company-info/

they submitted that Facebook is a major platform for building communities, and important for social networking and social

From the 30 participants interviewed for this study, 14 participants (47%) preferred to receive messages on Facebook. It is important to note that the economy of pregnant women is necessary when designing a communication medium. Nevertheless, participatory health communication and culture centred approach principles should be employed so that the participants' agency can negotiate through the structures and culture of their community to achieve an inclusive and participatory input that will encourage their voices to be foregrounded. Oviatt and Reich (2019) had also made the point that pregnant women use the internet and social networking sites to meet a variety of pregnancy-related needs as well as to help make decisions regarding their pregnancy. They had however concluded that the quality of the posting matters, rather than quantity.

Another participant expressed a desire for another social media platform. She said:

> *The message can come through Facebook, SMS and WhatsApp…. I am always on WhatsApp so I can forward the message to my friends*
>
> *(Interview with participant 22 on December 19, 2019. Age 18 years)*

This participant also preferred Short Message Service popularly called SMS as a medium. Out of the 30 participants interviewed by the researcher, 9 participants (30%) wanted Short Message Service (SMS) as a medium.

SMS (short message service) uses standardised communication protocols that let mobile devices exchange short text messages (Kelly, 2012). It is a text messaging service component of most telephone, Internet, and mobile device systems. At 190 bytes (a unit of digital information that consists of eight bits) and 160 characters, the SMS can only convey the message that is needed because of the limitation in characters and lucid graphics. Because of the limitation of the characters available for SMS to send messages, it is more compelling for the pregnant woman to be understood from the standpoint of her sociocultural reality approach from a culture centred approach. Their agency becomes a lot more strategic in

understanding the structures and the culture within their community so that a message that will resonate with them can be better articulated.

Another participant expressed to desire to accept the message on another social media platform. She said:

> *No, they only discuss breastfeeding at the clinic*
>
> *I don't watch TV, but SMS, Facebook and Instagram*
>
> *I don't like Facebook but I prefer Instagram because there are not lots of messages but there are pictures and WhatsApp for messaging*
>
> *Facebook and WhatsApp*
>
> *(Interview with participant 4 on December 18, 2019. Age 35)*

This participant mentioned Instagram as a medium. Out of the 30 participants interviewed, 2 participants (up 7%) mentioned Instagram as a medium. Instagram is a photo and video-sharing social networking service. The Instagram app allows users to upload media, and it can be shared publicly or with pre-approved followers.

Statista (2021)[31] in a survey reported that from January 2021 there are 5.43 million Instagram users in South Africa, up from 4.89 million in July 2020. The majority of Instagram users in South Africa were female, with women accounting for over 53.8 per cent of the app's audience in the country. In a study done by Kubheka, Carter and Mwaura (2020) on the use of social media as an effective health communication tool, they concluded by listing Instagram as one of the social media platforms or virtual communities that can be used in health promotion in South Africa. However, as Collins (2016) argued, the socioeconomic status of the pregnant woman or her household determines her ownership and management of internet-enabled smartphones that can have the Instagram platform.

Another participant indicated:

[31]%20Januwww.statista.com/statistics/1029289/instagram-users-south-africa/#:~:text=As%20ofary%202021%20there, app%27s%20audience%20in%20the%20country – Accessed February 12, 2020

Yes, I would like to receive the message, but it should understandable although some don't even go to the clinics.

The message should be through Facebook and WhatsApp because young people use them

(Interview of participant 18 on December 18, 2019. Age 25)

Though this participant prefers Facebook and WhatsApp as a medium that can be managed as a medium of communication, she also highlighted her view on some people who do not attend antenatally, and this supports the researcher's suggestion for community engagement so that the message can reach everyone in the community (CDC, 2011), and the ones that are not attending antenatal clinic can also be incorporated in the participatory health communication, so that she can exercise her agency and negotiate around the structures within her community.

Therefore, the involvement of the participant would need to be considered, in a participatory way so that they can exercise their agency in projecting their voices, and negotiate around the structure of Instagram as a communication medium

Mass Media

Another acceptable medium the participants indicated for mobilisation in communicating and addressing sociocultural factors that influence their choices is the mass media which is a medium with a mass appeal.

For instance, a participant said that the radio was acceptable to her. She said:

Yes, I would like to receive the messages on the radio or being talked to

Many people are not working, so while they are at home, they can listen to the radio even while doing other things

(Interview with participant 12 on December 18, 2019. Age 33)

This participant's response put forward an important argument that, while unemployed pregnant women are at home, they can listen to the radio even while doing their house chores

Out of the 30 participants interviewed on managing a medium, 7 participants (23%) preferred the radio. Radio is the technology of signalling and communicating using radio waves. Radio waves are electromagnetic waves of frequency between 30 hertz (Hz) and 300 gigahertz (GHz). They are generated by an electronic device called a transmitter connected to an antenna which radiates the waves, and received by a radio receiver connected to another antenna (Ellingson, 2016).

From the study of Schroeder (2016) and Hugelius*et al* (2019), it is helpful to plan health intervention messages by employing Social Behavioural Change Communication (SBCC) and culture centred approach which enables the communication planner to consult with the participants, study their situation and observe how they will use their agency to negotiate around the structure of radio as a medium of communication so that they will know how to select the time that the participants can be available, and also the kind of messages that will resonate with participants by suggesting contents that can be used by the community radio station.

Another participant said television is her acceptable medium. She said:

> *I do not mind receiving the message, other people will learn from it also… Let it be sent to SMS because I do not have a smartphone…. It can also come on television because most people watch television*
>
> *(Interview with participant 30 on December 19, 2019. Age 35)*

This participant said she wanted television, because, by her evaluation, many people watch television. She also indicated that she did not have a smartphone, but there was a television available for her to watch. In other words, television was a household communication platform for her. From the 30 interviews made with various pregnant women, 8 (27%) said television was a preferred medium.

In a study in Poland, Burzyńska, Binkowska-Bury and Januszewicz (2015) sought to review the use of mobilising television as a source of information on health and illness, they concluded that television has the potential for mass appeal, but worry that health communicators have not used its potential enough to address challenges, and also the fact

that there is need to locate the target audience since television allows various social groups regardless of age, education and place of residence to messages.

The observation pointed out in the study may be due to health interventionists and communicators not involving participants adequately in the whole process. This researcher advocates for the involvement of the participants in planning any message and the selection of the medium. The interaction with the pregnant women will enable the communication planners to develop content that would be useful to the local television station, thus its programming and content can affect their community. This will enable the planners to appreciate the culture of the participants, and with a social behavioural change communication approach that will resonate with them, and also the timing of the broadcast.

Other media

Other media in the context of this study are those that are not within the categories of social or mass media, but still offer an acceptable medium that can be mobilised for communication.

A participant said notice board is an acceptable media:

> *I will like the message so that we can learn more. It is better through television because I don't have a good cellphone… It can also come through WhatsApp or SMS or even notice board in the clinic*
>
> *(Interview of participant 20 on December 19, 2019. Age 35)*

This participant suggested the use of a notice board in also disseminating the health information. In a study done by Taylor (2010) in a rural community in trying to design and understand the role of situated display of notice board in a rural community guided by community engagement initiative, it was concluded that iterative and SBCC approaches are needed from members of the communities for the initiative to succeed. Taylor's position agrees with the point that the agency of the pregnant woman is important in guiding the progress of any programme in the community because they can appreciate better the culture and the structures in their community.

Another participant said she will prefer face-to-face communication as a medium:

> *Yes, I would like to receive the messages on the radio or being talked to...*
>
> *Many people are not working, so while they are at home, they can listen to the radio even while doing other things*
>
> *(Interview with participant 12, December 18, 2019. Aged 33)*

This participant said apart from listening to the radio, she would also appreciate face-to-face communication. Out of 30 participants, 1 participant (3%) appreciates face-to-face communication.

Face-to-face communication is a social interaction carried out without any mediating technology (Crowley and Mitchell, 1994). It is one of the basic elements of the social system that forms a significant part of individual socialisation and experience gaining throughout one's lifetime. It is central to the development of various groups and organisations composed of those individuals (Kendon, Harris and Key, 1975).

In a study done in health communication, face-to-face communication was emphasised as being important because, during the communication, the parties involved will in addition to listening to the conversation, also observe the body and facial expressions of the speaker and that way they can understand the meanings behind some words that speaker uses (Vermeir*et al*., 2015). This makes it easier and better for SBCC to be effective. The stakeholders can understand both the spoken words and the non-verbal cues for proper understanding. In a study done by Mirzaei and Kashian (2020), they concluded that patients can achieve the same level of communication effectiveness with their physicians using information technology-mediated communication as they would in comparable face-to-face interactions, but patients view face-to-face communication to be a more favourable medium than information technology-mediated communication. In another study to promote quality face-to-face communication during ophthalmology encounters in the electronic health record era according to Baxter, Gali, Chiang, Hribar, Ohno-Machado, El-Kareh, Huang, Chen, Camp, Kikkawa, Korn, Lee, Longhurst and Millen (2020) agreed that face-to-face communication was more effective.

Pregnant women can exert their agency and make their voices heard. They can negotiate around the structures within their community and express better the sociocultural factors that have influenced them and led to the formation of the culture of the community. Their agency can be expressed both with words, body and facial expressions and also with gesticulation when making emphasis on a viewpoint. This medium is not only suitable for the clinic environment, but also during community engagement meetings.

Individual Behaviour

This category speaks to the impact personal decisions, actions and inactions have on participants. However, health professionals, planners and communicators will still need to include them in a group because it is a public health concern, and it will allow them to understand their socio-cultural realities better.

From the interview, it was raised by participants that some pregnant women do not attend antenatal clinics. In a study done by Mulondo (2020) on factors associated with the underutilisation of antenatal care services in Limpopo, South Africa, he identified various socio-cultural factors as contributors to the under-utilisation of antenatal care services. Some of the identified factors are unplanned pregnancy as women are reluctant to use contraceptives for child spacing; high parity among multiparous women as a result of their belief in their own experience regarding pregnancy and childbirth; fear, which is common amongst multiparous women who do not want to undergo bilateral tubal ligation (surgery women can get to tie their fallopian tubes for birth control); and culture and beliefs that prevent women from disclosing their pregnancy or making an informed decision regarding early initiation of antenatal care services.

Some prefer to use the traditional birth attendant which has been defined in the Traditional Health Practitioners Act No 22 of 2007 as a person who has engaged in Traditional Health Practice and has been registered as "a Traditional Birth Attendant under this Act" (Yazbek, 2020). Therefore, health professionals will need to include the traditional birth attendants in the planning of communication dissemination with the participants.

A participant disclosed that her sister did not attend the antenatal clinic, and wondered how she would participate in the message development. She said:

> *Yes, I want the message. But some people don't attend clinics…. My sister is pregnant but she does not attend the clinic…. Facebook and WhatsApp… Younger people like Facebook and WhatsApp*
>
> *(Interview with participant 21 on December 19, 2019. Age 25 years)*

This participant introduced a perspective to the study, which is the notion that some pregnant women do not attend the antenatal clinic, perhaps due to religious or cultural beliefs. She even said that her sister is pregnant and not attending antenatal. It therefore must be for personal reasons that we cannot contemplate in this study since she was not interviewed. However, the fact that there are people not attending antenatal, this researcher, therefore, sees the need for community engagement as a medium.

Community engagement is the involvement and participation of stakeholders in the organisation and development of the welfare of members of the community. The stakeholders can range from government officials like the social workers and health care workers from the antenatal clinics within the community, to the pregnant women in the community. The focus is to create an environment of participation and contribution for everyone especially the pregnant women so that they can exercise their agency by negotiating the structures in the community, and also share their experiences and the prevailing culture in their community so that a message and communication through the social communication change behaviour approach will resonate with them can be developed before dissemination. In a study done by Bidandi, Ambe and Mukong (2021) by the University of Western Cape in South Africa, they concluded that since their inception they have embraced the concept of community engagement. Its early students and staff were involved with programs in the community that are still running today. This has been a result of the institution's conviction to assist disadvantaged communities in the surrounding vicinity as part of its mission statement, embracing the South African Government's policy of transformation through community engagement. This goes to show that the application of community engagement with pregnant

women who do not embrace antenatal could be reached, understood her sociocultural circumstances before advocating for her to attend.

Theme 4: Nuanced Communication Approach

A nuanced Communication Approach as a strategy aligns with research question four: What communicative approach can be utilised to provide a more nuanced understanding on how to address the phenomenon of alcohol use given the socio-cultural context of the pregnant woman?

Table 7.4*: Codes, categories and themes of the communicative approach that can be utilised to provide a more nuanced understanding of how to address the phenomenon of alcohol abuse in pregnancy.*

CODES	CATEGORY	THEME
Interactive platform	*Participatory approach* *(A combined approach that involves the participants and other stakeholders in planning, designing and communicating messages that captures the essence and voices of the participants for measured impact)*	A nuanced communication approach
Partners		
Awareness campaign	*Approach on communication* (A synergised strategy to disseminate messages to the participants)	
Desire to disseminate the message		
Language	*Effective communication* (A mode of communication that is intelligible by the participants)	
	Education on the consequence of drinking	

FASD	(An advocacy programme to educate and inform the participants on the consequences of alcohol, and how to get support)	
Consequences on other family members		
Graphic Messages	*Symbols* *Pictures and sketches that are used to convey emotive messages to the participants)*	
Cost of communication infrastructure	*Affordability* (The power of the participants to be able to buy or unable to buy communication device)	

The overarching objective of this study is to demonstrate the value of a sociocultural communication approach that will provide a more nuanced understanding of how to address the phenomenon of alcohol abuse during pregnancy by pregnant women in Durban, KwaZulu-Natal. The researcher now seeks the facilitating of the communicative approach to appreciate and understand how to address the sociocultural factors using a communicative approach that will address the voices of the participants.

Participatory Approach

Participatory approach in this context means a combined approach that involves the participants and other stakeholders in planning, designing and communicating messages that captures the essence and voices of the participants for measured impact. This approach means that the participants, the pregnant women, are consulted in the planning of the whole process from the start with a view to increasing stakeholders learning as everyone will learn from one another, and this will motivate the stakeholders including the participants to take ownership of the process and empower themselves eventually through making informed health choices and decisions.

This approach is dialogic and interactive, and stakeholders discuss the sociocultural factors that influence participants to drink alcohol so that all stakeholders can appreciate the influences that motivate maternal drinking (Lewis and Lewis, 2015; Estrada, 2018). It is

community focused that seeks to unpack the necessary influences on the group to address them (Dutta, 2008; Tufte and Mefalopulo, 2009) using the social behavioural change communication (SBCC) approach.

To achieve this kind of approach, there is a need for the stakeholders to work as partners which can be described as people engaged together in the same activity to achieve a common goal. Therefore, in the context of this study, the kind of partnership or stakeholders that should manage the process are people from the government at the provincial level, health workers from antenatal clinics, social workers, health communication planners, women community leaders and traditional birth attendants, and the pregnant women who drink alcohol, being a major stakeholder in the whole process, and whose agency the partners will rely on to develop messages and disseminate them.

A participant noted, the need for a partner:

> *The message should be in isiZulu and it should come with pictures…. It will help pregnant women know that when you drink, you will suffer even if you cannot read, you will still suffer…. Everyone should be involved in organizing the message; we should not wait for the government… I will respond to the message*
>
> *(Interview with participant 30, December 19, 2019. Age 35)*

This participant believed everybody should be involved in the communicative approach; this is consistent with the SBCC, participatory health communication and the culture centre approach. The agency of the participants is very important in not only negotiating their access to structures that have either been difficult to break or create some limitations for them. Sometimes, these structures like the Shebeens have played a role by making alcohol accessible and easy to buy. Sudhinaraset *et al*, (2016) also argue that some communities influence on alcohol use by pregnant women because such neighbourhood creates opportunities for alcohol purchasing and consumption. In another study by Adusi-Poku, Bonney and Antwi (2013). They confirmed that drinking alcohol in pregnancy is real, in the Bosomtwe District of Ashanti in Ghana, and that majority of the pregnant women drink

locally brewed alcohol in the house during meal times. The participants understand the environment and the culture and can use their agency to discuss the sociocultural factors that influence them to drink alcohol.

Participants in the group may vary in the approach of communication as the factors that influence them also vary. To respond to the research question on what communicative approach can be utilised to provide a more nuanced understanding of how to address the phenomenon of alcohol abuse in pregnancy, it is important to appreciate what a communicative approach is in the light of this study.

A communicative approach from the perspective of this study highlights that the importance of communication for effective participation. It emphasises participation and interaction to develop the participants with a focus on real-life situations and communicating meaning. It also suggests that the stakeholders will have an interactive platform where they will exchange experiences and opinions on the kind of messages that should be developed, and the medium that should be used in the dissemination of the messages.

Similarly, a participant said:

> *I want to receive the message on Radio and Television because I am always at home.*
>
> *I want the message in isiZulu. Pictures are good because if you see a picture of a disabled child due to the mother that was drinking, they might stop drinking.*
>
> *It is better with the clinic because mothers listen to nurses*
>
> *I will respond to the message. They can even do short video clips or short plays on a television or a short story on a radio*
>
> *(Interview with participant 25, December 19, 2019. Age 26 years)*

This participant indicated that there was a need for a communicative medium to be determined and used as a platform for communication. However, from the analysis made so far, different participants have different preferences for the kind of communicative medium and approach that should be mobilised. This also is in tandem with the concept of SBCC which is based on dialogue and allows participants to share information, perception,

preferences and opinions in the identification of the influences, developing programmes and strategy, and managing the communicative medium, messages and the scope. This information sharing is done through the agency of the participant whose capacity is utilised in negotiating the structures in the community. The consensus among the various stakeholders will therefore facilitate the empowerment of the participant to achieve better health outcomes as also postulated by the participatory health communication promoted by Tufte and Mefalopulos (2009).

This study, thus, proposes an interactive platform and communication approach using the strategy of a Nuanced Communicative Approach based on the model of the Social Behavioural Change Communication (SBCC) because it is dialogic and interactive and allows the communication planners to investigate the socio-cultural context of the pregnant women, understand the situation before developing a strategy. The participants will express their agency in addressing the sociocultural factors that affect their community. It will allow the participants to make a useful contribution to the content and the processes of the communicative process.

From the review of the factors that influence the participants to drink alcohol, the social and environmental factors (NIAAA, 2008; ICAP, 2009; Ojo *et al*., 2010; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016) have a strong influence on the participant as it does appear that going together to different kind of social events allows them to bond, and it then serves as motivation for them to drink. Also, the environment where the participants live is another influence on them. From the proliferation of Shebeens which the mandate for the liquor acts does not address the peculiar challenge of pregnant women who may have access to buy alcohol from them.

However, with the involvement of the participant in the process of understanding the socio-cultural factors that influence them to drink, the participants can make contributions and suggestions during the development of messages that can address information inequalities. They will foreground their voices; use the agency to negotiate around the structures inherent in the system that are barriers to the voices of the participants from being heard. Their culture which is evolving will be their focus, and they will constantly be in dialogue with the other

stakeholders to continually address these social influences particularly from the angle of their friends, family and the environment (NIAAA, 2008; ICAP, 2009; Ojo *et al*., 2010; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016).

Social Behavioural Change Communication (SBCC) will therefore incorporate the participants into making contributions to the methods, processes, tools and the conversation in an interactive and dialogic way, and will empower the participants to also suggest the communication infrastructure and the technology that could be used in information dissemination (Packard, 2014; JSI, 2020). The participants will foreground their preference for certain communication technology and infrastructure as long as it will address their needs and provide reach for all the members of their community.

According to Packard (2014), Social Behavioural Change Communication (SBCC) emphasises that social change goes beyond changes in attitudes or behaviour, or awareness, but addresses the fundamental issues of change itself which the participants have identified, and it is dominant in the social influences in the environment. In this regard, the communication medium preferred by the participant should also go beyond attitudinal and behavioural change, but endeavour to reinforce a new culture that will empower the participants to make informed health decisions like reducing if not total abstinence from drinking alcohol during pregnancy.

Further, the participants require a communicative approach that will resonate with them, based on their experiences and realities, the researcher, therefore, suggest an approach of health communication advocated by Storey *et al* (2014) and is consistent with the principles of communication for social change (CFSC). It will assist in the reviewing of the personality and sociocultural influences that serve as motivators to pregnant women. It advocates for a decentralised health communication approach where the participant can take ownership of the process and personalise the message, exchange the messages between themselves either orally or with visuals to be able to make informed health choices. It encourages a diversity of channels using both the traditional channels or e-health and m-health technologies and applications. As the participant said, everyone is involved, and most importantly, the agency

of the participant is important to negotiate and re-negotiate structures within the community as the culture keep changing.

Effective communication

To communicate effectively as a group, and there is a need to use a language that is acceptable and intelligible to all. One of the participants said:

> *English and isiZulu are fine. I think that the message will be of help even to children because they will know that if you drink or take drugs, what will be the results of your pregnancy.*
>
> *Everybody should be involved in sending the messages because we all get affected at the end*
>
> *(Interview with participant 11, December 18, 2019. Age 35)*

King Edward VIII Hospital in Durban, the location of this study, is a multicultural city that hosts different races of people both from South Africa and abroad. The residents are Whites, Indian/Asia, Black Africans, Coloured, and others. With the distribution of the population across the city, coupled with the immigrant population, Durban is bedevilled with the attendant urban life that comes with drinking alcohol (Jayne *et al.,* 2006).

The use of appropriate langue to communicate health information is imperative. These participants here made a case for the use of English and isiZulu languages for communication. This is especially important to achieve a universal purpose of reaching the pregnant women who live in Durban, both the indigenous people that are amaZulu, the other races who do not speak isiZulu, and the migrant communities. Shamsi, Almutairi, and Al Kalbani (2020) submit that the language barrier poses challenges in terms of achieving high levels of satisfaction among medical professionals and patients, providing high-quality healthcare and maintaining patient safety, and also made a recommendation for the engagement of an interpreter where necessary. However, it is important to use isiZulu where all the participants are amaZulu. The foregoing reveals that the composition of the group is important. The agency of the participant will negotiate on how to resolve the language that

will be used, as they will identify the structures of language and the culture within their community, and negotiate on how to use a language that will resonate with them.

Symbols

Some participants however made a case not only for an acceptable language but also the use of graphics messages to reinforce communication to the community. A participant said:

> *In isiZulu. I like SMS*
>
> *That's (symbols) the right one because it can frighten people. Maybe if you can put a chart of a person that has been drinking while pregnant and the child that is disabled or paralysed*
>
> *I don't think government can do it since they are so busy. Maybe people like community workers can do a better job since they are always visible in the community*
>
> *(Interview with participant 6, December 18, 2019. Age 35)*

The participant expressed her desire that the message that would eventually become part of what would be disseminated should have graphics as part of the content. For this study, graphic communication is communication using graphic elements which include symbols such as icons and images such as drawings and photographs. She added that fear invokes emotions, and if the message is accompanied with graphics messages for participants to see the consequences of how maternal alcohol drinking can cause harm to the child who will be born with a fetal alcohol syndrome disorder (FASD), and perhaps, the graphics of child with the presentation of FASD can cause the abstinence (Olufunto*et al,* 2015).

In a study done by Simpson (2017) on appeal to fear in health care in Australia, he intended to find out if it is appropriate or inappropriate. He argued that though it is used in public health campaigns like anti-smoking and anti-drunk driving, he, however, concluded it is effective and appropriate in health care, but it must be backed with evidence of the consequences of the behaviour. In another study in the Republic of Ireland, Sweeney and Stephens (2013) also corroborated that the fear effect can be helpful, but the campaign has to be sustained so that it does not fade away from the memories of the target audience, and

fear appeal campaigns must be supported by enforcement if attitudes and behaviours are to change.

In a study on graphic communication, Keyan Tomaselli and Ruth Tomaselli (1984) argued that it is a design and evaluation of health education to communicate with semi-illiterates. Graphic communication encompasses all phases of the processes, from the origination of the idea through reproduction, finishing and distribution through electronic transmission. Piers Carey (2011) also underscores how graphics is important in communicating within the Zulu culture in KwaZulu-Natal, and how it has been useful in the fight against HIV/AIDS. Melody Ninomiya (2017) also submitted that graphics communication was useful in promoting community-based health research with the view to advancing community engagement and knowledge utilization.

Another participant in her opinion on graphics said:

> *isiZulu is okay. Pictures are okay. There should be writing that explains what the picture is talking about*
>
> *Government should talk. Didn't you listen to the speech of President Cyril Ramaphosa on the 16th of December?*
>
> *I can respond to the message, provided there is something to say. If there is none, I can just read it and leave it like that.*
>
> *I want to receive the message on Radio and Television because I am always at home.*
>
> *I want the message in isiZulu. Pictures are good because if you see a picture of a disabled child due to the mother that was drinking, they might stop drinking.*
>
> *It is better with the clinic because mothers listen to nurses*
>
> *I will respond to the message. They can even do short video clips or short plays on a television or a short story on a radio*
>
> *(Interview with participant 8 on December 19, 2019. Age 33)*

The participant in her comments suggested that a short video clip or short play should be featured. This suggestion is suitable for the electronic mediated devices except for the radio which does not have the visual feature, and SMS which has a limited character to send

messages. A study was done by Chiong-Rivero, Robers, Martinez, Manrique, Diaz, Polito, Vajdi, Chan, Burnett, Delgado, Chinea, McCauley, and Amezcua (2021) titled effectiveness of film as a health communication tool to improve perceptions and attitudes in multiple sclerosis postulated that health communication interventions, like film, are effective tools in promoting positive attitudes and health literacy. The use of audio-video technologies to promote self-care and improve outcomes has been well accepted among underrepresented communities. In another study, Abhijit Bora (2020) argues that film or cinema has always been a powerful medium that can be adapted to various situations of human societies anywhere in the world whenever necessary. He said that it possesses a huge potential in making a point felt meaningfully by human beings if properly disseminated. The scholar said that government should encourage the film or cinema fraternity including individuals, established firms and academia/research organisations to make films specifically aimed at facilitating awareness creation and empowerment of people in health-related issues and risks involved.

The participant also made a case for graphics and pictures to be shown to the pregnant women during the engagement with the planners of the health communication. However, the design, layout and typography of the graphics will still need to be discussed, agreed and finalised by the stakeholders. The agency of the pregnant woman is important here because they will appreciate the kind of design or picture that will communicate the desired effect when communicated within the community, and they can also exert their agency in negotiating around the structure of the graphic development. The pregnant women can therefore negotiate with the other stakeholders in the group who can use their skill to sketch or design a graphic that will bear the imprint of the participants.

In a study done by Houts, Doak, Doak, and Loscalzo (2005) on the role of pictures in improving health communication, a review of research on attention, comprehension, recall, and adherence concluded that pictures closely linked to written or spoken text can when compared to text alone, markedly increase attention to and recall of health education information. They said that pictures can change adherence to health instructions, but an emotional response to pictures affects whether they increase or decrease target behaviours.

They argued that all patients can benefit, but patients with low literacy skills are especially likely to benefit. Patients with very low literacy skills can be helped by spoken directions plus pictures to take home as reminders or by pictures plus very simply worded captions.

The design of the communication mode may involve either taking a picture of the graphics, or record the images if it is necessary, and encode by uploading them to a smartphone or computer device that is internet-enabled, and held by all the participants. In a situation where the communicative approach is through a notice board either in the clinic or town hall during community engagement activities, the still pictures can be posted on the notice board, or the video can be played to the participant during the community engagement as suggested by the participant.

Conclusion

The chapter analysed the demography and biography of the participants and linked their respective attributes to literature. The chapter also discussed each of the themes, analysing the factors that influence the pregnant women to drink alcohol in Durban by discussing the identification of motivations for maternal drinking, development of programmes and strategies, managing the preferred communication medium, the messages and scope and then the facilitation of a communicative approach. In addition, the chapter discusses Social Nuanced Communicative Approach in the Behavioural Change Communication (SBCC) model as a communication strategy suitable for the participants. The next chapter draws conclusions based on the analysis done in this chapter, and also makes recommendations on the study.

CHAPTER SEVEN

CONCLUSION

Introduction

This chapter summarises and synthesises the sociocultural factors that influence pregnant women to use alcohol while they are pregnant in Durban, KwaZulu-Natal, as well as the components of the appropriate message. The chapter also reviews the communication media that they suggested and that will resonate with them in disseminating the appropriate messages. Further, the chapter also develops a communication approach or strategy called a nuanced communicative approach based on the findings of this research work. The chapter also discusses the social and behavioural change communication (SBCC) as the main model for the approach with the communication for social change (CFSC) taking into cognisance the technology dimension of the SBCC model to achieve the overarching objective.

Main Findings of the Study

The study sought to appreciate the role of SBCC as the main model in seeking to understand and addressing sociocultural factors that influence pregnant women who drink alcohol in Durban. To achieve this, the researcher did 30 structured interviews with 30 different participants to appreciate factors that influence them to drink alcohol and also reviewed the communication approach that was mobilised in addressing the phenomenon of pregnant women who drink alcohol. The study argued that it was not resonating with the pregnant women who drink alcohol in Durban because of their voices and sociocultural situation (Mody, 1991; Dutta, 2008, 2011; NIAAA, 2008; ICAP, 2009; Ojo *et al*., 2010; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016) were not investigated nor taken into account when planning the advocacy programme. To achieve this, the researcher employed the CCA (Dutta, 2008) and a participatory health communication approach (Tufte and Mefalopulo, 2009) using the SBCC model to argue for the mobilisation of pregnant women in locating the message that will resonate with them and address the factors that influence them, and the media that will be suitable to them.

The analysis (as contained in Chapter Six) revealed that social and environmental factors were the dominant factors that influence pregnant women to drink alcohol. Social factors relate to society, the social order and its organisations like friends and family; and environmental factors in this context refers to the environs, its activities and conditions in which the participants live and function, and there is a relationship between the two factors (Yen and Syme, 1999).

The data showed that although some of the women started drinking early because of family influence on them (ICAP, 2009; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016)), or personal traits (Epstein *et al.,* 2002; Room, 2013), this habit was later reinforced by the social group that these participants belong to particularly friends and the environment they live in (NIAAA, 2008; ICAP, 2009; Peltzer, Davids and Njuho, 2011; Room, 2013; Morojele and Ramsoomar, 2016; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016). Social factors that motivate them to drink are attending parties, and sometimes going out to clubs for binge drinking. These factors are also exacerbated by the low socioeconomic status due to unemployment, and educational level of the pregnant women which can serve as a veritable push factor and motivation because of living in an environment with the presence of shebeens as this will make the pregnant woman develop a social tolerance to use of alcohol (Desmond *et al*., 2012; May *et al*., 2005; 2008; Urban *et al*., 2008). This social tolerance contributes to the participants hesitating in taking a firm decision to stop drinking. However, the ones that are employed can buy the drink for themselves (Obot, 2006).

The study concludes that with the proliferation of drinking places and liquor stores in various communities in Durban, pregnant women have access to buy alcoholic drinks as long as they have money (Adusi-Poku, Bonney and Antwi, 2013; Sudhinaraset *et al*, 2016). However, a policy on FASD with a component to communicate the issues with a pregnant woman having access to drinking places like taverns and shebeens in their communities and also liquor stores may be considered (Adebiyi, Mukubang and Baytell, 2019).

According to Symons *et al.* (2020) in a study, he did in Australia which recorded a reduction of alcohol by pregnant women, there was evidence that a community-led strategy will work can apply

to similar communities. To this end, there is need to mobilize an approach what will unite the stakeholders being the antenatal nurses, government worker that oversees the community engagement activities at the provincial and municipality level, the health communication officer and the pregnant women that drinks alcohol.

Also, it is established that there should be a campaign to educate members of the community/neighbourhood (especially women as some of them are friends to the pregnant women) where the pregnant women live that maternal drinking is dangerous both to the pregnant woman and the unborn child and that they as community people are partners in promoting the campaign against maternal drinking (Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset et al, 2016).

To support the educational campaign, the study also submits that since some participants expressed that they would prefer social media platforms like WhatsApp and SMS as a medium for communication. MomConnect, a programme coordinated by the National Department of Health to send messages to pregnant women throughout their pregnancy, can be mobilised as a platform for communication with the participants. Some other participants suggested other forms of communication and media like electronic, community engagement and face-to-face communication.

Based on the findings, this study also proposes that an integrated and comprehensive communicative approach which the researcher calls a Nuanced Communicative Approach. It is required for the campaign against maternal drinking using SBCC as a model. As revealed in the analysis, the participants are not in agreement on a single approach to communicating with them, as they preferred different communicative approaches. The participants, however, will be consulted in identifying the factors that influence them to drink, the message development and selection of a preferred medium that will disseminate the message, and that will resonate with them and carry their respective voices.

Other studies though employed the SBCC model to tackle some health problems, this researcher proposes the formation of a team at the micro-level (provincial and community level). The Nuanced Communication Approach will include two policymakers each representing the political authority (executive and legislative arms) from the municipality

and province so that it will have a deliberate policy, and perhaps, legislative backing; social workers from the municipality and province who are engaged in community engagement activities; antenatal health workers; traditional birth attendant; traditional and tribal female leaders in the community the participants live; health communication planners interacting with the participants being the pregnant women who drink alcohol so that they can develop a comprehensive and multi-dimensional communicative approach for advocacy. It can seek to follow the process according to Parckard (2014), through these five steps which are:

1. In undertaking formative research, the political/policy leaders, community leaders, government workers, health and communication professionals will interact with the participants to understand the context of the community in Durban thorough situation analysis.

   To this end, the factors identified in this study as the sociocultural influences on the Durban pregnant women being social and cultural events like parties, festivals etc; social groups which include friends, families and neighbours; social tolerance which is a function of social compliance and drinking culture; hesitation from abstinence because of fear of not developing social stigma among friends; low economic and education status that can cause economic stress and make the participant vulnerable; location of shebeens in the locality and personality/individual disposition because of the socio-cultural influences and nuances localised to the Durban participants.

2. These sociocultural nuances among the Durban participants become the basis of a nuanced communicative approach which might be different from other SBCC advocacy programmes that did not localise their findings to the Durban experiences to address issues like their cultural upbringing, beliefs and myths within the community, and understanding how they can close the knowledge and belief gaps, the kind of symbols that will reinforce the messages through pictures and graphics, designing of the message that will be disseminated to the participants taking into cognisance affordable communication network and device available to the participants.

3. The researcher suggests the creation of activities and contents using material and other tools like the appropriate and intelligible language for effective communication that the respective participant is comfortable with.
4. Then the advocacy, education and campaign can be implemented using an appropriate medium depending on what the participant(s) can afford, and the time the message should come to them.
5. As earlier stated, the Nuanced Communicative Approach is based on the SBCC process, therefore, there is a need to periodically evaluate the outcome(s) of the campaign to see its effect, and also investigate emerging sociocultural factors among the participants in the community since there will be new entries of participants, for re-planning the process again.

These sociocultural factors, which are the various voices and nuances of the participants (Dutta, 2008; Mody, 1991; Dutta, 2008, 2011; NIAAA, 2008; ICAP, 2009; Ojo *et al*., 2010; Room, 2013; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016) become important in forming the type of messages that can be developed to communicate with them and address the phenomenon. The respective experiences of the participants are in the various responses that form the nuanced communication approach. I should aid the message design for any campaign, education and advocacy using the appropriate language, and medium that is affordable and accessible by the participants. This will ensure effective communication.

The interaction and engagement of the participants and their agencies and voices are, dialogic, consultative, ongoing, process-driven, recurring and interactive, and the messages will be communicated through an appropriate medium (Tufte and Mefalopulos, 2009; Estrada, 2018; Song, 2013; Kreuter and Lezin, 2002 and Sudhinaraset *et al*, 2016; Packard, 2014; SBC3, 2018; JSI, 2020) to address the phenomenon.

Recommendations for Future Research

While the research was comprehensive, it has also opened up areas for further research to be done on the subject which will be significant in contributing to the phenomenon of pregnant women drinking alcohol. One of the areas for further research will be to undertake a study in

another urban area, and perhaps a rural area with different demography from Durban in KwaZulu-Natal, and see if the sociocultural factors that influence pregnant women are the same and if the Nuanced Communication Approach will be appropriate in that demography.

Another area for future study will be for research to be undertaken to follow up with the pregnant women in the community where this Nuanced Communicative Approach has been applied as a strategy to ascertain the progress of the campaign against maternal drinking.

References

Abel, E. (1998). "Fetal Alcohol Syndrome: The American Paradox.*"Alcohol and Alcoholism Journal,* 33 (3): 195-201.

Abi-Khalil, C.F.,Travert, S.,Fetita, F.,Rouzet, R., Porcher, J.P.,Riveline, S.,Hadjadj, E., Larger, R. And Vexiau, P. (2010). "Fetal Exposure To Maternal Type 1 Diabetes Is Associated With Renal Dysfunction At Adult Age." Diabetes 59(10): 2631-2636.

Adams, S. (2009*).* "Foreign Direct Investment, Domestic Investment and Economic Growth in Sub-Saharan Africa.*"Journal of Policy Modelling* 31(6): 939-949.

Adebiyi, B. O. M., Ferdinand C; Beytell, and Anna-Marrie,(2019). *"*To What Extent Is Fetal Alcohol Spectrum Disorder Considered In Policy-Related Documents In South Africa: A Document Review." *Health Research Policy And Systems*, 17(46).

Agbebi, M. And Virtanen, P. (2017). Dependency Theory: A Conceptual Lens to Understand China's Presence in Africa? Forum for Development Studies, *Taylor & Francis.*

Agrawal, A. L., Michael T; (2008). "Are There Genetic Influences on Addiction: Evidence From Family, Adoption and Twin Studies." *Journal of Addiction,* 103 (7).

Ahiakpor, J. C. (1985). "The Success and Failure of Dependency Theory: The Experience Of Ghana." International Organisation: 535-552.

Airhihenbuwa, C. (1995). "Health And Culture: Beyond the Western Paradigm." *Journal of Nursing Standards*, 9(42).

Airhihenbuwa, C. O. (2010). "Culture Matters in Global Health." *European Health Psychologist* 12(4): 52-55.

Airhihenbuwa, C. O., C. L. Ford and J. I. Iwelunmor (2014). *"*Why Culture Matters in Health Interventions: Lessons From HIV/AIDS Stigma And Ncds." *Health Education and Behaviour* 41(1): 78-84.

Ajzen, I. (1991). *"*The Theory of Planned Behavior."*Organisational Behaviour and Human Decision Processes 50(2*): 179-211.

Albertyn, C. M., M; (1993). Alcohol, Employment and Fair Labour Practice. Cape Town, South Africa: Jutta.

Albrow, M. And E. King (1990). Globalisation, Knowledge and Society: Readings from International Sociology. *Sage Publications,* Aug 1, 1990

Al-Fedaghi, S. (2012). "A Conceptual Foundation for the Shannon-Weaver Model of Communication." *International Journal of Soft Computing 7*(1): 12-19.

Allen, A. N. (2013). "Policing Alcohol and Related Crimes on Campus.*"* Open Access Dissertation: Criminology And Criminal Justice. The University of South Carolina,

College of Arts and Sciences, Degree of Doctor of Philosophy

Anderson, P., Chisholm, D. And D. C. Fuhr (2009). "Effectiveness and Cost-Effectiveness of Policies and Programmes to Reduce the Harm Caused By Alcohol." *The Lancet* 373 (9682): 2234-2246.

Anderson, P., De Bruijn, A., Angus, K., Gordon, R. and Hastings, G., 2009. Impact of alcohol advertising and media exposure on adolescent alcohol use: a systematic review of longitudinal studies. *Alcohol and alcoholism*, *44*(3), pp.229-243.

Andrew, P. (2012). The Social Construction of Age: Adult Foreign Language Learners, Multilingual Matters.ISBN: ISBN-978-1-8476-9614-4

Andrews, T. (2012). "What Is Social Constructionism?"Grounded Theory Review11(1).

Angell, B. (2013). Behavioural Theory. Encyclopedia of Social Work. T. D. Mizrahi and Larry E (Eds). *Oxford University Press Online Publication*

Antonovsky, A. (1972). "A Model to Explain Visits to the Doctor: With Specific Reference to the Case of Israel.*"Journal of Health and Social Behaviour*13 (4): 446-454.

Armstrong, E. M. and E. L. Abel (2000). *"*Fetal Alcohol Syndrome: The Origins of a Moral Panic.*" Alcohol and Alcoholism 35(3):* 276-282.

Armstrong, T. D. and E. J. Costello (2002). "Community Studies on Adolescent Substance Use, Abuse, or Dependence and Psychiatric Comorbidity." *Journal of Consulting and Clinical Psychology* 70(6): 1224.

Armstrong, T. D. and M. R. Crowther (2002). "Spirituality among Older African-Americans." *Journal of Adult Development* 9(1): 3-12.

Asiamah, N., H. K. Mensah and E. F. Oteng-Abayie (2017). "Do Larger Samples Lead to More Precise Estimates? A Simulation Study.*"American Journal of Educational Research*5(1): 9-17.

Association, A. P. (2013). Diagnostic and Statistical Manual for Mental Disorders*: DSM-5*. New York: American Psychiatric Association.

Auerswald, E. H. (1985). "Thinking about Thinking in Family Therapy.*" Family Process* 24(1): 1-12.

Babor, T. F., Caetano, R., Casswell, S., Graham, K., Grube, J., Hill, L., Holder, H., Homel, R., Rehm, J. and Room, R. (2010). "The Alcohol and Public Policy GroupAlcohol: No Ordinary Commodity— *A Summary of the Second Edition*. Addiction105: 769-779.

Babor, T. F., Robaina, K., Brown, K., Noel, J., Cremonte, M., Pantani, R., Peltzer, R.I.and Pinsky, I. (2018). "Is the Alcohol Industry Doing Well by 'Doing Good'? Findings from a Content Analysis of the Alcohol Industry's Actions to Reduce Harmful Drinking.*" BMJ Open*8(10): E024325.

Babor, T. F., Z. Xuan, D. Damon and J. Noel (2013). "An Empirical Evaluation of the US Beer Institute's Self-Regulation Code Governing the Content of Beer Advertising."*American Journal of Public Health* 103(10): E45-E51.

Baliunas, D. R. J; Irving, HandShuper, P. (2010). "Alcohol Consumption and Risk of Incident Human Immunodeficiency Virus Infection*:* A Meta-Analysis." *Int J Public Health*55(3): 159-166.

Banda, Y., V. Chapman, R. L. Goldenberg, J. S. Stringer, J. F. Culhane, M. Sinkala, S. H. Vermundand B. H. Chi (2007). "Use of Traditional Medicine among Pregnant Women in Lusaka, Zambia."*J Altern Complement Med13(1):* 123-127.

Bandura, A. (1969). "Social-Learning Theory of Identificatory Processes." *Handbook of Socialisation Theory and Research*213: 262.

Banerjee, S. C., R. Manna, N. Coyle, M. J. Shen, C. Pehrson, T. Zaider, S. Hammonds, C. A. Krueger, P. A. Parker and C. L. Bylund (2016). "Oncology Nurses' Communication Challenges with Patients and Families: A Qualitative Study." *Nurse Education in Practice*16(1): 193-201.

Banister, E., Piacentini, M.G. and Grimes, A., 2019. Identity refusal: Distancing from non-drinking in a drinking culture. *Sociology*, *53*(4), pp.744-761.

Barakat, A. B.-Z., Agnieszka; Choi, Alex; Plakkat, Urmila; Diloreto, Denis S; Yellanki, Priyadarshini; Carlson, John E; (2009). "The Cinnamyl Alcohol Dehydrogenase Gene Family in Populus: Phylogeny, Organisation and Expression."*BMC Plant Biology: Open Access Journal*9(26).

Barber, M. D. (2012). Participating Citizen: A Biography of Alfred Schutz, Suny Press. (August 6, 2004). SUNY series in the philosophy of the social sciences.State University of New York Press, 90 State Street, Suite 700, Albany, NY 12207

Barry, K.L. and Blow, F.C., 2016. Drinking over the lifespan: Focus on older adults. *Alcohol research: current reviews*, *38*(1), p.115.

Bazzo, S. M., Francesco; Black, Diane; (2014). "An International Campaign to Raise Awareness of the Risks of Drinking in Pregnancy."*The International Journal of Alcohol and Drug Research*, 3(1): 113-119.

Beato, R. R. and J. Telfer (2010). "Communication as an Essential Component of Environmental Health Science."*Journal of Environmental Health* 73(1): 24.

Beato, R. R. and Telfer, J (2010). "Communication as an Essential Component of Environmental Health Science." *Journal of Environmental Health*73(1): 24.

Becker, M. (1974). "The Health Belief Model and Personal Health Behaviour."*Health Education Monographs*, 2: 324-338.

Benoot, C., Hannes, K.andBilsen, J. (2016). "The Use of Purposeful Sampling in a Qualitative Evidence Synthesis: A Worked Example on Sexual Adjustment to a

Cancer Trajectory.*"BMC Medical Research Methodology*16(1): 21.

Berger, M. P. And W.-K. Wong (2009). *An Introduction to Optimal Designs for Social and Biomedical Research*.John Wiley & Sons Ltd. ISBN: 978-0-470-69450-3

Berman, A., Figueroa, M. E. and Storey, J. D. (2017). "Use of SMS-Based Surveys in the Rapid Response to the Ebola Outbreak in Liberia: Opening Community Dialogue.*"Journal of Health Communication*22(Sup1): 15-23.

Betsch, C., R. Böhm, C. O. Airhihenbuwa, R. Butler, G. B. Chapman, N. Haase, B. Herrmann, T. Igarashi, S. Kitayamaand L. Korn (2016). "Improving Medical Decision Making and Health Promotion through culture-sensitive Health Communication: An Agenda for Science and Practice.*"Medical Decision Making*36(7): 811-833.

Bidandi, F., Ambe, A.N. and Mukong, C.H., 2021. Insights and Current Debates on Community Engagement in Higher Education Institutions: Perspectives on the University of the Western Cape. *SAGE Open, 11*(2), p.21582440211011467.

Blencowe, H., S. Cousens, D. Chou, M. Oestergaard, L. Say, A.-B. Moller, M. Kinney, J. and Lawn, G. (2013). "Born Too Soon: The Global Epidemiology of 15 Million Preterm Births.*" Reproductive Health10*(1): S2.

Boddy, C. R. (2016). *"*Sample Size for Qualitative Research." Qualitative Market Research*: An International Journal*.Volume 19. Issue 4

Boudourides, M. (2003). "Constructivism, Education, Science and Technology."Canadian Journal of Learning And Technology/La Revue Canadienne De L'apprentissage Et De La Technologie29(3).

Boyce, C. And P. Neale (2006). *"*Conducting In-Depth Interviews: A Guide for Designing and Conducting In-Depth Interviews for Evaluation Input."*Pathfinder International* 9 Galen Street, Suite 217 Watertown, MA 02472 USA

Boyd, C. J., S. E. Mccabe and M. Morales (2005). "College Students' Alcohol Use: A Critical Review.*"Annual Review of Nursing Research23*: 179.

Boyd, D. M. And N. B. Ellison (2007). *"*Social Network Sites: Definition, History and Scholarship.*" Journal of Computer-Mediated Communication*13(1): 210-230.

Braun, V. And V. Clarke (2006). "Using Thematic Analysis in Psychology.*"*Qualitative Research in Psychology3(2): 77-101.

Breuer, F. (2003). Subjectivity and Reflexivity in the Social Sciences: Epistemic Windows and Methodical Consequences.In Forum Qualitative Sozialforschung/Forum: *Qualitative Social Research* (Vol. 4, No. 2).

Brody, G. H. And G. M. B. Neubaum (1976). "Health Consequences of Alcohol." NIDA *Research Monograph168*: 137.

Brody, G. H., E. Neubaum, G. M. Boyd and M. Dufour (1997). "Health Consequences of Alcohol Use in Rural America." Rural Substance Abuse: State of Knowledge and Issues: 137-174.

Bryant, K. J. (2006). ″Expanding Research on the Role of Alcohol Consumption and Related Risks in the Prevention and Treatment of HIV/AIDS." Substance Use and Misuse41(10-12): 1465-1507.

Bulletin, W. C. G. (2020). ″Fetal Alcohol Syndrome Awareness Programme." Retrieved December 21, 2020, from https://Www.Westerncape.Gov.Za/General-Publication/Fetal-Alcohol-Syndrome-Awareness-Programme.

Burger, M. (2017). "Participations: Rethinking South African Universities' Development-Oriented Community Engagement." Communicare: *Journal For Communication Sciences In Southern Africa*36(2): 1-24.

Burgoyne, L. L. J., Dennis W., Bikhazi, G.B. and De-Armendi, A; (2005). ″Isosulfan Blue Causes Factittious Methemoglobinemia in an Infant*″Paediatric Anaesthesia Journal*, 15(12).

Burgoyne, W. W., Barb; Armstrong, J. (2006). "Reaching Women of Childbearing Age with Information about Alcohol and Pregnancy through a Multi-Level Health Communication Campaign*" Journal of the Kettilbruun Society for Social and Epidemiological Research on Alcohol.*

Burlew, K. A. C., Carrvalire, J., Chizara-Ahuama, Ca. and Donald A. (2013). "Does Cultural Adaptation Have a Role in Substance Abuse Treatment?*″ Social Work Public Health Journal*28: 440-460.

Burns, N. and K. Groves (1997). The practice of Nursing Research. Philadelphia, PA: WB Saunders Company

Butts, R. and Brown, J (1989). "Constructivism and Science." Essays in Recent German Philosophy. (Vol. 44). *Springer Science & Business Media*.

Campbell, R. and Langford, R. E. (1995). Substance Abuse in the Workplace. *Taylor & Francis*.CRC Press

CANARI. (2018*).* ″Caribbean Natural Resources Institute: Csos For Good Governance: Civil Society Advocacy Case Studies " Sustainable Cities And Communities NetworkRetrieved December 21, 2020, from Http://Www.Findglocal.Com/TT/Barataria/183694262348141/Csos4goodgov.

Cardey, S. (2006). From Behavioural Change to Social Change: Planning Communication Strategies for HIV/AIDS. Knowledge Societies for All.Knowledge Societies for All, *International Association for Media and Communication Research*. (Unpublished)

Carey, P. (2011). ″From the Outside in A Place for Indigenous Graphic Traditions in Contemporary South African Graphic Design." Design Issues27(1): 55-62.

Carter, S. M. and M. Little (2007). "Justifying Knowledge, Justifying Method, Taking Action: Epistemologies, Methodologies, and Methods in Qualitative Research."*Qualitative Health Research* 17(10): 1316-1328.

Casiro, O. S., RS; Pelech, A; and Taylor, V; (1994). "Public Awareness of the Risks of Drinking Alcohol during Pregnancy: The Effects of a Television Campaign. Child Health Committee, Manitoba Medical Association."*Canadian Journal Of Public Health*85(1): 23-27.

CDC. *(2020)*. "Fetal Alcohol Spectrum Disorders: Alcohol Use in Pregnancy." Retrieved December 18, 2020, from Https://Www.Cdc.Gov/Ncbddd/Fasd/Alcohol-Use.Html.

Champion, V. S. (2008). The Health Belief Model. In Health Behaviour and Health Education. K. R. Glanz, B; Viswanath, K. San Franscisco, Eds. California: Jossey-Bass. 4: 45-65.

Chandler, D. and R. Munday (2011). Shannon and Weaver's Model, Oxford University Press.

Chen, J.H. (2012). "Maternal Alcohol Use during Pregnancy, Birth Weight and Early Behavioural Outcomes." *Alcohol and Alcoholism*47(6): 649-656.

Chong, C.-H. And K.-J. Yeo (2015). "An Overview of Grounded Theory Design in Educational Research."*Asian Social Science11*(12): 258.

Cleary, M., G. E. Hunt, S. Matheson and G. Walter (2009). *"Psychosocial Treatments for People with Co-Occurring Severe Mental Illness and Substance Misuse: Systematic Review."J Adv Nurs* 65(2): 238-258.

Coleman, C. I., J. H. Hebert and P. Reddy (2003). "The Effects of Panax Ginseng On Quality Of Life." *Journal of Clinical Pharmacy and Therapeutics*28(1): 5-15.

Collins, H. M. (1983). *"The Sociology of Scientific Knowledge: Studies of Contemporary Science."*Annual Review f Sociology9: 265-285.

Collins, S.E., 2016. Associations between socioeconomic factors and alcohol outcomes. *Alcohol research: current reviews*, *38*(1), p.83.

Corbin, J. And A. Strauss (2008). "Strategies for Qualitative Data Analysis." Basics of Qualitative Research. Techniques and Procedures for Developing Grounded Theory3.

Corcoran, N. (2011). Working on Health Communication. United Kingdom: *SAGE Publications* Ltd.

Crawford-Williams, F. S., Mary; Esterman, Adrian; Fielder, Andrea; Mikocka-Walus, Antonina; (2015). "My Midwife Said that Having a Glass of Red Wine was Better for the Baby": A Focus Group Study of Women and their Partner's Knowledge and Experiences Relating to Alcohol Consumption in Pregnancy."*BMC Pregnancy and Childbirth*15(1): 79.

Crawford-Williams, F., A. Fielder, A. Mikocka-WalusandEsterman, A. (2015). "A Critical

Review of Public Health Interventions Aimed at Reducing Alcohol Consumption and/or Increasing Knowledge among Pregnant Women.*"Drug And Alcohol Review*34(2): 154-161.

Creswell, J. W. And W. Zhang (2009). "The Application of Mixed Methods Designs to Trauma Research.*"Journal of Traumatic Stress*22(6): 612-621.

Cross, D. F., Negar; Powers, Abigail; Bradley, Bekh; (2017). "Neurobiological Development in the Context of Childhood Trauma."Clinical Psychology: *A Publication Of The Division Of Clinical Psychology Of The American Psychological Association* 24(2): 111-124.

Crotty, M. (1998). The Foundations of Social Research: Meaning and Perspective in the Research Process.*Sage*.1446225747, 9781446225745

Da Matta, R. and J. Drury (1991). Carnivals, Rogues and Heroes: An Interpretation of the Brazilian Dilemma. Notre Dame: University of Notre Dame Press.

Dagron, A. G. and T. Tufte (2006). Communication for Social Change Anthology: HistoricalaAnd Contemporary Readings, CFSC Consortium, Inc. *Communication for Social Change Consortium*, Inc.; 1st edition (August 21, 2006)

Dale, M. T. B., Leiv S; Magnus, Per (2016). "Alcohol Consumption among First-Time Mothers and the Risk of Preterm Birth: A Cohort Study.*"Annals of Epidemiology* 26(4): 275-282.

De Oliveira, T. K., A. B; Gräf, T; Cawood, C; Khanyile, D; Grobler, A; Puren, A; Madurai, S; Baxter, C; Karim, Q. A. and Karim, S. S. (2017). "Transmission Networks and Risk of HIV Infection in Kwazulu-Natal, South Africa: A Community-Wide Phylogenetic Study.*"Lancet* HIV 4(1): E41-E50.

Deacon, A. and C. Wynsculley (2007). *"*Learning from the Rhetoric of Academics." *International Journal of Education and Development Using ICT* 3(4): 153-167.

Dejong, K. O., Amy; L. and Jamie O; (2019). "Alcohol Use in Pregnancy.*"Clinical Obstetrics Gynecology*, 62(1): 142-155.

Delany-Moretlwe, S., K. F. Kelley, S. James, F. Scorgie, H. Subedar, N. R. Dlamini, Y. Pillay, N. Naidoo, A. Chikandiwaand H. Rees (2018). "Human Papillomavirus Vaccine Introduction in South Africa: Implementation Lessons from an Evaluation of the National School-Based Vaccination Campaign." *Global Health: Science And Practice* 6(3): 425-438.

Denenberg, T. S. And R. Denenberg (1991). "The Arbitration of Employee Substance Abuse Rehabilitation Issues.*"Arbitration Journal* 46(1).

Derry, R. (1999). "The Mother-Child Paradigm and its Relevance to the Workplace." Business and Society38(2): 217-225.

Deshpande, S. B., M; Basford, L; Thorpe, K; Piquette-Tomei, N; Droessler, J; Cardwell, K;

Williams, RJ; Bureau, A; (2005). "Promoting Alcohol Abstinence among Pregnant Women: Potential Social Change Strategies " *Health Marketing Quarterly*, 23(2): 45-67.

Desmond, K. M., N; Richter, L; Tomlinson, M; Greco, E; Van-Rooyen, Van Heerden A; Comulada, WS; Borus, Rotheram; (2012). "Alcohol Consumption among HIV Positive Pregnant Women in Kwazulu Natal, South Africa: Prevalence and Correlates." *Drug and Alcohol Dependence Journal*, 120: 113-118.

Draucker, C. B., D. S. Martsolf, R. Ross and T. B. Rusk (2007). "Theoretical Sampling and Category Development In Grounded Theory."*Qualitative Health Research* 17(8): 1137-1148.

Dutta, M. J. (2008). Communicating Social Change: A Culture-Centred Approach. *Wiley Publications.*ISBN: 978-0-745-63492-0

Dutta, M. J. (2015). "Decolonising Communication for Social Change: A Culture-Centered Approach." Communication Theory25(2): 123-143.

Dutta, M. J. and R. De Souza (2008). "The Past, Present and Future of Health Development Campaigns: Reflexivity and the Critical-Cultural Approach."*Health Communication* 23(4): 326-339.

Dutta, M. J. Z., Ban; Mahuya, Pal (2012). "Engaging Worldviews, Cultures and Structures through Dialogue: The Culture Centered Approach to Public Relations." *Communication Faculty Publications* 415.

Dyll, L. (2009). "Community Development Strategies in The Kalahari: An Expression of Modernisation's Monologue."Tourism Strategies and Local Responses in Southern Africa: 41-60.

Ecker, J. and T. Aubry (2017). "A Mixed Methods Analysis of Housing and Neighbourhood Impacts on Community Integration among Vulnerably Housed and Homeless Individuals." *Journal of Community Psychology*45(4): 528-542.

Edenberg, H. J. and T. Foroud (2013). "Genetics and Alcoholism."*Nature Reviews Gastroenterology & Hepatology*10(8): 487.

Edwards, G. G., M M; (1976). "Alcohol Dependence: Provisional Description of a Clinical Syndrome." *British Medical Journal*1(6017): 1058-1061.

Effectiveness of film as a health communication tool to improve perceptions and attitudes in multiple sclerosis Horacio Chiong-Rivero , Michael Robers, Andrea Martinez, Clara P Manrique, Astrid Diaz, Kelly Polito, Borna Vajdi, Chan Chan, Margaret Burnett, Silvia R Delgado, Angel Chinea, Jacob L McCauley and Lilyana Amezcua ; on behalf of the ARHMS investigators

Elek, E., Harris, S.L., Squire, C.M., Margolis, M., Weber, M.K., Dang, E.P. and Mitchell, B., 2013. Women's knowledge, views, and experiences regarding alcohol use

and pregnancy: opportunities to improve health messages. *American Journal of Health Education*, *44*(4), pp.177-190.

Elliot, L. C., K; Suebwongpat, A; Norris, S; (2008). *"Fetal Alcohol Spectrum Disorders (FASD):* Systematic Reviews of Prevention, Diagnosis and Management" HSAC Report, Christchurch Health Services Assessment Collaboration, 1(9).

Elwood, S. A. And D. G. Martin (2000). *"Placing" Interviews: Location and Scales of Power in Qualitative Research."* The Professional Geographer52(4): 649-657.

Epstein, J. A., K. W. Griffin and G. J. Botvin (2002). "Positive Impact of Competence Skills and Psychological Wellness in Protecting Inner-City Adolescents from Alcohol Use." *Prevention Science*3(2): 95-104.

Estrada, E., A. S. Ramirez, S. Gamboaand P. Amezola De Herrera (2018). "Development of a Participatory Health Communication Intervention: An Ecological Approach to Reducing Rural Information Inequality and Health Disparities.*"Journal Of Health Communication*23(8): 773-782.

Etikan, I. and K. Bala (2017). "Sampling and Sampling Methods." *Biometrics & Biostatistics International Journal*5(6): 00149.

Evans, W. (1832). Collection of Statutes Connected with the General Administration of the Law.London, United Kingdom, *Sanders & Benning*.

Falletisch, L. (2008). Understanding the Legacy of Dependency and Powerlessness experienced by Farm Workers on Wine Farms in the Western Cape. Master's Thesis, Social Work Department. Stellenbosch, South Africa, Stellenbosch University.

Fallowfield, L. And V. Jenkins (1999). "Effective Communication Skills Are the Key to Good Cancer Care.*"European Journal of Cancer 35*(11): 1592-1597.

FAO/WHO (2005). Combined Compendium of Food Additive Specifications: Analytical Methods, Test Procedures and Laboratory Solutions Used by, and Referenced in Food Additive Specifications. Food and Agriculture Org/World Health Organization, 2006. Combined compendium of food additive specifications. FAO JECFA Monographs, (1).

Farr (2020). "Foundation for Alcohol-Related Research." FARR SA.

Faso, B., 2014. SBCC in the Sahel.

Figueroa, M. E. (2017). "A Theory-Based Socioecological Model of Communication and Behaviour for the Containment of the Ebola Epidemic in Liberia.*"Journal Of Health Communication* 22(Sup1): 5-9.

Fishbein, M. And I. Ajzen (1977). "Belief, Attitude, Intention and Behaviour: An Introduction to Theory and Research."

Fisher, J. C., Bang, H. and Kapiga, S. H. (2007). "The Association between HIV Infection

and Alcohol Use: A Systematic Review and Meta-Analysis of African Studies."Sexually Transmitted Diseases34(11): 856-863.

Flay, B. R. And J. Petraitis (1994). "A New Theory of Health Behaviour with Implications for Preventive Interventions."*Advances in Medical Sociology* 4: 19-44.

Flick, U. (2009). *The Sage Qualitative Research Kit: Collection*.SAGE Publications Limited.9780761949749

Ford, N., D. Odalloand R. Chorlton (2003). "Communication from a Human Rights Perspective: Responding to The HIV/AIDS Pandemic in Eastern and Southern Africa A Working Paper for Use in HIV and AIDS Programmes."*Journal of Health Communication*8(6): 599-612.

Foster, K., M. Mcallister And L. O'Brien (2006). "Extending the Boundaries: Autoethnography as an Emergent Method in Mental Health Nursing Research."*International Journal of Mental Health Nursing15*(1): 44-53.

Foxcroft, D. R., M. T. Moreira, N. M. Almeida Santimanoand L. A. Smith (2015). "Social Norms Information for Alcohol Misuse in University and College Students." Cochrane Database System(12): Cd006748.

Foxcroft, D.R., Smith, L.A., Thomas, H. and Howcutt, S., 2015. Accuracy of alcohol use disorders identification test for detecting problem drinking in 18–35 year-olds in England: method comparison study. *Alcohol and alcoholism*, *50*(2), pp.244-250.

France, K.E., Donovan, R.J., Bower, C., Elliott, E.J., Payne, J.M., D'Antoine, H. and Bartu, A.E., 2014. Messages that increase women's intentions to abstain from alcohol during pregnancy: results from quantitative testing of advertising concepts. *BMC Public Health*, *14*(1), pp.1-13.

Frank, L. E. and S. K. Nagel (2017). "Addiction and Moralisation: The Role of the Underlying Model of Addiction."Neuroethics10(1): 129-139.

Freire, P. (1970). "The Adult Literacy Process as Cultural Action for Freedom." *Harvard Educational Review* 40(2): 205-225.

Fusch, P. I. And L. R. Ness (2015). "Are We There Yet? Data Saturation in Qualitative Research." *The Qualitative Report20*(9): 1408.

Gagnon, M., Jacob, J. D. and Mccabe, J. (2014). Locating the Qualitative Interview: Reflecting on Space and Place in Health Research. Univ Alberta, Int Inst Qualitative Methodology 5-217

Gandhi, L. (1998). Postcolonial Theory: A Critical Introduction, *Allen & Unwin*.

Gearing, R., T. Mcneilland F. A. Lozier (2005). Father's Involvement and Fetal Alcohol Spectrum Disorder: Developing Best Practices.*Journal of FAS International*, 3(e14), pp.1-11.

Geertz, C. (1973). "Thick Description: Toward an Interpretive Theory of Culture." Turning Points in Qualitative Research: Tying Knots in a Handkerchief*3:* 143-168.

Ghuman, S., A. Meyer-Weitz and S. Knight (2012). "Prevalence Patterns and Predictors of Alcohol Use and Abuse among Secondary School Students in Southern Kwazulu-Natal, South Africa: Demographic Factors and the Influence of Parents and Peers." *South African Family Practice54*(2): 132-138.

Gill, P., K. Stewart, E. Treasure and B. Chadwick (2008). "Methods of Data Collection in Qualitative Research: Interviews and Focus Groups.*"British Dental Journal*204(6): 291-295.

Glatt, M. M. (1991). *"*Alcoholism--Disease, Learned Disorder or Just Heavy Drinking? A Review of Professor Herbert Fingarette's Book, Heavy Drinking--The Myth of Alcoholism as a Disease.*" Public Medicine Journal:* Alcohol Alcohol, 26(5-6): 499-503.

Glik, D., M. Prelip, A. Myerson and K. Eilers (2008*). "*Fetal Alcohol Syndrome Prevention Using Community-Based Narrowcasting Campaigns.*"Health Promotion Practice9*(1): 93-103.

Goddard, W. And S. Melville (2004). *R*esearch Methodology: An Introduction.Juta And Company Ltd.

Goeiman, H. D. (2018). *"*Developing a Comprehensive Nutrition Workforce Planning Framework For The Public Health Sector to Respond to the Nutrition-Related Burden in South Africa."University of Cape Town

Gossage, J., C. Snell, C. Parry, A. Marais, R. Barnard, M. M. D. Vries, J. Blankenship, S. Seedat, J. M. Haskenand P. A. May (2014). "Alcohol Use, Working Conditions, Job Benefits, and the Legacy of The Do System among Farm Workers in The Western Cape Province, South Africa: Hope Despite High Levels Of Risky Drinking.*" International Journal of Environmental Research and Public Health*11: 7406 - 7424.

Govender, E. M. (2010). *"*How Effective Is HIV and AIDS Communication in Africa." *African Communication Research3(2)*: 205-234.

Govender, G. B. (2011). An Evaluation of Housing Strategy in South Africa for the Creation Of Sustainable Human Settlements: A Case Study Of The Ethekwini Region. Doctoral Dissertation, University of KwaZulu-Natal, Durban

Govender, I., K. Nel and N. Banyini (2018). "The Knowledge, Perceptions and Relationship Behaviour of Rugby and Football Players towards HIV Infection at the University of Limpopo.*"*Curationis41: 1-9.

Govender, K., R. G. Cowden, K. O. Asante, G. George and C. Reardon (2019). "Sexual Risk Behavior: A Multi-System Model of Risk and Protective Factors in South African Adolescents.*"Prevention Science20*(7): 1054-1065.

Govender, R., C. E. Wood, S. A. Taylor, C. H. Smith, H. Barratt and B. Gardner (2017).

″Patient Experiences of Swallowing Exercises after Head and Neck Cancer: A Qualitative Study Examining Barriers and Facilitators Using Behaviour Change Theory.″ Dysphagia32(4): 559-569.

Green, A. J. and D. G. Holloway (1997). "Using a Phenomenological Research Technique to Examine Student Nurses' Understandings of Experiential Teaching and Learning: A Critical Review of Methodological Issues." *Journal of Advanced Nursing*26(5): 1013-1019.

Greenwood, J. and N. Guner (2010). ″Social Change: The Sexual Revolution."International Economic Review51(4): 893-923.

Greenwood, J. G., Nezih; (2008). "Social Change.″Institute of Labour Economics: Discussion Papers3485.

Gross, R., S. L. Bellamy, B. Ratshaa, X. Han, M. Vujkovic, R. Aplenc, A. P. Steenhoff, M. Mosepele, G. Moorthy, A. F. Zuppa, B. L. Strom and G. P. Bisson (2017). "CYP*2B6* Genotypes and Early Efavirenz-Based HIV Treatment Outcomes in Botswana." AIDS(London, England)31(15): 2107-2113.

Grusin, A. M. S., Peter MB; Davies, Gregory A L (MD); Leyland, NA; Franche, Renee-Louise; (1998). ″Alcohol Abuse and Pregnant Woman.″*Journal SOGC*, 20(7): 655-666.

Guba, E. G. (1990). The Paradigm Dialog. In alternative paradigm conference, Mar 1989, Indiana, School of Education, San Francisco, Ca, USA. *Sage Publications*, Inc

Guest, G. M., Kathleen M; Namey, Emily E; (2012). Applied Thematic Analysis, *SAGE* Research Methods.

Guest, G., E. E. Nameyand M. L. Mitchell (2013). ″Qualitative Research: Defining and Designing."Collecting Qualitative Data: 1-40.

Guest, G., K. M. Macqueen and E. E. Namey (2012). ″Introduction to Applied Thematic Analysis." Applied Thematic Analysis*3*: 20.

Guetterman, T. (2015). "Descriptions of Sampling Practices Within Five Approaches to Qualitative Research in Education and the Health Sciences."

Gunawan, J. (2015). "Ensuring Trustworthiness in Qualitative Research." *Belitung Nursing Journal1(1*): 10-11.

Gurman, T. A., G. Awangtangand L. T. Leslie (2018). ″Evaluating Capacity Strengthening for Social and Behaviour Change Communication through Outcome Harvesting." *The Journal of Development Communication*29(2): 45-61.

Haffejee, F., L. O'Connor, N. Govender, P. Reddy, M. N. Sibiya, S. Ghuman, T. Ngxongoand D. Borg (2018). "Factors Associated with Unintended Pregnancy among Women Attending a Public Health Facility in Kwazulu-Natal, South Africa." *South African Family Practice60*(3): 1-5.

Hahn, J. A., S. E. Woolf-King and W. Muyindike (2011). "Adding Fuel to the Fire: Alcohol's Effect on the HIV Epidemic in Sub-Saharan Africa."*Current HIV/AIDS Reports*8(3): 172.

Hajmirsadeghi, R. S., S. Shamsuddin and A. Foroughi (2014). "The Relationship between Behavioural and Psychological Aspects of Design Factors and Social Interaction in Public Squares." *Procedia-Social and Behavioural Sciences140*: 98-102.

Hammersley, M. (2013). "Response to 'Generic Ethics Principles in Social Science Research." *Generic Ethics Principles in Social Science Research*(03): 6.

Hancock, B. (1998). Trent Focus for Research and Development in Primary Health Care: An Introduction to Qualitative Research.Trent Focus Group. Manuscript

Hankin, J. M., Mary E; Heussner, Janet; (2006). "Pregnant Alcohol Abusing Women." Alcoholism: *Clinical And Experimental Research*24(8).

Hankin, J. S., JJ; Firestone, IJ; Ager, JW; Sokol, RJ; Martier, SS; (1996). *"Has Awareness of the Alcohol Warning Label Reached its Upper Limit?"*Alcohol Clinical Exp Res, 20(3): 525-531.

Hankin, J. S., JJ; Firestone, IJ; Ager, JW; Sokol, RJandMartier, SS; (2002). "Fetal Alcohol Syndrome Prevention Research." Alcohol and Research Health: *The Journal of the National Institute On Alcohol Abuse And Alcoholism,*26(1): 58-65.

Hanley, J. (1999). "Beyond The Tip of the Iceberg: Reaching Today's Youth."*The Community Circle of Caring Journal*3(2): 9-12.

Hawkins, J. D., R. F. Catalano and J. Y. Miller (1992). "Risk and Protective Factors for Alcohol and Other Drug Problems in Adolescence and Early Adulthood: Implications For Substance Abuse Prevention." *Psychological Bulletin*112(1): 64.

Heath, A. C., L. J. Eaves and N. G. Martin (1989). "The Genetic Structure of Personality III. Multivariate Genetic Item Analysis of The EPQ Scales." Personality And Individual Differences*10(8): 877-888.*

Herzog, H. (2005). "On Home Turf: Interview Location And Its Social Meaning." Qualitative Sociology28*(1*): 25-47.

Hesse-Biber, S. J., S. N. Hesse-Biberand P. Leavy (2006). Emergent Methods in Social Research, *Sage*.

Hilly, S. (1982). "Biological Consequences of Alcoholism and Alcohol-Related Problems among Women." Special Population Issues. National Institute on Alcohol Abuse and Alcoholism*: Alcohol and Health Monograph*4: 43-73.

Hlomani-Nyawasha, T. J., A. Meyer-Weitz and C. O. Egbe (2020). "Factors Influencing Alcohol Use Among Female In-School Adolescents In The Western Cape, South Africa." *South African Journal Of Psychology* 50(4): 574-586.

Hlomani-Nyawasha, T. J., A. Meyer-Weitz and C. O. Egbe (2020). "Factors Influencing Alcohol Use Among Female In-School Adolescents In The Western Cape, South Africa." *South African Journal Of Psychology*: 0081246320946298.

Hochbaum, G. R., I; Kegels, S; (1952). Health Belief Model. United States Of America.

Hoffman, L. And M. Conway (1981). Foundations Of Family Therapy: A Conceptual Framework For Systems Change, Basic Books New York.

Hore, B. D. (1971). "Life Events and Alcoholic Relapse." *British Journal Of Addiction To Alcohol And Other Drugs*66(2): 83-88.

Houts, P.S., Doak, C.C., Doak, L.G. and Loscalzo, M.J., 2006. The role of pictures in improving health communication: a review of research on attention, comprehension, recall, and adherence. *Patient education and counseling*, *61*(2), pp.173-190.

Huber, M., J. A. Knottnerus, L. Green, H. Van Der Horst, A. R. Jadad, D. Kromhout, B. Leonard, K. Lorig, M. I. Loureiro And J. W. Van Der Meer (2011). "How Should We Define Health?" *Bmj*343.

Huber, M., J. A. Knottnerus, L. Green, H. Van Der Horst, A. R. Jadad, D. Kromhout, B. Leonard, K. Lorig, M. I. Loureiro And J. W. Van Der Meer (2011). "How Should We Define Health?" *Bmj*343.

Hunt, G. and Antin, T., 2019. Gender and intoxication: From masculinity to intersectionality. *Drugs: Education, Prevention and Policy*, *26*(1), pp.70-78.

ICAP (2009). "Periodic Review On Drinking And Culture." International Centre For Alcohol Policies,

ILO (1994). Management Of Alcohol And Drug-Related Issues In The Workplace. Geneva, Switzerland International Labour Organisation: 5-46.

IMF (2000). "Globalization: Threat Or Opportunity? An IMF Issues Brief." International Monetary Fund. Globalisation: Threat Or Opportunity?

Irene J. Elkins, PhD, Matt Mcgue, PhD., Steve Malone, PhD. , And And William G. Iacono, Ph.D. (2004). "The Effect Of Parental Alcohol And Drug Disorders On Adolescent Personality." *American Journal Of Psychiatry*161(4): 670-676.

Ivison, D. (2020). Why Globalize The Curriculum? Deparochializing Political Theory. M. S. Williams. Cambridge, Cambridge University Press: 273-290.

Jacobson, T. L. (1993). "A Pragmatist Account Of Participatory Communication Research For National Development." Communication Theory3(3): 214-230.

Jacobson, T. L. (2016). "Amartya Sen's Capabilities Approach And Communication For Development And Social Change." *Journal Of Communication*66(5): 789-810.

Jacques-Tiura, A. J. N., Jeanette; Kiekel, Preston A; Davis, Kelly Cue; Zawacki, Tina; Morrison, Diane M; George, William H; Abdallah, Devon Alisa (2015). "Influences Of Acute Alcohol Consumption, Sexual Precedence, And Relationship Motivation On Women's Relationship And Sex Appraisals And Unprotected Sex Intentions." *Journal Of Social And Personal Relationships*32(2): 197-221.

Jahn, I., C. Börnhorst, F. Günther And T. Brand (2017). "Examples Of Sex/Gender Sensitivity In Epidemiological Research: Results Of An Evaluation Of Original Articles Published In *JECH* 2006–2014." Health Research Policy And Systems15(1): 11.

Jamison, D. T., J. G. Breman, A. R. Measham, G. Alleyne, M. Claeson, D. B. Evans, P. Jha, A. Mills And P. Musgrove (2006). Disease Control Priorities In Developing Countries, The World Bank.

Jayne, T. S., M. Villarreal, P. Pingali And G. Hemrich (2006). "HIV/AIDS And The Agricultural Sector In Eastern And Southern Africa: Anticipating The Consequences." Aids, Poverty And Hunger: Challenges And Responses. Washington: IFPRI: 141-166.

Jellinek, E. M. (1960). The Disease Concept Of Alcoholism. California, United States, Hillhouse Press.

Johnston, L. O. B., Heidi; Chopra, Mickey; Mathews, Cathy; Townsend, Loraine; Sabin, Keith; Tomlinson, Mark; Kendall, Carl (2010). "The Associations Of Voluntary Counseling And Testing Acceptance And The Perceived Likelihood Of Being HIV-Infected Among Men With Multiple Sex Partners In A South African Township." *AIDS And Behavior* 14(4): 922-931.

Jones, K. L. S., D. W; (1973). "Recognition Of The Fetal Alcohol Syndrome In Early Infancy." *Lancet*302(7836): 999-1001.

Jones, L. and Sumnall, H., 2016. Understanding the relationship between poverty and alcohol misuse. *Liverpool: Liverpool John Moores University*, pp.9-17.

Kalichman, S. C., J. A. Kelly And D. Rompa (1997). "Continued High-Risk Sex Among HIV Seropositive Gay And Bisexual Men Seeking HIV Prevention Services." *Health Psychology*16(4): 369.

Kalichman, S. C., L. C. Simbayi, R. Vermaak, D. Cain, S. Jooste And K. Peltzer (2007). "HIV/AIDS Risk Reduction Counseling For Alcohol Using Sexually Transmitted Infections Clinic Patients In Cape Town, South Africa." *JAIDS Journal Of Acquired Immune Deficiency Syndromes*44(5): 594-600.

Kaplan, A. M. And M. Haenlein (2010). "Users Of The World, Unite! The Challenges And Opportunities Of Social Media." *Business Horizons*53(1): 59-68.

Kashima, Y. (2014). "How Can You Capture Cultural Dynamics?"*Frontiers In Psychology*5: 995.

Kashima, Y. (2014). ″Meaning, Grounding, And The Construction Of Social Reality.″ *Asian Journal Of Social Psychology17*(2): 81-95.

Kashima, Y. (2014). "Meaning, Grounding, And The Construction Of Social Reality." *Asian Journal Of Social Psychology*17(2): 81-95.

Kashima, Y. (2014). "Meaning, Grounding, And The Construction Of Social Reality." Asian Journal Of Social Psychology17(2): 81-95.

Kaufman, M. R., R. N. Rimal, M. Carrasco, O. Fajobi, A. Soko, R. Limaye And G. Mkandawire (2014). "Using Social AndBehavior Change Communication To Increase HIV Testing And Condom Use: The Malawi BRIDGE Project.″ *AIDS Care*26(Sup1): S46-S49.

Keen, C. L. U. A., Janet Y; Skalny, Anatoly; Grabeklis, Andrei; Grabeklis, Sevil; Green, Kerri; Yevtushok, Lyubov; Wertelecki, Wladimir W; Chambers, Christina D (2010). "The Plausibility Of Maternal Nutritional Status Being A Contributing Factor To The Risk For Fetal Alcohol Spectrum Disorders: The Potential Influence Of Zinc Status As An Example." *Biofactors*36(2): 125-135.

Kendler, K. O., H; Edwards, AC; Sundquist, J; Sundquist, K; (2017). "A Developmental Model For Alcohol Use Disorders In Swedish Men." *Psychological Medicine Journal*46(13): 2759-2770.

Kent, M. L. And M. Taylor (2002). "Toward A Dialogic Theory Of Public Relations." *Public Relations Review*28(1): 21-37.

Kent, M. L. And M. Taylor (2002). ″Toward A Dialogic Theory Of Public Relations.″ *Public Relations Review*28(1): 21-37.

Khalil, A. O. B., Patrick (2010). "Alcohol And Pregnancy." Obstetrics, Gynaecology And Reproductive Medicine20(10): 311-313.

Kietzmann, J. H., K. Hermkens, I. P. Mccarthy And B. S. Silvestre (2011). "Social Media? Get Serious! Understanding The Functional Building Blocks Of Social Media.″ *Business Horizons*54(3): 241-251.

Kim, B. (2001). ″Social Constructivism." Emerging Perspectives On Learning, Teaching, And Technology1(1): 16.

Kim, B. (2006). From Emerging Perspectives On Learning, Teaching And Technology.

Kim, S.S., Rawat, R., Mwangi, E.M., Tesfaye, R., Abebe, Y., Baker, J., Frongillo, E.A., Ruel, M.T. and Menon, P., 2016. Exposure to large-scale social and behavior change communication interventions is associated with improvements in infant and young child feeding practices in Ethiopia. *PloS one*, *11*(10), p.e0164800.

Kincaid, C.D.L. and Figueroa, M.E. (2009). Communication For Participatory Development: Dialogue, Action, And Change. *Routledge Handbook Of Applied Communication Research*, Routledge: 546-572.

Kleinman, D.V., 2017, November. Secretary's Advisory Committee on National Health Promotion and Disease Prevention Objectives for 2030. In *APHA 2017 Annual Meeting & Expo (Nov. 4-Nov. 8)*. American Public Health Association.

Koenig, C. J., M. J. Dutta, N. Kandula And L. Palaniappan (2012). "All Of Those Things We Don't Eat": A Culture-Centered Approach To Dietary Health Meanings For Asian Indians Living In The United States." *Health Communication*27(8): 818-828.

Korstjens, I. And A. Moser (2018). "Series: Practical Guidance To Qualitative Research. Part 4: Trustworthiness And Publishing." *European Journal Of General Practice*24(1): 120-124.

Kreuter, M. W. And S. M. Mcclure (2004). "The Role Of Culture In Health Communication."*Annu. Rev. Public Health*25: 439-455.

Krieger, H., Young, C.M., Anthenien, A.M. and Neighbors, C., 2018. The epidemiology of binge drinking among college-age individuals in the United States. *Alcohol research: current reviews*.

Kuhn, T. S. (1962). "The Structure Of Scientific Revolutions: University Of Chicago Press." Original Edition.

Kukla, A. (2000). Social Constructivism And The Philosophy Of Science, Psychology Press.

Kumar, N. And S. Sharma (2016). "Survey Analysis On The Usage And Impact Of Whatsapp Messenger." *Global Journal Of Enterprise Information System*8(3): 52-57.

Kunda, J. And K. G. Tomaselli (2009). "Social Representations Of HIV/AIDS In South Africa And Zambia: Lessons For Health Communication."Health Communication In Southern Africa: Engaging With Social And Cultural Diversity11: 93.

Kunda, J. L. (2009). "Xenophobia In South Africa: Revisiting Tutu's Handwriting On The Wall?" Critical Arts: *A Journal Of South-North Cultural Studies*23(1): 120-123.

Kwazulu Natal, D. O. H. (2019). *"History Of King Edward VIII Hospital."*

Lambert, C., J. Jomeen And W. Mcsherry (2010). "Reflexivity: A Review Of The Literature In The Context Of Midwifery Research." *British Journal Of Midwifery*18(5): 321-326.

Lau-Barraco, C. And A. N. Linden (2014). "Drinking Buddies: Who Are They And When Do They Matter?" Addiction Research & Theory22(1): 57-67.

Lawrence Neuman, W. (2014). Social Research Methods: Qualitative And Quantitative Approaches, Pearson.

Le Strat, Y. G., Bridget F; Ramoz, Nicolas; Gorwood, Philip; (2009). "A New Definition Of Early Age At Onset In Alcohol Dependence." HHS Public Access: *Drug And Alcohol Dependence*108(1-2): 43-48.

Lennie, J. And J. Tacchi (2013). Evaluating Communication For Development: A Framework For Social Change, *Routledge*.

Lennie, J. And J. Tacchi (2013). Evaluating Communication For Development: A Framework For Social Change, *Taylor & Francis*.

Lerner, D. (1958). "The Passing Of Traditional Society: Modernizing The Middle East."

Lewis, C. E., K. G. F. Thomas, N. C. Dodge, C. D. Molteno, E. M. Meintjes, J. L. Jacobson And S. W. Jacobson (2015). "Verbal Learning And Memory Impairment In Children With Fetal Alcohol Spectrum Disorders." Alcoholism*: Clinical And Experimental Research*39(4): 724-732.

Lie, R. And J. Servaes (2015). "Disciplines In The Field Of Communication For Development And Social Change." Communication Theory25(2): 244-258.

Lie, R. T., A. J. Wilcox, J. Taylor, H. K. Gjessing, O. D. Saugstad, F. Aabyholm And H. Vindenes (2008). "Maternal Smoking And Oral Clefts: The Role Of Detoxification Pathway Genes." Epidemiology (Cambridge, Mass.)19(4): 606.

Lieberman, M. D. (2000). "Intuition: A Social Cognitive Neuroscience Approach." *Psychological Bulletin*126(1): 109-137.

Lincoln, D., N. K. Denzin And Y. S. Lincoln (2005). The SAGE Handbook Of Qualitative Research, *Sage Publications*.

Lincoln, Y. S. And E. G. Guba (1988). "Criteria For Assessing Naturalistic Inquiries As Reports."

Louw, I. (2020). "Media Centre."Aware.Org.Za Https://Aware.Org.Za/Media-Centre/.

Lubombo, M. (2015). Transcending GIPA: Towards An Ubuntu Framework For Mainstreaming Participation Of South African People Living With HIV (PLHIV) In Social Change Communication For HIV Prevention.

Lupton, D. (1994). "Toward The Development Of Critical Health Communication Praxis." Health Communication6(1): 55-67.

Lupton, D. (1994). Moral Threats And Dangerous Desires: AIDS In The News Media, *Taylor & Francis*.

Macleod, C., S. Matebese And N. Tsetse (2020). "I Drank Because I Wanted To Deal With The Frustration": Explaining Alcohol Consumption During Pregnancy In A Low-Resource Setting - Women's, Partners And Family Members' Narratives." Social Work56: 88-96.

Macnamara, J. (2017). Evaluating Public Communication: Exploring New Models, Standards, And Best Practice, *Routledge*.

Malone, S. M., J. Taylor, N. R. Marmorstein, M. Mcgue And W. G. Iacono (2004). "Genetic And Environmental Influences On Antisocial Behavior And Alcohol Dependence

From Adolescence To Early Adulthood." Development And Psychopathology16(4): 943-966.

Malterud, K. (2001). "Qualitative Research: Standards, Challenges, And Guidelines." *The Lancet*358(9280): 483-488.

Manikkam, L. And J. K. Burns (2012). "Antenatal Depression And Its Risk Factors: An Urban Prevalence Study In Kwazulu-Natal." *South African Medical Journal*102(12): 940-944.

Manyozo, L. (2012). Media, Communication And Development: Three Approaches, *SAGE Publications India.*

Masis, K. M., PA; (1991). "A Comprehensive Local Program For The Prevention Of Fetal Alcohol Syndrome." Public Health Repository, 106: 484-489.

May, P. A. G., J Phillip (2011). "Maternal Risk Factors ForFetal Alcohol Spectrum Disorders: Not As Simple As It Might Seem." *Alcohol Research & Health*34(1): 15.

May, P. A., J. P. Gossage, A. S. Marais, L. S. Hendricks, C. L. Snell, B. G. Tabachnick, C. Stellavato, D. G. Buckley, L. E. Brooke And D. L. Viljoen (2008). "Maternal Risk Factors ForFetal Alcohol Syndrome And Partial Fetal Alcohol Syndrome In South Africa: A Third Study." Alcoholism: Clinical And Experimental Research32(5): 738-753.

May, P. A., J. P. Gossage, L. E. Brooke, C. L. Snell, A.-S. Marais, L. S. Hendricks, J. A. Croxford And D. L. Viljoen (2005). "Maternal Risk Factors ForFetal Alcohol Syndrome In The Western Cape Province Of South Africa: A Population-Based Study." *American Journal Of Public Health*95(7): 1190-1199.

Maylam, P. (1995). "Explaining The Apartheid City: 20 Years Of South African Urban Historiography." *Journal Of Southern African Studies21*(1): 19-38.

Mcbride, C. M., L. M. Koehly, S. C. Sanderson And K. A. Kaphingst (2010). "The Behavioral Response To Personalized Genetic Information: Will Genetic Risk Profiles Motivate Individuals And Families To Choose More Healthful Behaviors?" *Annual Review Of Public Health*31: 89-103.

Mccrae, R. R. And P. T. Costa (2003). Personality In Adulthood: A Five-Factor Theory Perspective, Guilford Press.

Mcewan, C. (2008). "A Very Modern Ghost: Postcolonialism And The Politics Of Enchantment." Environment And Planning D: Society And Space26(1): 29-46.

Mcguire, W. J. And C. V. Mcguire (1988). Content And Process In The Experience Of Self. Advances In Experimental Social Psychology. L. Berkowitz, Academic Press. 21: 97-144.

McKetta, S. and Keyes, K.M., 2019. Heavy and binge alcohol drinking and parenting status in the United States from 2006 to 2018: an analysis of nationally representative cross-sectional surveys. *PLoS medicine*, *16*(11), p.e1002954.

Mckinley, J. (2015). "Critical Argument And Writer Identity: Social Constructivism As A Theoretical Framework For EFL Academic Writing." Critical Inquiry In Language Studies12(3): 184-207.

Mckinney, J. A. (1995). "Encountering Development: The Making And Unmaking Of The Third World. By Arturo Escobar. Princeton, N.J.: Princeton University Press, 1995. Ix, 290 " *The Journal Of Asian Studies54*(3): 817-819.

Mcmahon, M. (1997). "Social Constructivism And The World Wide Web - A Paradigm For Learning."

Mefalopulos, P. (2003). Theory And Practice Of Participatory Communication: The Case Of The FAO Project" Communication For Development In Southern Africa".

Mefalopulos, P. (2008). *Development Communication* Sourcebook: Broadening The Boundaries Of Communication.

Mefalopulos, P. And T. Tufte (2009). Participatory Communication, World Bank Group.

Melkote, S. R. And H. L. Steeves (2001). Communication For Development In The Third World: Theory And Practice For Empowerment, *Sage*.

Merriam, S. B. (2002). "Introduction To Qualitative Research." Qualitative Research In Practice: Examples For Discussion And Analysis1(1): 1-17.

Meurk, C. S., A. Broom, J. Adams, W. Hall And J. Lucke (2014). "Factors Influencing Women's Decisions To Drink Alcohol During Pregnancy: Findings Of A Qualitative Study With Implications For Health Communication." *BMC* Pregnancy Childbirth14: 246.

MIGUEZ, M. J. S.-P., GAIL; MORALES, GUILLERMO; RODRIGUEZ, ALLAN; BURBANO, XIMENA (2003). "HIV Treatment In Drug Abusers: Impact Of Alcohol Use." *Addiction Biology*8(1): 33-37.

Miller, R. L. (2015). Rogers' Innovation Diffusion Theory (1962, 1995). Information Seeking Behavior And Technology Adoption: Theories And Trends. A.-S. Mohammed Nasser And A.-A. Ali Saif. Hershey, PA, USA, IGI Global: 261-274.

Mirzaei, T. and Kashian, N., 2020. Revisiting effective communication between patients and physicians: cross-sectional questionnaire study comparing text-based electronic versus face-to-face communication. *Journal of medical Internet research*, *22*(5), p.e16965.

Mitchell, A.M., Porter, R.R., Pierce-Bulger, M. and McKnight-Eily, L.R., 2020. Addressing Alcohol Use in Pregnancy: Screening and brief counseling

interventions are evidence-based approaches. *The American journal of nursing*, *120*(7), p.22.

Mittelman, J. H. (2019). "To Risk Or Derisk The Soul Of The University? The Peril In Educational Globalization." *Globalizations*16(5): 707-716.

Mody, B. And M. Rolston (1991). Designing Messages For Development Communication: An Audience participation-based Approach, *Sage* Publications New Delhi.

Mody, B. And M. Rolston (1991). Designing Messages For Development Communication: An Audience participation-based Approach, *Sage* Publications New Delhi.

Moodley, R. (2018). "Raising Awareness About Foetal Alcohol Syndrome." Sad news.

Moon, K. And D. Blackman (2014*). "*A Guide To Understanding Social Science Research For Natural Scientists*."* *Conservation Biology*28(5): 1167-1177.

Moon, K. And D. Blackman (2014). "A Guide To Understanding Social Science Research For Natural Scientists*."* *Conservation Biology*28(5): 1167-1177.

Moran, D. (2017). "Intercorporeality And Intersubjectivity: A Phenomenological Exploration Of Embodiment." Embodiment, Enaction, And Culture: Investigating The Constitution Of The Shared World: 25-46.

Morrow, S. L. (2005). "Quality And Trustworthiness In Qualitative Research In Counseling Psychology." *Journal of counseling Psychology*52(2): 250.

Mullangi, S., R. Bhandari, P. Thanaporn, M. Christensen, S. Kronick And B. K. Nallamothu (2020). "Perceptions Of Resuscitation Care Among In-Hospital Cardiac Arrest Responders: A Qualitative Analysis." *BMC Health Services Research*20(1): 1-7.

Murube, J., S. Saika, H. Ohuchi, K. Suzuki, C. Yokoyama, Y. Higashi, T. Daikoku, S. Mizoguchi, G. Yamada And C.-Y. Liu (2013). *"*Sources In Time.*"* OCULAR SURFACE11(1): 2-7.

Naimi, T. S., L. E. Lipscomb, R. D. Brewer And B. C. Gilbert (2003). "Binge Drinking In The Preconception Period And The Risk Of Unintended Pregnancy: Implications For Women And Their Children." *Pediatrics*111(Supplement 1): 1136-1141.

Name, L. M., Q; (2007). "Revisiting The Traditional African Cultural Framework Of Ubuntuism: A Theoretical Perspective." Indilinga: *African Journal Of Indigenous Knowledge Systems*6(2).

Namkoong, Y. (1999). *"*Dependency Theory: Concepts, Classifications, And Criticisms.*"* *International Area Review*2(1): 121-150.

Neuhauser, L. And G. L. Kreps (2003). *"*Rethinking Communication In The E-Health Era.*"* *Journal Of Health Psychology8*(1): 7-23.

Neuman, M. G. M., M.; Rehm, J. (2006). "Drug Interactions Between Psychoactive Substances And Antiretroviral Therapy In Individuals Infected With Human

Immunodeficiency And Hepatitis Viruses."Subst Use Misuse 41(10-12): 1395-1463.

Neuman, M. G. S., Michelle; Nanau, Radu M; Parry, Charles (2012). "Alcohol Consumption, Progression Of Disease And Other Comorbidities, And Responses To Antiretroviral Medication In People Living With HIV." *AIDS Research And Treatment*2012.

Nezlek, J. B. And C. V. Smith (2017). "4 CHAPTER Social Influence And Personality." The Oxford Handbook Of Social Influence: 53.

Ngigi, S. B., Doreen Nekesa; (2019). *"Devolution In Kenya: The Good, The Bad And The Ugly."* Public Policy And Administration Research9(6): 9-23.

NIAAA (2011). National Institute On Alcohol Abuse Alcoholism: Alcohol Screening And Brief Intervention For Youth: A Practitioner's Guide, National Insitute On Alcohol Abuse And Alcoholism, US Department Of Health ….

NIAAA. (2005). "NIAAA Issues New Clinician's Guide For Helping Patients Who Drink Too Much." Retrieved December 22, 2020, From *Https://Www.Niaaa.Nih.Gov/News-Events/News-Releases/Niaaa-Issues-New-Clinicians-Guide-Helping-Patients-Who-Drink-Too-Much.*

Nichols, R. (2010). "Postcolonial Studies And The Discourse Of Foucault: Survey Of A Field Of Problematization." *Foucault Studies*: 111-144.

Ninomiya, M. E. M. (2017). "More Than Words: Using Visual Graphics For Community-Based Health Research." *Canadian Journal Of Public Health* 108(1): E91-E94.

Nota, P., E. Govender And Y. Vukapi (2020). "Male-Supported, Female-Initiated": Exploring A Cultural Message For Communicating Around New HIV Prevention Technologies For Women In Kwazulu-Natal, South Africa." *Communicare: Journal For Communication Sciences In Southern Africa*39(1): 18-32.

Nowell, L. S., J. M. Norris, D. E. White And N. J. Moules (2017). "Thematic Analysis: Striving To Meet The Trustworthiness Criteria." *International Journal Of Qualitative Methods*16(1): 1609406917733847.

Nykjaer, C. A., NA; Greenwood, DC; Simpson, NA; Hay, AW; White, KL; Cade, JE; (2014). "Maternal Alcohol Intake Before And During Pregnancy And Risk Of Adverse Birth Outcomes: Evidence From A British Cohort." *Journal Of Epidemiological Community Health,* 68(6): 542-549.

O'Connor, E.A., Perdue, L.A., Senger, C.A., Rushkin, M., Patnode, C.D., Bean, S.I. and Jonas, D.E., 2018. Screening and behavioral counseling interventions to reduce unhealthy alcohol use in adolescents and adults: updated evidence report and systematic review for the US Preventive Services Task Force. *Jama*, *320*(18), pp.1910-1928.

O'reilly, M. And N. Parker (2013). "'Unsatisfactory Saturation': A Critical Exploration Of The Notion Of Saturated Sample Sizes In Qualitative Research." Qualitative

Research13(2): 190-197.

Obar, J. A. And S. S. Wildman (2015). "Social Media Definition And The Governance Challenge-An Introduction To The Special Issue." Obar, JA And Wildman, S. (2015). Social Media Definition And The Governance Challenge: An Introduction To The Special Issue. *Telecommunications Policy* 39(9): 745-750.

Obot, I. S. (2006). "Alcohol Use And Related Problems In Sub-Saharan Africa." *African Journal Of Drug And Alcohol Studies*5(1): 17-26.

Ogan, C. (1982). *"*Development Journalism/Communication: The Status Of The Concept.*"* Gazette (Leiden, Netherlands)29(1): 3-13.

Ojo, S. I., AJ; Alikwe, PCN; Awokoya, OO; (2010). "Antimicrobial Potency Of Diodia Scandens And Phyllanthusamarus On Some Clinical Isolates.*"* *International Journal Of Pharmaceutical Research And Development*2(2): 1-7.

Olivier, L. C., LMG; Viljoen, DL; (2016). "Fetal Alcohol Spectrum Disorders: Prevalence Rates In South Africa.*"* *The South African Medical Journal*106(6).

Olsen, J. F., Grethe; Poulsen, Anni O; Kirchheiner, Helle; (1989). "Changing Smoking, Drinking And Eating Behaviour Among Pregnant Women In Denmark: Evaluation Of A Health Campaign In A Local Region.*"* *Scandinavian Journal Of Public Health*, 17(4): 277-280.

Olusanya, B. O. O., Tinuade A; Kumar, Praveen; Boo, Nem-Yun; Iskander, Iman F; Slusher, Tina M; (2015). "Management Of Late Pre-Term And Term Infants With Hyperbilirubinaemia In Resource-Constrained Settings.*"* *BMC Pediatrics Journal*, 39.

Olusanya, B. O., F. B. Osibanjo And T. M. Slusher (2015). "Risk Factors For Severe Neonatal Hyperbilirubinemia In Low And Middle-Income Countries: A Systematic Review And Meta-Analysis." *Plus One*10(2): E0117229.

Olusanya, O. A. B., Adam E. (2015). "Letter To The Editor: Why Do Pregnant South African Women Drink Alcohol? *A Call To Action For More Qualitative Investigations." The International Journal Of Alcohol And Drug Research*4(2): 171-174.

Omar, S. M. (2012). "Rethinking Development From A Postcolonial Perspective." *Journal Of Conflictology*3(1).

Orebiyi, A., G. Okunnu, M. Apanisile, T. Adinlewa, E. O. Olubodede, N. D. Wapwera, N. N. Kangpe, E. O. Ademola, S. S. Fogbonjaiye And A. Haruna (2019). "*SOUTHWESTERN JOURNAL OF SOCIAL AND MANAGEMENT SCIENCES (SJSMS)." MANAGEMENT1*(2).

Organization, W. H. (2019). Global Action Plan On Physical Activity 2018-2030: More Active People For A Healthier World, World Health Organization.

Organization, W. H. (2019). Global Status Report On Alcohol And Health 2018, World

Health Organization.

Organization, W. H. (2019). The WHO Special Initiative For Mental Health (2019-2023) : Universal Health Coverage For Mental Health, World Health Organization.

Orr, S. T., S. A. James And J. P. Reiter (2008). "Unintended Pregnancy And Prenatal Behaviors Among Urban, Black Women In Baltimore, Maryland: The Baltimore Preterm Birth Study." *Annals Of Epidemiology*18(7): 545-551.

Ouellette, E. M. R., Henry L; Rosman, N Paul; Weiner, Lyn (1977). "Adverse Effects On Offspring Of Maternal Alcohol Abuse During Pregnancy." *New England Journal Of Medicine*297(10): 528-530.

Ouellette, E. M., H. L. Rosett, N. P. Rosman And L. Weiner (1977). "Adverse Effects On Offspring Of Maternal Alcohol Abuse During Pregnancy." *New England Journal Of Medicine*297(10): 528-530.

Panter-Brick, C., S. E. Clarke, H. Lomas, M. Pinder And S. W. Lindsay (2006). "Culturally Compelling Strategies For Behaviour Change: A Social Ecology Model And Case Study In Malaria Prevention." *Social Science & Medicine*62(11): 2810-2825.

Parker, W. (2018). "Community Health Priorities: Lessons For Malaria Prevention From Balaka District, Malawi." *Malawi Medical Journal*30(2): 99-102.

Parker, W. And A. Becker-Benton (2016). "Experiences In Conducting Participatory Communication Research For HIV Prevention Globally: Translating Critical Dialog Into Action Through Action Media." *Frontiers In Public Health4*.

Parry, C. D., A. Plüddemann, K. Steyn, D. Bradshaw, R. Norman And R. Laubscher (2005). "Alcohol Use In South Africa: Findings From The First Demographic And Health Survey (1998)." *J Stud Alcohol*66(1): 91-97.

Parry, C. D., A. Plüddemann, K. Steyn, D. Bradshaw, R. Norman And R. Laubscher (2005). *"Alcohol Use In South Africa:* Findings From The First Demographic And Health Survey (1998)." *J Stud Alcohol*66(1): 91-97.

Parry, C. H., Nadine; (2012). "A Total Ban On Alcohol Advertising: Presenting The Public Health Case." *South African Medical Journal*, 102(7): 602-604.

Parry, C., J. Rehm And N. Morojele (2010). "Is There A Causal Relationship Between Alcohol And HIV? Implications For Policy, Practice And Future Research." *African Journal Of Drug And Alcohol Studies*9(2).

Pathak, V., B. Jena And S. Kalra (2013). "Qualitative Research." Perspectives In Clinical Research4(3).

Pattison, E. M. (1967). "Differential Diagnosis Of Alcoholism." Postgraduate Medicine41(6): A-127-A-132.

Patton, M. Q. (2002). "Two Decades Of Developments In Qualitative Inquiry: A Personal,

Experiential Perspective." *Qualitative Social Work*1(3): 261-283.

Paul, R. and Elder, L., 2019. *The Thinker's Guide to Socratic Questioning*. Rowman & Littlefield.

Pegram, S.E., Abbey, A., Helmers, B.R., Benbouriche, M., Jilani, Z. and Woerner, J., 2018. Men who sexually assault drinking women: Similarities and differences with men who sexually assault sober women and nonperpetrators. *Violence against women*, *24*(11), pp.1327-1348.

Peltzer, K. D., A; Njuho, P; (2011). "Alcohol Use And Problem Drinking In South Africa: Findings From A National Population-Based Survey." *African Journal Of Pyschiatry*14: 30-37.

Peltzer, K. D., A; Njuho, P; (2011). "Alcohol Use And Problem Drinking In South Africa: Findings From A National Population-Based Survey."*Afr J Psychiatry* (Johannesburg)14(1): 30-37.

Peltzer, K. P., Supa (2018). "Alcohol Use And Problem Drinking In South Africa: Results From A National-Population-Based Survey 2014-2015." *Journal Of Psychology In Africa*28(2): 147-151.

Peltzer, K. R., S; (2009). "Alcohol Use Trends In South Africa," *Journal Of Social Science*, 18: 1-12.

Petty, R. E. And J. T. Cacioppo (1986). The Elaboration Likelihood Model Of Persuasion. Communication And Persuasion, *Springe*r: 1-24.

Pham, L. T. M. (2018). "Qualitative Approach To Research, A Review Of Advantages And Disadvantages Of Three Paradigms: Positivism, Interpretivism And Critical Inquiry." The University Of Adelaide.

Pillay, Y. And H. Subedar (1992). "Primary Mental Health Care: Indications And Obstacles." Curationis15(2): 5-7.

Pirio, G. (2019). "Improving Development Outcomes Through Social AndBehavior Change Communication: Applying A Governance Lens." The Communication Initiative Network.

Pirkola, S., R. Sund, E. Sailas And K. Wahlbeck (2009). "Community Mental-Health Services And Suicide Rate In Finland: A Nationwide Small-Area Analysis." *Lancet*373(9658): 147-153.

Polkinghorne, D. E. (2005). "Language And Meaning: Data Collection In Qualitative Research." *Journal of counselling Psychology*52(2): 137.

Popova, S., B. Stade, M. Johnston, H. Mackay, S. Lange, D. Bekmuradov And J. Rehm (2011). "Evaluating The Cost Of Fetal Alcohol Spectrum Disorder." *J Stud Alcohol Drugs*72(1): 163-164.

Pregnancy posting: exploring characteristics of social media posts around pregnancy and user engagement Jessica R. Oviatt, Stephanie M. Reich

PrüSs-ÜStüN, A., E. Rapiti And Y. J. Hutin (2003). Sharps Injuries: Global Burden of disease From Sharps Injuries To Health-Care Workers, Geneva.

Quebral, N. C. (2011). Devcom Los Banos Style. Lecture Delivered At The Honorary Doctoral Celebration Seminar, University Of London. Retrieved February 2020.

RAJA, M. (2019). "CHAPTER TWENTY: World " The Bloomsbury Handbook Of 21st-Century Feminist Theory: 291.

Ramchandani, V. (2013). Genetics Of Alcohol Metabolism. Alcohol, Nutrition And Health Consequences. R. P. Watson, V; Zibadi, S. Totowa, New Jersey, *Humana Press*.

Rataemane, S. And L. Rataemane (2006). "Alcohol In South Africa." *International Journal Of Drug Policy*17: 373-375.

Rawjee, V. P. (2002). Effective HIV/AIDS Communication Campaigns: A Case Study Of An HIV/AIDS Awareness Campaign Targeted At Young Adults At A Tertiary InstitutionPhd Thesis, University Of Kwazulu Natal.

RCOG, R. (2006). Immersion In Water During Labour And Birth Joint Statement No. 1, Royal College Of Obstetricians And Gynaecologists And Royal College Of Midwives.

Rehm, J. B., Dolly; Borges, Guilherme LG; Graham, Kathryn; Irving, Hyacinth; Kehoe, Tara; Parry, Charles D; Patra, Jayadeep; Popova, Svetlana; Poznyak, Vladimir (2010). "The Relation Between Different Dimensions Of Alcohol Consumption And Burden Of Disease: An Overview." Addiction 105(5): 817-843.

Reis, R. K., E. S. Melo And E. Gir (2016). "Factors Associated With Inconsistent Condom Use Among People Living With HIV/Aids." Revistabrasileira De Enfermagem69(1): 40-46.

REPUBLIC OF SOUTH AFRICA (2018). "Deputy Minister Hendriettabogopane-Zulu Hosts 9-9-9 Campaign Against Fetal Alcohol Syndrome Community Dialogue InKeimos | South African Government." South African Government.

Reyes, G. E. (2001). "Four Main Theories Of Development: Modernization, Dependency, Word-System, And Globalization."Nómadas. Revistacrítica De Cienciassociales Y Jurídicas4(2): 109-124.

Ritchie, C., F. Ritchie And R. Ward (2009). "How Can I Drink Safely? Perception versus Reality Of Alcohol Consumption." *The Service Industries Journal*29(10): 1397-1411.

Ritchie, J. (1985). The Aliphatic Alcohols. Goodman And Gilman's The Pharmacological Basis Of Therapeutics. L. G. AG Gilman, TWW Rall& F Murad. New York, Macmillan: 372-386.

Robinson, O. C. (2014*).* "Sampling In Interview-Based Qualitative Research: A Theoretical And Practical Guide." Qualitative Research In Psychology11(1): 25-41.

Rocha-Silva, L. D.-M., S; Erasmus, R; (1992). Alcohol, Tobacco And Other Drug Use Among Black Youth. Pretoria, South Africa, Human Sciences Research Council (HSRC).

Rogoff, B., J. Baker-Sennett, P. Lacasa And D. Goldsmith (1995*).* "Development Through Participation In Sociocultural Activity." New Directions For Child And Adolescent Development1995(67): 45-65.

Romaniuk, S. N., F. Grice, D. Irrera And S. Webb (2017). The Palgrave Handbook Of Global Counterterrorism Policy, *Springer*.

Room, R. (2013). "Sociocultural Aspects Of Alcohol Consumption." Alcohol: *Science, Policy And Public Health*: 38-45.

Rosenstock, I. (1974). "Historical Origins Of The Health Belief Model." *Health Education Monographs,*2: 328-335.

Ross, A., S. C. Naidoo And S. Dlamini (2018). "An Evaluation Of The Medical Internship Programme At King Edward VIII Hospital, South Africa In 2016." *South African Family Practice*60(6): 187-191.

Ross, S. And E. Peselow (2012). "Co-Occurring Psychotic And Addictive Disorders: Neurobiology And Diagnosis." *Clinical Neuro-pharmacology*35(5): 235-243.

Royce, J. E. (1981). Alcohol Problems And Alcoholism: A Comprehensive Survey. New York, Free Press.

Rozin, P. (1999). "The Process Of Moralization." *Psychological Science*10(3): 218-221.

Rubin, D. B. (2005). "Causal Inference Using Potential Outcomes: Design, Modeling, Decisions." *Journal Of The American Statistical Association*100(469): 322-331.

Rutter, M. (2007). "Proceeding From Observed Correlation To Causal Inference: The Use Of Natural Experiments." *Perspectives On Psychological Science* 2(4): 377-395.

Ryan, G. W. And H. R. Bernard (2003). "Techniques To Identify Themes." *Field Methods*15(1): 85-109.

Sackey, E., K. D. Clark And Y. Lin (2017). "Participatory Communication Versus Communication Strategies Of A Transnational NGO: Implementing The Indoor Residual Spraying Program In The Northern Region, Ghana." *Journal Of Intercultural Communication Research*46(3): 227-246.

SADHS (2016). South Africa Demographic And Health Survey, National Department Of Health, Statistics South Africa (Stats SA), *South African Medical Research Council (SAMRC)*: 5-136.

SADHS. (2016). "Demographic And Health Survey," Retrieved December 21, 2020, From

Https://Microdata.Worldbank.Org/Index.Php/Catalog/3408.

Sadock, B. J., V. A. Sadock And P. Ruiz (2017). Comprehensive Textbook Of Psychiatry 10th Edition, United States Of America: Wolters Kluwer.

Saho (2020). *"Zulu* | South African History Online."

Saldaña, J. (2015). The Coding Manual For Qualitative Researchers, *Sage*.

Salmon, C. T., T. Poorisat And S.-H. Kim (2019). "Third-Person Effect In The Context Of Public Relations And Corporate Communication." *Public Relations Review*45(4): 101823.

Sandelowski, M. (1993). "Rigor Or Rigor Mortis: The Problem Of Rigor In Qualitative Research." *Advances In Nursing Science*16(2): 1-8.

Sandelowski, M. (1996). "*Using Qualitative Methods In Intervention Studies*." Research In Nursing & Health19(4): 359-364.

Sandesh, A. (2019). "Behavior Change Communication (BCC): Importance And Strategies." Public Health Notes Https://Www.Publichealthnotes.Com/1142-2/.

Saukko, P. (2003). Doing Research In Cultural Studies: An Introduction To Classical And New Methodological Approaches, *Sage*.

Saukko, P. (2004). "Genomic Susceptibility-Testing And Pregnancy: Something Old, Something New." *New Genetics And Society 23*(3): 313-325.

Savic, M., Room, R., Mugavin, J., Pennay, A. and Livingston, M., 2016. Defining "drinking culture": A critical review of its meaning and connotation in social research on alcohol problems. *Drugs: Education, Prevention and Policy*, *23*(4), pp.270-282.

SBCC-SNEB-webinar-Mary-Packard.pdf

Schiavo, R. (2008). "The Rise Of E-Health: Current Trends And Topics On Online Health Communications." *Journal Of Medical Marketing*8(1): 9-18.

Schneider, K. J., J. F. Pierson And J. F. Bugental (2014). The Handbook Of Humanistic Psychology: Theory, Research, And Practice, *Sage* Publications.

Schneider, M. C., M; Neuman, M; Parry, C; (2012). "Alcohol Consumption And HIV/AIDS: The Neglected Interface." *Addiction*107(8): 1369-1371.

Schneider, M. C., Matthew; Temmerman, Marleen; Degomme, Olivier; Parry, Charles D (2014). "The Impact Of Alcohol On HIV Prevention And Treatment For South Africans In Primary Healthcare." Curationis37: 01-08.

Schölin, L., Watson, J., Dyson, J. and Smith, L.A., 2019. Alcohol guidelines for pregnant women: barriers and enablers for midwives to deliver advice.

Schwartz, J. J. And D. Tabb (1972). "Social Welfare: Changing Policies And Changing Priorities." *American Behavioral Scientist15*(5): 645-664.

Scott-Sheldon, L.A., Carey, M.P. and Carey, K.B., 2010. Alcohol and risky sexual behavior among heavy drinking college students. *AIDS and Behavior*, *14*(4), pp.845-853.

Seggie, J. (2012). "Alcohol And South Africa's Youth." *SAMJ: South African Medical Journal*102(7): 587-587.

Senecky, Y., N. Weiss, S. A. Shalev, D. Peleg, D. Inbar, G. Chodick, Z. Nachum, R. Bar-Hamburger And A. Shuper (2011). "Alcohol Consumption During Pregnancy Among Women In Israel." *Journal Of Population Therapeutics And Clinical Pharmacology*18(2).

Servaes, J. (1996). "Participatory Communication (Research) From A Freirian Perspective." *Africa Media Review10*: 73-91.

Servaes, J. (2002). "The European Information Society: Much Ado About Nothing?" Gazette (Leiden, Netherlands)64(5): 433-447.

Servaes, J. (2008). "Participatory Communication." *The International Encyclopedia Of Communication.*

Servaes, J. And P. Malikhao (2007). "Participatory Communication: The New Paradigm?" *REDES COM-REVISTA DE ESTUDIOS PARA EL DESARROLLO SOCIAL DE LA COMUNICACION* (4): 43-60.

Servaes, J. M., P; (2005). Participatory Communication: The New Paradigm.

Setlalentoa, B., P. Pisa, G. Thekisho, E. Ryke And T. Loots Du (2010). "The Social Aspects Of Alcohol Misuse/Abuse In South Africa." *South African Journal Of Clinical Nutrition*23(Sup2): 11-15.

Shah, H. (2011). The Production Of Modernization: Daniel Lerner, Mass Media, And The Passing Of Traditional Society, Temple University Press.

Shambare, R. (2014). "The Adoption Whatsapp: Breaking The Vicious Cycle Of Technological Poverty In South Africa." *Journal Of Economics And Behavioral Studies*6(7): 542-550.

Sheridan, C. L. And S. A. Radmacher (1992). Health Psychology: Challenging The Biomedical Model, *John Wiley & Sons.*

Shils, E. (1960). "Political Development In The New States (II)." Comparative Studies In Society And History2(4): 379-411.

Shuper, P. A. N., M.; Kanteres, F.; Baliunas, D.; Joharchi, N.; Rehm, J. (2010). "Causal Considerations On Alcohol And HIV/AIDS--A Systematic Review." *Alcohol Alcohol45(2): 159-166.*

Shuper, P. A., M. Neuman, F. Kanteres, D. Baliunas, N. Joharchi And J. Rehm (2010).

"Causal Considerations On Alcohol And HIV/AIDS—A Systematic Review." *Alcohol & Alcoholism45*(2): 159-166.

Siegfried, N., D. C. Pienaar, J. E. Ataguba, J. Volmink, T. Kredo, M. Jere And C. D. Parry (2014). "Restricting Or Banning Alcohol Advertising To Reduce Alcohol Consumption In Adults And Adolescents." *Cochrane Database Of Systematic Reviews* (11).

Siegfried, N., Pienaar, D.C., Ataguba, J.E., Volmink, J., Kredo, T., Jere, M. and Parry, C.D., 2014. Restricting or banning alcohol advertising to reduce alcohol consumption in adults and adolescents. *Cochrane Database of Systematic Reviews*, (11).

Silverman, D. (2000). "Analyzing Talk And Text." Handbook Of Qualitative Research2(0): 821-834.

Simon, B. And P. Oakes (2006). "Beyond Dependence: An Identity Approach To Social Power And Domination." *Human Relations*59(1): 105-139.

Singhal, S., A. Anand And O. Singh (2019). "SDE Based Generalized Innovation Diffusion Modeling." *International Journal Of Mathematical, Engineering And Management Sciences*4(3): 697-707.

Singleton, K. And E. Krause (2009). "Understanding Cultural And Linguistic Barriers To Health Literacy." OJIN: *The Online Journal Of Issues In Nursing*14(3): 4.

Slade, T., A. Johnston, M. A. Oakley Browne, G. Andrews And H. Whiteford (2009). "2007 National Survey Of Mental Health And Wellbeing: Methods And Key Findings."*Aust N Z J Psychiatry*43(7): 594-605.

Slutske, W. S., A. C. Heath, P. A. Madden, K. K. Bucholz, D. J. Statham And N. G. Martin (2002). "Personality And The Genetic Risk For Alcohol Dependence." *Journal Of Abnormal Psychology*111(1): 124.

Slutske, W. S., A. C. Heath, P. A. Madden, K. K. Bucholz, S. H. Dinwiddie, M. P. Dunne, D. S. Statham, J. B. Whitfield And N. G. Martin (1995). "Is Alcohol-Related Flushing A Protective Factor For Alcoholism In Caucasians?" *Alcoholism: Clinical And Experimental* Research19(3): 582-592.

Slutske, W. S., K. M. Jackson And K. J. Sher (2003). "The Natural History Of Problem Gambling From Age 18 To 29." *Journal Of Abnormal Psychology*112(2): 263.

Smith, D. P. (2003). "*Kant On The Dependency Of The Cosmological Argument On The Ontological Argument*."

Snape, D. And L. Spencer (2003). "Â€ Œthe Foundations Of Qualitative Researchâ€ In Richie, J. And Lewis, J." Qualitative Research Practice: A Guide For Social Science Students And Researchers London: *Sage*.

Spear, L. P. (2002). "The Adolescent Brain And The College Drinker: Biological Basis Of

Propensity To Use And Misuse Alcohol." *J Stud Alcohol Suppl* (14): 71-81.

Spencer, L., J. Ritchie, J. Lewis And L. Dillon (2004). "Quality In Qualitative Evaluation: A Framework For Assessing Research Evidence."

Steenkamp, W. (2011). "Theories Of Substance Abuse Prevention In The Workplace." Social Work/Maatskaplike Werk47(1).

Stellefson, M., Barry, A.E., Stewart, M., Paige, S.R., Apperson, A., Garris, E. and Russell, A., 2019. Resources to reduce underage drinking risks and associated harms: social ecological perspectives. *Health promotion practice*, *20*(2), pp.160-166.

Stenius, V. M. And B. M. Veysey (2005). "It's The Little Things": Women, Trauma, And Strategies For Healing." *J Interpers Violence20*(10): 1155-1174.

Steup, M. And S. Ernest (2005). Contemporary Debates In Epistemology. Malden, MA, Blackwell.

Stewart, F., G. Ranis And E. Samman (2018). Advancing Human Development: Theory And Practice, Oxford University Press.

Strickland, C. M. P., Christopher J; (2015). Biomedical Model. *The Encyclopedia Of Clinical Psychology*: 1-3.

Stuart, A., H. Pretorius And N. Goldstein (2003). "TheSocial Construction Of HIV/AIDS." *Health SA Gesondheid*8(2): 14-22.

Studies, I. O. A. (2008). "Alcohol Consumption And Women." Retrieved December 212020, From Http://Www.Ias.Org.Uk/Alcohol-Knowledge-Centre/Alcohol-And-Women.Aspx.

Sudhinaraset, M., Wigglesworth, C. and Takeuchi, D.T., 2016. Social and cultural contexts of alcohol use: Influences in a social–ecological framework. *Alcohol research: current reviews*.

Sutker, P. B., K. C. Goist Jr And A. R. King (1987). "Acute Alcohol Intoxication In Women: Relationship To Dose And Menstrual Cycle Phase." Alcoholism*: Clinical And Experimental* Research11(1): 74-79.

Sutton, J. And Z. Austin (2015). "Qualitative Research: Data Collection, Analysis, And Management." *The Canadian Journal Of Hospital Pharmacy*68(3): 226.

Symons, M., Carter, M., Oscar, J., Pearson, G., Bruce, K., Newett, K. and Fitzpatrick, J.P., 2020. A reduction in reported alcohol use in pregnancy in Australian Aboriginal communities: a prevention campaign showing promise. *Australian and New Zealand journal of public health*, *44*(4), pp.284-290.

Taherdoost, H. (2016). "Sampling Methods In Research Methodology; How To Choose A Sampling Technique For Research." How To Choose A Sampling Technique For Research (April 10, 2016).

Takeida, K., A. Ishida, T. Hukushima And M. Mori (2001). "[Behavior Of Drinking Alcoholic Beverages Among Junior And Senior High School Students In The Area Covered With Wakkanai Health Center Of Hokkaido, Japan]." Nihon Arukoruyakubutsuigakkai Zasshi36(5): 491-503.

Taylor, K. And C. Marienau (1997). "Constructive-Development Theory As A Framework For Assessment In Higher Education." *Assessment And Evaluation In Higher Education*22(2): 233-243.

Teer-Tomaselli, R., L. Dyll And E. Govender Twenty Years Of Communicating Social Change: A Southern African Perspective On Teaching, Researching And Doing. Learning From Communicators In Social Change, *Springer*: 211-233.

Thackeray, R. And B. L. Neiger (2009). ″A Multidirectional Communication Model: Implications For Social Marketing Practice." *Health Promotion Practice*10(2): 171-175.

Thaker, J. And M. Dutta (2016). Millet In Our Voices: A Culturally-Centred Articulation Of Alternative Development By DDS Women Farmers' Sanghams. Globalisation And The Challenges Of Development In Contemporary India, *Springer*: 131-144.

Thanh, N. C. And T. Thanh (2015). "The Interconnection Between Interpretivist Paradigm And Qualitative Methods In Education.″ *American Journal Of Educational Science*1(2): 24-27.

Thomas, A., A. Menon, J. Boruff, A. M. Rodriguez And S. Ahmed (2014). "Applications Of Social Constructivist Learning Theories In Knowledge Translation For Healthcare Professionals: A Scoping Review." *Implementation Science*9(1): 54.

Thomas, P. N. (2014). "Development Communication And Social Change In Historical Context.″ The Handbook Of Development Communication And Social Change: 5-19.

Thomas, P. N. And E. Van De Fliert (2014*)*. Interrogating The Theory And Practice Of Communication For Social Change: The Basis For A Renewal, *Springer*.

Thurmeier, R. D., S; Lavack, A; Agrey, N; Cismaru, M; (2011). Next Steps In FASD Primary Prevention.Fetal Alcohol Spectrum Disorder Management And Policy Perspectives Of FASD. E. C. Riley, S; Weinberg, J; Jonsson, E; Wiley-Blackwell: 175-191.

Tichenor, P. J., G. A. Donohue And C. N. Olien (1970). "Mass Media Flow And Differential Growth In Knowledge.″ *Public Opinion Quarterly*34(2): 159-170.

Tipps, D. C. (1973). ″Modernization Theory And The Comparative Study Of Societies: A Critical Perspective." Comparative Studies In Society And History, 15(2): 199-226.

Tomaselli, K. G. And R. Tomaselli (1984). ″Media Graphics As An Interventionist Strategy.″ *Information Design Journal*4(2): 99-117.

Tomaselli, K. G., L. Dyll-Myklebust And S. Van Grootheest (2013). "Personal/Political

Interventions Via Autoethnography: Dualisms, Knowledge, Power And Performativity In Research Relations." *The Handbook Of Autoethnography*: 576-598.

Tracy, S. J. (2010). "Qualitative Quality: Eight "big-tent" Criteria For Excellent Qualitative Research." *Qualitative Inquiry*16(10): 837-851.

Trangenstein, P. J. M., Neo K; Lombard, Carl; Jernigan, David H; Parry, Charles D. H; (2018). "Heavy Drinking And Contextual Risk Factors Among Adults In South Africa: Findings From The International Alcohol Control Study." Substance Abuse Treatment, Prevention, And Policy13(1): 43.

Tsirikos, A. (2008). "*INTRODUCTION TO APPLIED THEMATIC ANALYSIS." Academia Online Journals.*

Turner, B. M., P. B. Sederberg, S. D. Brown And M. Steyvers (2013). "A Method For Efficiently Sampling From Distributions With Correlated Dimensions." *Psychological Methods*18(3): 368.

Tylor, E. B. (1871). Primitive Culture: Researches into The Development Of Mythology, Philosophy, Religion, Art, And Custom, J. Murray.

UNICEF (2008). Fetal Alcohol Spectrum Disorder In South Africa: Situational And Gap Analysis. K. R. L. Mkosi, Leslie; Adnams, Colleen; Morojele, Neo; Mcloughlin, Jo-Ann; Goldstone, Cheryl; Geneva.

UNICEF, R. (2018). "Communication For Development Strategic Framework 2018-2021." UNICEF.

Urban, M. F., M. F. Chersich, L.-A. Fourie, C. Chetty, L. Olivier And D. Viljoen (2008a). "Fetal Alcohol Syndrome Among Grade-One Children In The Northern Cape Province: Prevalence And Risk Factors." *South African Medical Journal*98(11): 877-882.

Urbán, R., G. Kökönyei And Z. Demetrovics (2008). "Alcohol Outcome Expectancies And Drinking Motives Mediate The Association Between Sensation Seeking And Alcohol Use Among Adolescents." *Addictive Behaviors*33(10): 1344-1352.

Vaismoradi, M., J. Jones, H. Turunen And S. Snelgrove (2016). "Theme Development In Qualitative Content Analysis And Thematic Analysis."

Van Der Wulp, N. Y., C. Hoving And H. De Vries (2013). "A Qualitative Investigation Of Alcohol Use Advice During Pregnancy: Experiences Of Dutch Midwives, Pregnant Women And Their Partners." *Midwifery*29(11): E89-E98.

Van Niekerk, J. And R. Vonsolms (2005). A Holistic Framework For The Fostering Of An Information Security Sub-Culture In Organizations. Issa.

Vasileiou, K., J. Barnett, S. Thorpe And T. Young (2018). "Characterising And Justifying Sample Size Sufficiency In Interview-Based Studies: Systematic Analysis Of Qualitative Health Research Over 15 years." *BMC Medical Research*

*Methodology*18(1): 148.

Vellios, N. G. V. W., C P (2017). Self-Reported Alcohol Use And Binge Drinking In South Africa: Evidence From The National Income Dynamics Study, 2014 - 2015.

Vygotsky, L. S. (1978). "Socio-Cultural Theory." Mind In Society: 52-58.

Vythilingum, B., A. Roos, S. C. Faure, L. Geerts And D. J. Stein (2012). "Risk Factors For Substance Use In Pregnant Women In South Africa." *SAMJ: South African Medical Journal*102(11): 853-854.

Waisbord, S. R., N. Morris, K. Nordenstreng, R. B. Horwitz, S.-K. Hong, D. Kim And P. Schlesinger (2001). Media And Globalization: Why The State Matters, *Rowman & Littlefield*.

Walker, J. L. (2012). "Research Column. *The Use Of Saturation In Qualitative Research*." *Canadian Journal Of Cardiovascular Nursing*22(2).

Wall, T. S., SH; Luczak, SE; Cook, TAR; Carr, LG; (2005). "Genetic Associations OfAlcohol Dehydrogenase With Alcohol Use Disorders And Endophenotypes In White College Students." *Journal Of Abnormal Psychology: Public Medicine*114: 456-465.

Warner, L. A. And H. R. White (2003). "Longitudinal Effects Of Age At Onset And First Drinking Situations On Problem Drinking." *Substance Use & Misuse38*(14): 1983-2016.

Warren, K. R., B. G. Hewitt And J. D. Thomas (2011). "Fetal Alcohol Spectrum Disorders: Research Challenges And Opportunities." *Alcohol Research & Health*34(1): 4.

Watt, M. H., L. A. Eaton, A. C. Dennis, K. W. Choi, S. C. Kalichman, D. Skinner And K. *J. Sikkema (2016)*. "Alcohol Use During Pregnancy In A South African Community: Reconciling Knowledge, Norms, And Personal Experience." *Maternal And Child Health Journal*20(1): 48-55.

Watt, M. H., L. A. Eaton, A. C. Dennis, K. W. Choi, S. C. Kalichman, D. Skinner And K. J. Sikkema (2016). "Alcohol Use During Pregnancy In A South African Community: Reconciling Knowledge, Norms, And Personal Experience." *Maternal And Child Health Journal*20(1): 48-55.

Weber, M.K., Floyd, R.L., Riley, E.P. and Snider Jr, D.E., 2002. National Task Force on fetal alcohol syndrome and fetal alcohol effect. *MMWR Recomm Rep*, *51*(RR-14), pp.9-12.

Wenxiu, P. (2015). "Analysis Of New Media Communication Based On Lasswell's "5W" Model." *Journal Of Educational And Social Research5*(3): 245-245.

West, D.M., 2015. Digital divide: Improving Internet access in the developing world through affordable services and diverse content. *Center for Technology Innovation at Brookings*, pp.1-30.

Westley, B. H. And M. S. Maclean (1955). "A Conceptual Model For Communications Research." Audiovisual Communication Review3(1): 3-12.

White, A.M., Tapert, S. and Shukla, S.D., 2018. Binge drinking: Predictors, patterns, and consequences. *Alcohol research: current reviews*, *39*(1), p.1.

WHO (2017)."Counting The Costs Of Drinking Alcohol During Pregnancy." Bulletin Of The World Health Organisation, 95: 320-321.

WHO (2018).Global Status Report On Alcohol And Health. Geneva 472.

Wiboolyasarin, W. (2012). "Blended Instructional Model-Based OnParticipatorycommunication With Round Table Using Social Media To enhance Creative Criticism Writing Ability For undergraduate Students: A Synthesis And Proposed Model." *International Journal Of E-Education, E-Business, E-Management And E-Learning*2(6): 521.

Williams, G. (2016). "Slaves, Workers, And Wine: The 'Dop System' In The History Of The Cape Wine Industry, 1658–1894." *Journal Of Southern African Studies*42(5): 893-909.

Wilsnack, R. W. And R. Cheloha (1987). "Women's Roles And Problem Drinking Across The Lifespan." *Social Problems34*(3): 231-248.

Wood, J. T. (2008). Communication In Our Lives, Cengage Learning.

Wood, S. and Bellis, M., 2017. Socio-economic inequalities in alcohol consumption and harm: Evidence for effective interventions and policy across EU countries. *Brussels: European Commission*.

Woodrow, C. And D. E. Guest (2014). "When Good HR Gets Bad Results: Exploring The Challenge Of HR Implementation In The Case Of Workplace Bullying." *Human Resource Management Journal*24(1): 38-56.

Yilmaz, K. (2013). "Comparison Of Quantitative And Qualitative Research Traditions: Epistemological, Theoretical, And Methodological Differences." *European Journal Of Education*48(2): 311-325.

Young, B., S. Lewis, S. V. Katikireddi, L. Bauld, M. Stead, K. Angus, M. Campbell, S. Hilton, J. Thomas, K. Hinds, A. Ashie And T. Langley (2018). "Effectiveness Of Mass Media Campaigns To Reduce Alcohol Consumption And Harm: A Systematic Review." *Alcohol Alcohol*53(3): 302-316.

Yzer, M. (2017). "Theory Of Reasoned Action And Theory Of Planned Behavior." The International Encyclopedia Of Media Effects: 1-7.

Zamawe, C., Banda, M. and Dube, A., 2015. The effect of mass media campaign on Men's participation in maternal health: a cross-sectional study in Malawi. *Reproductive health*, *12*(1), pp.1-7.

Zeigler, D. W., C. C. Wang, R. A. Yoast, B. D. Dickinson, M. A. Mccaffree, C. B. Robinowitz And M. L. Sterling (2005). "The Neurocognitive Effects Of Alcohol On Adolescents And College Students.*"Prev Med*40(1): 23-32.

Zola, I. K. (1966). "Culture And Symptoms--An Analysis Of Patient's Presenting Complaints." *American Sociological Review:* 615-630.