

THE USE OF SOCIAL MEDIA BY AIDS FOUNDATION OF SOUTH AFRICA TO PROMOTE HIV TESTING AND PREVENTION FOLLOWING THE RELEASE OF UNIVERSAL TEST AND TREAT POLICY IN 2016

 \mathbf{BY}

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DECLARATION

I, Yandisa Ntshongwana (219080228) declare that the dissertation entitled "The use of social media by AIDS Foundation of South Africa to promote HIV testing and prevention following the release of Universal test and treat policy in 2016." is my own Masters work and has not previously been submitted for a degree at this or any other university. I further declare that all the information derived from the published or unpublished work of others has been duly acknowledged in the text and a list of references is given.

SIGNATURE DATE



04 February 2021

DEDICATION

This dissertation is dedicated to my parents Mrs Nofikile Ntshongwana, for her prayers and my late father Mr Pupu Ntshongwana for frequently reminding me that education is the key to success: Without them, I would not be where I am today. This dissertation is also dedicated to all health care workers, government departments, health organizations, civil society groups and the general public who are working tirelessly in the fight against HIV/AIDS and all HIV survivors who are endlessly spreading the word in the fight against HIV/AIDS.

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ABSTRACT

HIV prevention and testing are important in preventing the spread of Human Immunodeficiency Virus (HIV) and Acquired Immune Deficiency Syndrome (AIDS), but many people are still engaging in unsafe sexual practices. In 2015 the national Department of Health in collaboration with the Joint United Nations Programme on HIV/AIDS (UNAIDS) initiated a policy called Universal Test and Treat (UTT) policy that sought to support and encourage more prevention and treatment towards HIV/AIDS. UTT policy as HIV prevention policy became effective to South Africa in 2016 to further promote HIV testing and prevention. The policy established some guidelines that sought to prevent the spread of HIV/AIDS through reducing HIV infection and related death by 2020, with the UNAIDS recommending that 90% of people should know their HIV status, 90% of positive people should receive a sustained Antiretroviral treatment, and 90% of people receiving treatment should be viral suppressed (WHO, 2016). Much research was focused on preventive measures and barriers that prevented people from accessing health care services. The problem for the study is based on the effectiveness of social media platforms in communicating health information, to ascertain whether these platforms are effective or not in communicating HIV messages. From the literature reviewed there has not much studies done to explore the effectiveness of social media for HIV communication after the release of UTT Policy in 2016. This study focuses on the effectiveness of Facebook in promoting of HIV testing and prevention with the AIDS Foundation of South Africa (AFSA) page as the case study to explore the promotion of the UTT towards increased HIV prevention and testing efforts.

This was done by using purposive sampling to purposely select posts that were posted by AIDS Foundation of South Africa on their Facebook page only posts on HIV testing and prevention following the release of UTT policy and these posts were collected from September 2016 to December 2019 and the researcher also explored ways in which AFSA messages reflect the national Department of Health HIV prevention and testing messages in the same year period. To understand the effectiveness of social media platforms in communicating HIV prevention messages, the qualitative content analysis was used to collect and interpret data gathered from AFSA's and NDoH's Facebook pages on HIV prevention and testing and public comments were also analysed and interpreted. The collected data from the qualitative content analysis was analysed through the use of thematic data analysis. The coding sheet for the two health organisations was established to create codes. Categories and themes were extracted from the coding process and further discussed.

Social media health interaction theory provided the conceptual framework for the research to discuss the effectiveness of social media on health-related issues. The researcher found that social media such as Facebook is effective for HIV communication and AFSA as one of the key health organisations in South Africa was using these platforms to further promoted HIV testing and prevention from 2016 to 2019 following the release of UTT policy. Social media platforms are effective platforms that can be used to communicate health related messages particularly on HIV testing and prevention.

Key Words: AIDS Foundation of South Africa, Universal test and treat policy, Social media, HIV testing, Prevention.

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ACRONYMS AND ABBREVIATIONS

AFSA AIDS Foundation of South Africa

ART Antiretroviral Treatment

ABC Abstain, Be Faithful & Condomise

AIDS Acquired Immunodeficiency Syndrome

CCMS Culture, Communication and Media Studies

CDC Centre for Disease Control and Prevention

CIDIA Centre for Infectious Disease in Africa (CIDIA)

DoH Department of Health

DoHSA Department of Health South Africa

DTHF Desmond Tutu HIV Foundation

DOT Directly Observed Therapy

DTG Dolutegravir

GBV Gender Based Violence

MSM Men having sex with men

MOH Ministry of Health

NDoH National Department of Health

HIV Human Immunodeficiency Virus

ICC International Convention Centre

PITC Provider-Initiated HIV Testing & Counselling

PrEP Pre- or Post-Exposure Prophylaxis

PMTC Prevention of Mother-To-Child Transmission

PADVP Partnerships Against Domestic Violence Programme

PLWHA People living with HIV/AIDS

SSL Secure Sockets Layer

Stats SA Statistics of South Africa

SDI Same Day Initiation

STI Sexually Transmitted Infection

SRHR Sexual and Reproductive Health Rights

TB Tuberculosis

TDF Tenofovir disoproxil Fumarate

UNAIDS The Joint United Nations Programme on HIV/AIDS

UTT Universal Test & Treat Policy

US United States

VCT Voluntary counselling and testing

VMMC Voluntary Medical Male Circumcision

WHO World Health Organisation

CHAPTER ONE

GENERAL OVERVIEW OF THE STUDY

1.1 Introduction

The current chapter presents the general overview of the study. The background and motivation for conducting the study is provided in this chapter. Furthermore, this chapter highlights the statement of the problem, aim and objectives as well as the main questions of the study. It also presents the definition of key concepts related to the study. Lastly, the outline of ensuring chapters is presented at the end of this chapter. South Africa is the country with the population that is estimated to 58 million and an approximately of 13, 5% of total population in South Africa was recorded HIV positive in 2019 (Stats SA, 2019:6). There was an increase to the number of people living with HIV/AIDS in South Africa between 2002 and 2019 from 4, 64 million to 7, 97 million (Stats SA, 2019:6). Factors that were associated to the increased number of HIV/AIDS infections in SA were: early sexual engagement, having many sexual partners, unprotected sexual intercourse etc (Shisana et al., 2014:3). Gender-based violence (GBV) was also regarded as the contributing factor towards an increased number of HIV/AIDS infections in South Africa (Campbell et al., 2008). Due to the increased number of infections, there was a need to communicate information to the public to prevent the spread of the virus. Facebook was seen as effective platform to communicate information to the public to prevent the spread of HIV/AIDS. Facebook is the most popular social media platform in South Africa around the globe (Zuckerberg, 2010:122). South African statistics indicated that there were over 16 million Facebook users in South Africa in March 2019 which constitutes 27% of the South Africa population (Facebook, 2019). People between the ages of 25 to 34 were regarded as the most users of this social media platform with 5 500 000 users (Facebook, 2019). Around the globe, Facebook users were over 2.38 billion monthly active users (MAU's) in December 2019 (Facebook, 2019). People and organizations use Facebook for different purposes. People use this platform to interact and communicate with their friends and relatives (Stec, 2015). This social media platform also helps people share their messages with others, update their status, post photos, to comment on the content posted by other people, it also helps people to share and like content posted by other people (Facebook, 2016). Due to its use by many people and organisations in their everyday communication, Facebook was seen to be effective to communicate information on HIV testing and prevention and also to raise public awareness about the disease.

Facebook is described as communication platform that encourage interaction and communication between people (Boyd & Ellison 2007:104). Young South Africans are regarded as the most users of this new media platform as they use it for different purposes (Sun, *et al.*, 2016). Facebook is also used for HIV prevention communication and many people use this platform to disseminate and receive various message on HIV (Moreno, 2010:809). "Facebook plays an important role to increase the reach of HIV prevention messages, to

improve retention and adherence to antiretroviral therapy (ART) programs, to encourage HIV testing, and to enrol people into HIV research studies" (Hightow-Weidman *et al.* 2011:7). Facebook enables people to access HIV information from testing to prevention. This platform is also used to share and communicate information on preventing the transmission of the virus from mother to child and also communicate information on treatment (Mbuagbaw *et al.*, 2014:299). This research project seeks to analyse the HIV prevention and testing messages communicated through on Facebook by AIDS Foundation of South Africa following the release of Universal Test and Treat (UTT) policy from September 2016 to December 2019 and this period was selected due to the initiation of Universal Test and Treat Policy in South Africa with specified guidelines that seeks to reduce the spread and further transmission of HIV/AIDS to other people. Ways in which these AFSA messages reflect the national Department of Health prevention and testing messages were also analysed in the same time period. Public comments and their reaction to the communicated messages were also considered. This study is in line with the introduction of UTT policy in 2016 (WHO, 2016).

AIDS Foundation of South Africa is a development organization that exists to support local, national and regional efforts to reduce new HIV, STI and TB infections. This foundation also addresses the social and structural drivers of HIV and it removes the barriers to the realisation of sexual and reproductive health rights (SRHR) and builds resilient communities (John, 2012). AFSA also support the South African response to the 90-90-90 strategy by identifying people living with HIV outside of healthcare facilities, supports their adherence to treatment and linkage into care. The National Department of health focuses on improving health status of people through prevention of illness, disease and the promotion of healthy lifestyle. It also focuses on improving the health care service and ensuring equal access to a sustainable health care service (NDoH, 2016). These two organisations as health institutions have two similar roles of providing wellness and promoting of good healthy lifestyle, however their focus in promoting of good health is different. AIDS Foundation of South Africa focuses on reducing HIV, Sexual Transmitted Infections (STI) and Tuberculosis (TB), while the Department of Health focuses on addressing all health-related problems to improve wellness and promote healthy lifestyle.

1.2 Background of the study

The South African HIV statistics show that there are many people living with HIV/AIDS (UNAIDS, 2017). The 2019 South African statistics show that HIV affects young South Africans as young as 15 years of age until they get old to 49 years of age. The current statistics

indicate that there is alarming increase of HIV/AIDS in South Africa and it affects young people in their early ages and thereby increases the need to educate young South Africans about HIV/AIDS and measures that can be put in place to prevent the spread of the virus. In efforts to reduce the increasing infection rates in the country, the government and supporting institutions have focussed efforts on implementing HIV prevention and treatment programmes. HIV testing programmes were among the main prevention programmes adopted. "HIV testing is based on maintaining awareness of one's HIV status through regular HIV testing and is considered to be an important entry point to a comprehensive package of care for HIV and AIDS prevention and treatment" (NDoH, 2010:4). HIV testing is regarded as the gateway to prevent the spread of the virus by ensuring that those infected are provided with treatment, support; and educational campaigns are strengthened to educate both infected and uninfected people to maintain their status and this was done to prevent the transmission of the virus to other people (UNAIDS, 2011). HIV testing and counselling also helps in the early identification of the virus as it enables for the immediate referral of infected people to health institutions for treatment (Day et al. 2003:665).

To strengthen efforts of controlling and preventing the spread of the virus, there were other already existing methods that were suggested by the national Department of Health (NDoH) in collaboration with the Joint United Nations Programme on HIV/AIDS (UNAIDS). These methods were strengthened and form part of the Universal Test and Treat policy. These methods were the distribution of Antiretroviral treatment regardless of CD4 count, condom usage, scaling up of medical male circumcision and the use of oral pre-exposure prophylaxis to reduce the spread of the virus. Antiretroviral treatment (ART) was developed as a treatment for HIV/AIDS infected people to reduce viral load and boost the immune system of people living with HIV/AIDS (Ramalingham, 2013: 228). A high viral load is associated with a compromised of immune system which is meant to protect bodies from diseases thus increasing chances of infecting others and elevated chances of HIV related mortalities (Martinson et al. 2014). The development and the access to antiretroviral treatment contributed immensely to the lives of many people as it significantly reduced HIV related mortalities (Stas, SA, 2019). As an additional method for HIV prevention, condoms were developed and their use was encouraged to prevent HIV infections through sexual transmissions. However, some researchers argue that young people do not constantly use condoms and that put them at elevated risk for HIV infection (Kippax & Stephenson, 2012:8).

Voluntary medical male circumcision (VMMC) as an additional HIV prevention method to reduce HIV infections especially in areas with rising numbers of HIV infections and limited uptake of male circumcision (WHO 2012:2). "Voluntary medical male circumcision is the voluntary surgical removal of the foreskin (prepuce) from the penis and the practice is widely performed on boys and young men in Africa and other parts of the world" (Mandova *et al*, 2013:1). ABC efforts were based on motivating safer lifestyles practice by encouraging people to be faithful to their sexual partners by not having multiple sexual partners, encouraging condom use and ultimately educate people about all sexual related problems so that they can take their decisions whether to abstain or not (Grills, 2006:17). In its introduction, VMMC was adopted mostly in sub-Saharan region and in South Africa as it has been proved to reduce HIV infection by 60% (UNAIDS 2011, WHO, 2015). World Health Organisation (WHO) maintains that even circumcised people still have chances of being infected by the virus (WHO, 2015:3).

In attempts to offer a comprehensive HIV prevention package, the Department of Health adopted the use of oral pre-exposure prophylaxis which was recommended by the World Health Organisation as a user-centred HIV prevention option. In July 2014 pre-exposure prophylaxis was introduced to be used along with the use of condom to prevent further transmission of the disease to others (WHO, 2014). PrEP is the antiretroviral treatment (ART) encouraged to be used by HIV negative people who are at high risk of being infected by HIV/AIDS (WHO, 2014). To increase HIV prevention efforts, Universal Test and Treat Policy was introduced in September 2016. UTT policy support the 90-90-90 strategy as recommended by UNAIDS in collaboration with the NDoH to ensure that 90% of people get tested for HIV, 90% of infected people get HIV treatment/medication and 90% of people receiving treatment are viral suppressed (UNAIDS, 2016:2). UTT provided a move towards previously implemented guidelines that monitored a CD4 count before initiating HIV positive individuals on treatment. Through UTT, HIV individuals who test positive are initiated on treatment immediately without considering the CD4 count. This ensures early engagement in treatment while the immune system is still strong, it also serves as prevention (UNAIDS, 2016:2). The national Department of Health (NDoH) is in a view that the undetectable load of the virus from one's body does not necessary means that the virus cannot spread to others (DoH, 2012: 69).

Facebook is the most popular social media platform in South Africa and around the globe with over 2.38 billion monthly active users (MAU's) in December 2019 (Facebook, 2019). Facebook facilitates communication and exchange of information between people and organizations (Mangold & Faulds, 2009:357). "Facebook offers an easy, cost-effective way for both profit and non-profit sectors to communicate health information, promote their products

and services, and build brand communities (Facebook 2011: 63). Facebook is also used to communicate information on HIV prevention and testing (Moreno, 2010:2). The AIDS Foundation of South Africa is non-profit organisation that deals with HIV prevention and treatment related issues. It implements programmes focussed on preventing the spread of the virus to young South Africans and is key in facilitating HIV prevention discussions/engagements with young South Africans through Facebook. Then Facebook was effective for the study, as it helped the researcher to explore the use of this platform by AIDS Foundation of South Africa to promote HIV testing and prevention and ways in which AFSA messages reflect the national Department of Health prevention and testing messages.

1.3 Statement of the problem

The outbreak of HIV/AIDS became a global problem that requires an urgent attention (UNAIDS, 2017:90). The global current statistics of HIV/AIDS infections and related death increased from an estimated 4,64 million in 2002 to 7,97 million by 2019 (Stats SA, 2019:6). In 2019, there were 38.0 million of people living with HIV around the world (UNAIDS, 2019). HIV/AIDS statistics around the globe shows that HIV became to be a global challenge and infections vary with different age groups. 36.2 million adults were infected by HIV, with 1.8 million of children between the ages of 0-14 years of age were infected around the world (UNAIDS, 2019). Global statistics further indicate that about 81% of people that are living with HIV/AIDS already aware of their status and 7.1 million of people were not aware that they were living with the virus (UNAIDS, 2019). The total number of people living with HIV in South Africa was 7, 97 million by 2019 (UNAIDS, 2019:6). These statistics show that there was still more interventions and measures needed to put in place to control the spread of the virus. "Although global commitment to control the HIV and AIDS pandemic has increased significantly in recent years, the virus continues to spread with alarming and increasing speed" (UNAIDS, 2005:331). The national department of health and various health institutions suggested various measures and efforts to curb the spread of the virus. These efforts ranging from HIV testing to prevention in order to control and reduce the spread and the transmission of the virus to other people (WHO, 2016).

These HIV/AIDS initiatives became very important and effective in reducing the spread of the virus, but the HIV challenge still remains as more new cases of HIV are still recorded daily which presents questions to the effectiveness and inclusivity of the communication methods employed to promote and pass messaging on HIV prevention. There was a need to introduce other communication methods in promoting HIV prevention messages and traditional media

was adopted to ensure a greater inclusivity in promoting HIV testing and prevention messages. Traditional communication channels such as television, newspapers, radio etc were used to raise more awareness on HIV testing and prevention (Myhre & Flora, 2000; Oakley *et al*, 1995:2). These communication channels were the only available channels of communications used to communicate HIV prevention information to people during the outbreak (Noar, 2009:740). These channels were used to "inform, educate and enlighten the audience about any aspects of preventing HIV and AIDS which would help to reduce or prevent the spread of the disease" (Singh, 2009:7). However, these interventions through the use of traditional media became ineffective because these channels were regarded as expensive, not everyone was accessing/affording them, then they became ineffective in promoting health-related messages (Hertog & Fan, 1995; Nelkin, 1995:1).

The ineffectiveness of these traditional communication channels in responding to the outbreak of HIV resulted to the need of introducing other methods of communications to further communicate HIV prevention messages, with the rise of new media platforms, social media was introduced to supplement or complement traditional media (Sun, et al., 2016). This research project seeks to analyse the HIV prevention messages communicated through on social media by AIDS Foundation of South Africa following the release of Universal Test and Treat policy in 2016 (WHO,2016) and ways in which these AFSA messages reflect the national Department of Health prevention and testing messages. Public comments and their reactions to the posted content were also considered into the study. AIDS Foundation of South Africa was selected over other health organisations with similar mandate because the organisation has many offices/branches around South Africa and that makes it to have many Facebook followers all over South Africa who keep on commenting on the content posted by AFSA on Facebook around to issues of HIV testing and prevention. These Facebook followers also keep providing their suggestions and recommendations about the posted content. The researcher has selected AFSA's Facebook page because generally Facebook is the most popular social media platform around South Africa and worldwide at large with over 2.38 billion active users (Facebook, 2019). AFSA's Facebook page was selected because AIDS Foundation of South Africa communicates HIV testing and prevention messages mostly on Facebook than other social media platforms.

1.4 Research Questions

- What messages surrounding HIV prevention and testing were posted by AIDS Foundation of South Africa following the release of the Universal Test and Treat policy in 2016?
- In what ways does the HIV testing messages posted by AIDS Foundation of South Africa on Facebook reflect the national Department of Health prevention and testing messages?
- In what ways can the AIDS Foundation of South Africa utilizing Facebook to promote their programmes around HIV testing and prevention?
- How AIDS Foundation of South Africa and the national Department of Health utilizing Facebook to communicate their programmes on HIV testing and prevention?

1.5 Aim and objectives

The aim and objectives of the study are presented below:

1.5.1 Aim of the study

The main aim of this research is to analyse the HIV prevention messages communicated through social media by AIDS Foundation of South Africa following the release of universal test and treat policy in 2016.

1.5.2 Objectives of the study

- To analyse messages surrounding HIV prevention and testing that were posted by AIDS Foundation of South Africa following the release of the Universal Test and Treat policy in 2016.
- To analyze ways in which HIV testing messages posted by AIDS Foundation of South Africa on Facebook reflect the national Department of Health prevention and testing messages.
- To explore ways that AIDS Foundation of South Africa utilizing Facebook to promote their programmes around HIV testing and prevention.
- To analyses ways in which AIDS Foundation of South Africa and the national Department of Health utilizing Facebook to communicate their programmes on HIV testing and prevention.

1.6 Significance of the study

There is a depth of the literature that was reviewed to explore the effectiveness of social media use in promoting and disseminating information on health-related issues. Therefore, this study seeks to contribute to the existing body of information and knowledge on social media use to disseminate information on health-related issues, particularly on HIV prevention and testing. In South Africa the Department of Health and various health organisations are also using social media platforms such as Facebook to communicate health related messages to the public. These health organizations use this platform to communicate different health related messages to the public (Boyd & Ellison, 2008) and it is important to understand the effectiveness of Facebook for HIV communication. Health organizations that are dealing particularly with HIV prevention will be able to use social media platform such as Facebook to promote health communication, especially their programmes around HIV testing and prevention. For examples, given the increased use of social media platform such as Facebook by many people and various organizations in South Africa. Therefore, various health organizations and government departments will be able to use Facebook to disseminate information on health-related issues, particularly information on HIV testing and prevention.

In addition, most studies that exploring the use of Facebook for health communication focused on the use of Facebook for health-related messages, excluding the use and effectiveness of this platform in communicating and disseminating information on HIV testing and prevention as one of the health-related problem. This study discussed different health messages communicated by various health organizations through the use of social media platforms and the public reactions and their views to the communicated messages. This study intends to show the effectiveness and the use of Facebook in communicating health messages, by exploring how AIDS Foundation of South Africa as one of the key health organizations used Facebook to further promote their programmes around HIV testing and prevention following the release of Universal Test and Treat policy in 2016. This study further intends to influence various health organizations, private sectors, government departments and civil society groups to promote their health programmes through the use of social media platform such as Facebook particularly their programmes around HIV testing and prevention.

1.7 Delineation and Scope of the Study

This study analyses the effectiveness of Facebook in communicating of health information. The study focused to the use and the effectiveness of this platform in promoting HIV testing and prevention messages. The study does this by exploring how AFSA as one of the key health

organisations in South Africa used this platform to further promote their programmes on HIV

testing and prevention. This study was conducted in line with the release of the Universal Test

and Treat policy between September 2016 and December 2019.

1.8 **Definition of concepts**

The definitions and explanations of terms facilitate a full understanding of the main terms used

in the context of this study. A concept is a mental construct or image developed to represent

ideas or events (Monette, Sullivan & DeJong, 2011). The definition of concepts is presented

below:

1.8.1 HIV

Human Immunodeficiency Virus is a virus that attacks the body's immune system. The virus

can be transmitted through contact with infected blood, semen or vaginal fluids. If not treated,

HIV can lead to AIDS (Hardy, 2019).

1.8.2 AIDS

According to Pepin (2021) Acquired Immunodeficiency Syndrome is a chronic, potentially

life-threatening condition caused by HIV.

1.8.3 AIDS Foundation of South Africa

AIDS Foundation of South Africa is a development organization that exists to support local,

national and regional efforts to reduce new HIV, STI and TB infections. This foundation also

addresses the social and structural drivers of HIV and it removes the barriers to the realisation

of sexual and reproductive health rights (SRHR) and builds resilient communities (John, 2012).

1.8.4 Universal Test & Treat Policy

According to Mastroianni, Kahn and Kass (2019), Universal Test and Treatment policy (UTT)

was introduced on the 1st of September 2016, making antiretroviral therapy (ART) available to

all people who are HIV infected irrespective of the CD4 count.

1.8.5 Social media

Verishagen (2018) defines social media as a tool that allows users to quickly create and share

content with the public.

1.9 Structure of the dissertation

This thesis consists of six chapters. The chapters are described below:

Chapter One: General overview of the study

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Chapter one outlines statistics of HIV and AIDS in the South African context and around the

globe. It also summarizes HIV/AIDS as a South African and global challenge. This chapter

also highlights various HIV prevention programmes and campaigns that were adopted by the

Joint United Nations Programme on HIV/AIDS (UNAIDS) to prevent the spread of the virus.

This chapter also summarizes the questions to be addressed and also provides the outline for

the structure of dissertation.

Chapter Two: Literature Review

Chapter two is based on reviewing of the literature. It gives an understanding on various

communication methods used to communicate information on different health issues including

but not limited to the use of social media platforms for health communication and on HIV

prevention and testing, the use of social media by health organisations to promote HIV testing

and prevention. The use of other HIV prevention methods such as the importance of HIV

testing and prevention, the importance of pre-exposure prophylaxis (PrEP) for HIV prevention,

and strengthening of other already existing methods such as voluntary medical male

circumcision (VMMC) for HIV prevention, Abstinence, be faithful and condomise (ABC)

programmes, the distribution of Antiretroviral treatment regardless of CD 4 count, Abstain, be

faithful and condomise (ABC) programmes for HIV prevention and ultimately the importance

of Universal Test and Treat policy (UTT) for HIV prevention.

Chapter Three: Theoretical framework

Chapter three discusses theoretical framework used to the study. The theoretical approach that

guides and gives direction to the study. The social media health interaction theory was adopted

for the study. Various components on this theory were discussed to give clarity and

understanding to the study. These components were: social media is the means of accessing

and gaining information, the creation of virtual communities where interaction occurs, people

who engage in social media are seeking health related information, social media promotes

wellness of people, interaction and access to health information has changed over a period of

time, successful interaction leads to active participation. These components would help the

researcher to better understand the use of social media in disseminating of health-related

information.

Chapter Four: Research methodology

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Chapter four, this chapter discusses the research methodology adopted for the study, this involves the approach for a chosen methodology, and the qualitative content analysis was used and adopted for the study to give understanding to the study. The motivation for the selection of a chosen approach which is qualitative content analysis was also discussed.

Chapter Five: Data presentation, analysis and discussion

Chapter five focuses on analysing and interpreting of the collected data. Thematic data analysis was used to analyse all written text information posted by AFSA on Facebook page on HIV prevention messages and ways in which these messages reflect the national department of health prevention and testing messages. The coding sheet was created to extract categories and themes from the coding process. Similar themes and categories were identified and grouped together to give meaning and understanding to the research project. Chapter five also discusses findings of data collected from the text information posted by AFSA on Facebook page for HIV prevention messages and ways in which these messages reflect the NDoH prevention and testing messages.

Chapter Six: Conclusion and Recommendations

1.10 Conclusion

This chapter introduced and highlighted the effectiveness of social media platforms in health communication, particularly on HIV testing and prevention. This chapter also highlighted and gave an insight as to why the social media is effective for health communication. This chapter also outlined the delineation and the scope of the study. This study further defined and explained all terminologies on the use and the effectiveness of social media platforms in promoting of HIV prevention and testing. The next chapter focuses on reviewing of the relevant literature used for the study.

CHAPTER TWO

LITERATURE REVIEW

2.1 Introduction

This chapter aims to review the literature for the study. This would highlight various efforts by South African government and different health institutions in responding to the outbreak of HIV and AIDS in South Africa and around the globe. These efforts include communication that seeks to communicate and raise awareness on various health issues, including HIV and AIDS as a global problem. This chapter also gives an understanding on various communication platforms used to communicate information on different health issues including but not limited to the use of Facebook/social media platforms for health communication and on HIV prevention and testing. Chapter two will also review the literature on different HIV prevention strategies and programs used by government and health sectors to prevent the further spread of HIV, these strategies are the upscaling of HIV testing initiatives, the use of pre-exposure prophylaxis (PrEP). The voluntary medical male circumcision (VMMC) and Abstain, be faithful and condomise (ABC) programs were already existing HIV prevention methods before the declaration of UTT policy. The policy also strengthens medical male circumcision as part of HIV prevention method especially to provinces with high HIV infection and limited uptake of MMC. The policy also recommended the strengthening of ABC initiatives by emphasizing one partner in sexual relationships and the extensive use of condoms to prevent the virus. Other HIV prevention programs to be reviewed in this chapter is the importance of UTT policy for HIV prevention and testing.

2.2 Importance of health communication

Good communication involves the exchange of information between people and effective response to the communicated message (Koenig, 2011; Lum *et al.*, 2016:138). Effective communication allows people to express their views and their opinion to a particular issue and people are also allowed to ask questions for explanation if they did not hear or understand the communicated message (Koenig, 2011; Lum *et al.*, 2016). Communications is also important in the health sector, where health care workers communicate health information to the general public (Fox & Rainie, 2002). Communication helps to disseminate information on a variety of health issues such as anxiety, insomnia, diabetes, physical activities, nutrition, mental problems, HIV, cancer, asthma, blood pressure, epilepsy etc. to raise awareness about these health issues and to ensure that there is accessibility to information about these health-related issues (Cavallo *et al.*, 2012).

2.2.1 The use of social media/ Facebook for Health Communication

The advent and proliferation of internet has resulted to the extensive use of social media platforms by many people (Pew Internet, 2012). These platforms affected and transformed the way people send and receive information in South Africa and in Africa at large (Eysenbach, *et al* 2004). Social media platforms are communication platforms that enable interaction and

communication between people (Naidoo, 2008). The important purpose of social media is to create social interaction between people, facilitating the establishment of new relationships or maintaining the already existing relationship (Abram, 2012:142). People communicate with others, post their content and also view content shared by others online (Carr & Hayes, 2015). The most popular communication networks used by people to communicate each other are "blogs, microblogging sites (e.g. Twitter), media sharing sites (e.g. YouTube), social bookmarking sites (e.g. StumbleUpon), bulletin boards, and social networking sites (e.g. Facebook, Myspace and WhatsApp)" (Kaplan & Haenlein, 2010:323). Social media becomes important for media literacy and health literacy. For media literacy Social media provides technical skills of using computer software's and other application programmes to create and design something (Third and Richardson forthcoming 2007). These platforms enable people to understand social media language and rules that control the use of social media and how people should conduct themselves in these platforms (Perkel, 2006). These platforms also help young people to develop their technical knowledge and creativity to use different software's to create visual content (Perkel, 2006). Social media platforms are also important health literacy. Health literacy is based on the degree to which people understand health information and make information decision about such information (US Department of Health and Human Services, 2000). Social media platforms are important platforms for health literacy by establishing and creating dialogue between different stakeholder groups to discuss about various health issues (Roberts et al. 2017). Social media platforms increase health education, health promotion and ensure that effective and reliable information on various health issues reach people (Gosselin and Poitras, 2008).

In the past South Africa and Africa at large were using other forms of communication to disseminate information to the public on health-related matters. Health communication campaigns were conducted through the use of different mass media communication channels which were television, newspapers, radio etc. to raise awareness about the disease, and prevention strategies (Myhre & Flora, 2000; Oakley, Fullerton, & Holland, 1995:2). "Although global commitment to control diseases such as HIV/AIDS pandemic has increased significantly in recent years, the virus continues to spread with alarming and increasing speed" (UNAIDS, 2005:331). Due to the ineffectiveness of health communication campaigns diseases such as HIV/AIDS, there was a need to explore other communication channels that could help to disseminate information to the public on various health related problems. Social media platform such as Facebook was seen as effective channel to alternate traditional media channels

on health-related information (Powell *et. al*, 2011:236). Facebook is the social media platform that allows interaction and communication between people (Boyd & Ellison, 2007:100). Facebook is also used by social groups to engage and discuss various social issues such as politics, economy and religious issues (Leng & Goh 2011:10). Facebook is also regarded as effective communication platform that could be used by health organisations to communicate information on different health issues because it is regarded as the cheapest and quickest communication platform to disseminate information to the public (Fox, 2011:1). Facebook enables people to get various health-related information shared by other people or organisations online (Ziebland & Wyke, 2012:474).

The World Health Organization argues that social media platforms such as Facebook and Twitter were instrumental in raising awareness during the outbreak of various infectious diseases around the world and they were used by various health institutions to distribute information to people in order to prevent and control the spread of such diseases (WHO, 2012). Some companies such as Redbrick Health, Stay Well and Healthways were regarded as primary companies using Facebook and other social media platforms during the outbreak of various diseases such as Ebola etc to raise awareness to people and to ensure greater access to health information (Dimatteo, 2004). "To achieve health goals such as starting an exercise plan, losing weight, lowering blood pressure or cholesterol and quitting smoking, many people use social media platform such Facebook as a motivational tool" (Elan, 2012:49). This indicates that Facebook has been effective to many people who adopted healthy lifestyle in such a way that other people use this platform to improve their health by watching videos and images posted by other people online to promote good health and that also helped them to adopt a healthy lifestyle.

Facebook has also been used to disseminate information to many different health problems and some health problems such as substance abuse, reckless sexual behaviour, and issues of diet have been communicated to the public through the use of this social media platform (Gupta, *et al*, 2013:387). The study that was conducted in 2014 in Botswana with 816 Facebook users to explore their knowledge of social media such as Facebook for health communication, the researcher found that 81% of the population was using Facebook to gain information on different health issues and this platform also helped them to communicate with different health care professionals to discuss a variety of health problems and to also discuss steps that can be taken to respond to such problems (ALrukban, 2014). Social media such as Facebook helps to

share health information ranging from "health advice and tips, disease threat, prevention and treatment options, prescriptions and appointments with specialist" (Stern, 2009:385). People who share their health problems online get advice on how to deal with a particular illness and advice on how to treat a particular health problem (Keckley, 2010). Other health organizations such as "hospitals, the pharmaceutical industry, insurers and patient organizations have already succeeded in using social media such as Facebook to interact with their stakeholders" (iCrossing, 2008:15). This indicate that some health institutions and other health sectors have already adopted this platform to interact with the public however, it is important to explore the effectiveness of this platform in disseminating health information to people.

Some health institutions are using this communication platform because this platform is regarded as cost effective and easily accessible to many people (White et al., 2009). "Modern health communication initiatives are reported to help drive down healthcare-related costs and improve quality of care" (Lewis, 2010:77). The costs associated to Facebook help many people to access health related services at any time which helps to increase wellness of people. Nonetheless, the use of Facebook in the healthcare environment is associated with the following challenges, such as the problem of privacy and confidentiality which can put people's health at risk in such a way that other people can use this channel to publicly share other people's health information without their consent which can cause some risks to one's health (Katal et al. 2013:2). Some studies argue that some of this health-related information comes from unreliable and unknown sources and people should be carefully when using online information (Katal et al. 2013:2; Li & Bernoff, 2008). Other people are utilizing Facebook to get care and support from others online who suffer from similar health problems (Plantin & Daneback, 2009:491). Different health institutions and various health personnel's such as "academic institutions, researchers and community-based institutions utilizing social media platform such as Facebook to share and make people aware of the new health-related information" (Adam et al., 2011; Calmette, 2014:31). Researcher were based on the idea that connection and communication between various health institutions online helps to accelerate the delivery of health information and improve health care service (Guse et al., 2012:27).

Facebook also helped people to form social media groups that enable them to communicate with health care workers and health authorities about various health related matters and also use this platform to advocate for effective health service (Pullman, *et al* 2013). Social media platform such as Facebook have also been used by the department of health when making or

reviewing health policy whereby the department invited the public to provide their comments during the policy review (Regional Office for Africa, 2012:474). International health institutions have also adopted this platform to disseminate health information to people, for example "state health departments in the United States use Facebook and other social media platforms such as Twitter to share health information, create transparency and engage community members on different health issues" (Harris *et al*, 2013:225).

This platform also created connection and collaboration between urban and rural health institutions through the use of various internet-based communication such as "vodka trainings and Web conferencing" to enhance service delivery (Kamel & Wheelert, 2007). A study that was conducted by Pew Internet and American Life project in 2009 indicated that 60% of the research participants who were interviewed about the effectiveness of Facebook use for health information argued that Facebook helped them to have better knowledge of handling their diseases, while 56% argued that Facebook helped them to live a healthy lifestyle (Jones & Fox, 2009:65). Similar research also indicated that 30% of people with various health challenges used Facebook to speedily obtain information about their health-related issues and about medication (Annenberg National Health Communication Survey, 2008: 192).

In 2007, Mr Zou Huachun conducted a research to a sample of 429 men who have sex with men (MSM) at Urumqi exploring the use of social media such as Facebook for sexual related dating and the effects of Facebook dating to HIV infection. The researcher found that 96.2% of people were dating online and 91.2% of people were having sexual partners on Facebook and 70.1 percent of those who were having online sexual partners did not know HIV status of their online sexual partners (Zou Huachun, 2008:10). The study indicate that online dating also contributes to the increase of HIV/AIDS infection in such a way that people start sexual relationships with people whom they met from online social media platforms without knowing their health status and that contributes extensively to the rise of HIV infection especially on meeting someone online and dating with such people without communicating about sexual health prior engaging into relationships with those people.

2.2.2 The use of Facebook for HIV prevention and treatment

Facebook is a social media platform that facilitates communication and exchange of information between people and organizations (Mangold & Faulds, 2009, p.357). It is the social

media platform that enables people to share and exchange information and it also allows organisations to exchange information with the general public (Adamson, 2012:4). Facebook encourage interaction and people are using these platforms to share different information (Boyd & Ellison, 2008:3). Although Facebook is important to exchange information between people and organisations, it has some challenges regarding safety and security of people (Boyd & Ellison, 2008:3). These challenges including, but not limited to the unpermitted disclosure of one's private information that can harm one's identity, rapid spread of rumours about someone that would damage the image of other people, hacking or illegal use of login details by other people to gain access to one's personal account in order to insult or send inappropriate messages to others and other challenges such as cyberbullying or online abuse (boyd & Ellison, 2008:84). Facebook is also regarded as important communication platform used to communicate information on HIV prevention (Gabarron & Wynn 2016:19).

HIV prevention and treatment are important in reducing the load of virus, increase the wellness of people and curb the further spread of the virus to other people (Chesney, 2006; Cohen et al., 2011). The outbreak of HIV in South Africa and around the world prompted government to raise awareness by using available communication methods and traditional media was the only available communication channels to disseminate information to people (Noar, 2006:399). These mediums of communication were used to "increase personal risk perception and awareness" (Agha, 2003:226). These mediums of communication were also used to address challenges around people's attitude, behaviour and beliefs towards HIV and were also used to educate the public about stigma and its effects on HIV prevention and treatment (Badiani, et al, 1997:234). "HIV and AIDS media strategies utilized an integrated communication approach as information dissemination was not limited to the uses of traditional media, but also incorporated new media technologies to raise more public awareness" (Obono, 2011:12). Social media platform such as Facebook was recommended as an additional communication platform to be used along with the use traditional communication channels because these platforms are regarded as easy and cost effective (Ko et al., 2013). Due to costs and quickest ways of disseminating information to the public, social media such as Facebook has become effective to communicate information on HIV prevention and testing" (Smith et al, 2011:72).

Today social media platforms are regarded as common communication platforms used by many people and has been recommended as effective platforms to supplement traditional media in raising awareness to prevent and control the spread of the virus (Young & Rice, 2011). Social media such as Facebook has been adopted into the study not only to raise awareness about the

virus, but also to give out information about treatment and medication (Blackstock *et al.*, 2015:57). "Internet-based primary prevention interventions demonstrated effective use of social media interventions to support safe sex, HIV testing, and social support outcomes among to the infected people" (Muessig *et al.*, 2015:250). Safer sex practice is important to prevent HIV and AIDS and other sexual transmitted infections that can affect people as a result of unprotected sexual practice (WHO, 2004). As Facebook became effective for HIV communication, but HIV positive people are concerned about their privacy which is based on the fear about the protection of their HIV status on this platform (Kelly, 2004). To control and prevent the spread of the virus, various HIV information that could benefit both infected and uninfected people was made available on this platform and that information incorporates the use of various prevention strategies such as condom, pre-exposure prophylaxis (PrEP), voluntary counselling and testing, medical male circumcision and abstinence programs (Muessig *et al.*2015:250). Information on treatment and its use has also been made available on these social media platforms (Muessig *et al.*2015:250).

The study that was conducted in Canada exploring the use of online social networking indicated that 76% of people using social media especial people who are owning mobile devises have been responding well to Antiretroviral treatment (ART) (Horvath *et al.*, 2012). They were accessing to HIV treatment shared by health institutions and shared by people using their mobile devices, however only people who were owning mobile devices who benefited mostly in such services.

Testing and treatment become important in controlling the spread of the virus whereby infected people are treated immediately and strong measures are put in place to prevent the spread of virus to uninfected people (Chesney, 2006; Cohen *et al.*, 2011). HIV positive people have also been utilizing this platform to provide care and support each other and also advise each other about the use and access to treatment (Muessig *et al.*, 2015; Taggart *et al.*, 2015:258). Other internet-based communication such as the use of mobile devises became effective platforms for the delivery of HIV information. This platform encourages people to use medication and also make them aware of risks and side effects associated to the use of a particular HIV medication (Levine *et al.*, 2011).

Other countries are also using social media to support people living with HIV. For example, China is one of the countries that has established and created a social media community called "HIV/AIDS Weibo group" to provide support and aftercare to all people living with HIV/AIDS

that they were treated well and accepted within their communities (Chen & Shi, 2015). In addition, HIV positive people have also been using this HIV Weibo group to emotionally support each other so that they can be strong and live a healthy life through the support they got from each other (Chen & Shi, 2015). Facebook is also used by health organisations to invite public participation into HIV/AIDS education so that health professionals and the public can discuss about health-related issues that are facing people living with HIV and AIDS so that they can come up with sustainable solutions for any health-related challenges be facing by HIV positive if there can be any challenges (Young & Jaganath, 2013:3). Studies argue that people who use Facebook for sexual related purposes, among other things to meet many sexual partners online could increase high risks of HIV infections (Moreno & Kolb, 2012:10).

2.3 An analysis of ways in which HIV testing messages posted by AIDS Foundation of South Africa on Facebook reflect the national Department of Health prevention and testing messages

Health institutions are also using Facebook to communicate with the public about health-related matters. Some health institutions adopted Facebook due to low costs and easy method that can be used to communicate with the general public on issues of health (Flaherty & Walden, 2015). Health institutions as the key institutions operating on the health sector were also using this platform to raise awareness about health issues, health advice and medication (Morah & Ihalainen, 2009:112). Various health promotion specialists are also using and regarding new media technology as effective platform for behavioural change and health advice and some health institutions have already started using Facebook to engage public on different health matters (Mangunkusumo *et al.*, 2007; Fotheringham *et al.*, 2000).

2.3.1 The use of social media by health organisations to promote HIV testing and prevention

During the outbreak of Ebola disease in 2014 in West Africa, social media was a primary source of information used by various health institutions and health personnel to disseminate information and update the public about the disease and measures that can be taken to prevent the disease (Flaherty & Walden, 2015). However, issues of trust and accuracy of information has been always remaining to be the major concern to many people who are using social media to access health information (Boulos & Wheeler, 2007). As Kelly argued that unreliable information spread very quickly on social media as people keep sharing it until it reaches many people within a short period of time (Kelly, 2013). Lee (2008) argued that the use of new media

technology for health information encourages online users to constantly visit health institutions for medical attention as new information on various health issues is always posted by people or organisations on a regular basis.

2.3.2 The importance of HIV testing and prevention

South African government in collaboration with health sectors have been making extensive efforts to get many people tested for HIV/AIDS in order to achieve UNAIDS 2030 target of ensuring that many people get tested for HIV (Perez *et al.*, 2016:103). However, some study indicated that there is still many South Africans who had never participated to HIV testing and who are still not aware about their HIV status and that increases the risk of HIV infection and transmission of the virus to other people (Shisana *et al.*, 2005). "HIV testing is based on maintaining awareness of one's HIV status through regular HIV testing and is considered to be an important entry point to a comprehensive package of care for HIV and AIDS prevention and treatment" (NDoH, 2010:4). A certain researcher shared the same sentiment that voluntary counselling and testing is the cornerstone for HIV prevention and treatment (Mabunda, 2004).

People have been encouraged to test HIV/AIDS to the health facilities of their choice so that they become aware of their health status (WHO, 2013:13). Having knowledge about HIV status helps to protect and prevents the further transmission of the virus to other people in such a way that people who tested HIV positive would begin to use treatment and become sexual responsible and those who tested negative would maintain their negative status through abstinence or keep effectively using condom and other measures such as PrEP (WHO, 2016). The process of HIV testing is determined by individual's willingness to undertake testing (Fako, 2006).

Test results are associated with the extensive use of condom and other prevention measures for safer sexual engagement (UNAIDS, 2006:840). The study that was conducted in Africa about the importance of undergoing HIV testing indicated that HIV testing plays an important role to the extensive use of condom and knowing of HIV status encourages people to use condom for safer sex practice (Coates *et al*, 2000:456). Studies argue that there is high rate of HIV testing uptake amongst people who are engaging in reckless sexual behaviour because they tend to be eager of what their test results would be in order for them to decide about their sexual lifestyle (Knussen, *et al*, 2004; Maman *et al*, 2001:220). However, researchers were based on the idea that reckless sexual behaviour that involves unprotected sexual intercourse is greatly associated

with fear of participating to HIV testing (Fylkesnes *et al* 1999:220). Studies further reiterate that people who are engaging in high sexual risk behaviours are always afraid to undergo HIV testing because they tend to have a fear of test results (Barcla, 2007; Ehrlich *et al*, 2007; Elam *et al.*, 2009; Philipson & Posner, 1995: 220). However, some few researchers argued that knowledge about HIV test results encourages responsible behaviour and extensive use of HIV prevention methods to prevent the further spread of the virus (De Cock *et al*, 2003:229).

People who tested positive are given care and support by given antiretroviral treatment (ART) which is the medication used by HIV positive people to keep their immune system strong from the virus (Bajunirwe et al., 2009). Various studies argue that although HIV testing is important for HIV prevention and treatment, there are some barriers that prevent people to test HIV/AIDS which are: fear on how society, relatives, friends and other close people would react once one has tested positive (Irungu et al., 2008; Subramanian et al., 2008:4). A study that was conducted at Sub-Saharan region in 2007 and 2009 exploring the percentage of people going for HIV testing indicated that only 40% of people who knew their status and the majority did not know their status due to the fear of test results and fear of how their society would react once they were found positive (WHO et al, 2010). Similar study was conducted in some black townships in Cape Town exploring the testing attitude of people residing in those townships, the researcher found that 53% of the population living in those townships had never undergone HIV testing (Kalichman & Simbayi, 2003:444). This indicate that in few years ago many people have been reluctant to participate to HIV testing due to the variety of reasons and some of these reasons can be the lack of knowledge about HIV testing and the fear about the outcomes of test results and that could result to the alarming increase of HIV infection and related deaths in the sub-Saharan region.

Tailor et al. (2007:33) emphasised that people who regularly test for HIV/AIDS become sexually responsible to their sexual partners by having one sexual partner, they also use protection constantly during sexual intercourse and also take full responsibility to ensure that their sexual partners regularly test HIV/AIDS. Other people believe that HIV testing is only done by sick people, however it is important that everyone should be aware of their HIV status irrespective to the nature of their health status so that once one tested positive could be immediately taken to medication and HIV prevention measures could be tightened to negative people to prevent the spread of the virus (Moyo et al., 2008:461). Having doubts about test results and not trusting the testing machines were also among to barriers that prevent people

from HIV testing (Rassjo *et al.* 2007:218; Larsson *et al.* 2010:6). Health Systems barriers such as testing hours that were not convenient to other people, location of HIV testing centres was inconveniencing other people to do testing, and costs associated to HIV testing were also preventing people from HIV testing (Morin *et al.* 2006:221:88). HIV/AIDS testing process was evolved in such a way that government and other health sectors made testing fashionable and accessible to many people by introducing different ways of HIV testing and the addition of various testing facilities.

To upscale HIV testing, the Joint United Nations Programme on HIV/AIDS (UNAIDS) created and developed HIV testing strategy called Provider-Initiated HIV testing and Counselling (PITC) in order to ensure that many people get tested. PITC among other things suggested that sick people should be tested for HIV before they were diagnosed for whatever illnesses they had (WHO, UNAIDS, 2007:15). According to South African Department of Health PITC introduction was based on two primary goals which were "the reduction of new infections by 50% and the reduction of the impact of HIV/AIDS by expanding access to comprehensive treatment, care and support to 80% for infected individuals by 2011" (DoHSA, 2007:10). The Provider-Initiated HIV testing and Counselling (PITC) was effective in ensuring that many people tested for HIV/AIDS and many people accessed health care facilities for treatment (DoHSA, 2007). To achieve PITC objectives, HIV counselling and testing services were increased to more than 4500 in public health facilities, mobile and non-medical services were also increased (NDoH, 2007:8). For example, the study that was conducted in 2008 in two Ugandan hospitals after the recommendation of PITC around the globe show that 98% patients were tested HIV/AIDS and only 28% patients who had never participated to HIV testing (Wanyenze et al. 2008:304).

The NDoH further recommended new convenient ways that seek to encourage many people to go for HIV testing, by moving clinics to the communities where many people would access HIV testing (DoH, 2017). There was an introduction of HIV home based self-screening test kits which has been regarded as the easiest way to get many people tested for HIV, people test themselves and know their test results (WHO, 2016:103). Home based HIV self-testing is regarded as convenient and effective way of HIV testing as it guarantees privacy and confidentiality for one's test results (Chanda *et al.*, 2017). Globally HIV self-testing was embraced and accepted by many countries as effective method of testing. From 2002 to 2017 the use of HIV self-testing from sub-Saharan region increased from 22% to 94% (Harichund

& Moshabela, 2017). It also allowed people to do their own testing at any place of their choice as it guarantees immediate test results (Pai *et al.*, 2013). Home based self-testing is cheaper and accessible than other forms of testing (Linas, 2015:10). WHO encourages people to retest in order to validate test results before they undergo treatment if one has tested positive (WHO, 2015). "Those who self-test is encouraged to access additional testing for confirming of HIV results and post-test counselling" (Pant Pai *et al.* 2013:9). Home based HIV testing is important in a way that only family members who can know and have access to one's test results (WHO, 2012a:189).

2.3.3 The use of Pre-Exposure Prophylaxis (PrEP) for HIV prevention

Pre-exposure prophylaxis was approved and adopted by many African countries including South Africa as one of the HIV prevention strategy (Bekker et al., 2016). WHO in its HIV prevention guidelines suggested the extensive use of PrEP, especially by people who are highly exposed and susceptible to HIV infection (WHO, 2015). This practice has been used along with other HIV prevention strategies. Pre-exposure prophylaxis is the antiretroviral treatment (ARV's) created to be used by people with high risk of HIV infection (WHO, 2016). This HIV prevention practice has been used in support of condom use and people who are reluctant or not interested to use condom are strongly encouraged to use PrEP to prevent contracting of HIV/AIDS (Youle & Wainberg, 2003:102-103). PrEP was made available to anyone who is vulnerable to HIV infection and the South African national department of health in its HIV prevention efforts also made oral pre-exposure prophylaxis available to "sex workers who are at risk of HIV infection" (DoH, 2016:93). Studies argue that PrEP is not an easily accessible medication, only health care workers who have a right to distribute PrEP to HIV risk people and are regarded as "gatekeepers" of the treatment (CDC, 2018b; Przybyla et al., 2019). Other researchers have a different view on the use of PrEP for HIV prevention, by claiming that PrEP usage brings more sexual risks to people including but not limited to the increase of other sexual transmitted diseases (Scott & Klausner, 2016).

People who are using PrEP are encouraged to do constant and regular clinical monitoring (Paxton *et al*, 2007:91). The essence of doing regular clinical monitoring is that PrEP usage is associated to some side effects to other people (Paxton *et al*, 2007:91). Lack of trusting the medication and costs associated to purchasing the treatment are regarded as some of the challenges that prevent other people from accessing this medication (Yi *et al.*, 2017:115). In

addition, some PrEP users sometimes become shy to discuss sexual related issues with healthcare workers prior accessing the medication and that also becomes a barrier in accessing PrEP (Calabrese *et al.*, 2016; Mayer *et al.*, 2018; Schwartz & Grimm, 2019, St.Vil *et al.*, 2019). The extensive usage of PrEP in other countries such as New South Wales, Australia resulted to the decrease of annual HIV infection by 25% among men who have sex with men (MSM) (Grulich *et al.*, 2018:63).

Several studies argue that Truvada and tenofovir are effective HIV medications that could be used by negative people to prevent HIV infection (Abdool Karim *et al.*, 2010; Baeten *et al.*, 2012; Cohen *et al.*, 2011; Grant *et al.*, 2010; McCormack *et al.*, 2016; Molina *et al.*, 2015; Thigpen *et al.*, 2012:734). Microbicides are also regarded as effective in preventing the infection, however its use and its effectiveness in controlling the virus need to be verified and explored (Kelly *et al.*, 2015; Kippax, 2012; MacQueen *et al.*, 2014:734). A study conducted about PrEP usage in United States indicated that forgetting the pill, lack of information about PrEP are also barriers in using the medication (Biello *et al.*, 2017:633; Adams *et al.*, 2018; Collier *et al.*, 2017). The lack of effective communication about PrEP and its use are also regarded as challenges of using PrEP because this can cause health risks to people in such a way that other people can fail to use the medication properly, then it ended up causing some problems in their health (Caceres *et al.*, 2015:2).

The study that was conducted in Ghana in 2010 exploring the use of PrEP as an alternative to condom usage indicated that most people prefer to use condom and PrEP concurrently claiming that PrEP only prevents HIV infection, not other sexual transmitted diseases, then it becomes useless to prevent HIV and leave out other sexual transmitted diseases which are also a huge problem to one's sexual life (Golub *et al* 2010; Holt *et al.*, 2012:333). Stigmatization, substance abuse, critics by friends and by other health care professionals due to the age of some PrEP users are also regarded as barriers in using PrEP (Cahill *et al.* 2017; Golub 2018:2). The use of PrEP is also associated with other health problems such as diarrhoea, nausea, headache, and fatigue which makes other people reluctant to collect the medication (Benn *et al.*, 2011). Pre-Exposure Prophylaxis makes people sexually irresponsible as they begin to develop lack of fear for HIV and other sexual transmitted infections (Koester *et al.*, 2014).

2.3.4 Voluntary Medical Male Circumcision to prevent HIV infection

The encouragement of voluntary medical male circumcision in South Africa is associated with the strategic intervention by the World Health Organisation and the Joint United Nations programme on HIV/AIDS to encourage people to participate in medical male circumcision as an HIV prevention strategy. World Health Organisation in collaboration with the Joint United Nations Programme on HIV/AIDS (UNAIDS) encouraged this practice in 14 countries with the highest rate of HIV infections and with the lowest rate of medical male circumcision (WHO, 2012). "The intervention was launched in the wake of evidence from three large randomised-controlled trials (RCTs) involving over 11,000 participants, which suggested the procedure may reduce female-to-male transmission of HIV by up to 60%" (Auvert *et al.*, 2005; Bailey *et al.*, 2007; Gray *et al.*, 2007). Some of the countries that prompted UNAIDS to encourage the extensive use of VMMC are Zambia, Swaziland, Rwanda, Tanzania, Namibia, Lesotho, Botswana etc. (WHO, 2016).

The practice as an effective and proven method for HIV prevention has been extended to other countries around the world (WHO, 2012). Medical male circumcision is regarded as a "simple surgical procedure done to remove the foreskin on a penis in a clinical set up by professional nurses and doctors" (Moses et al, 1998:226). However, Lundsby et al., (2012: 694) argued that there is still a knowledge gap in understanding the effectiveness of VMMC as one of the HIV prevention method in sub-Saharan region Lack of knowledge about VMMC in other countries and costs associated to transport from villages to medical health facilities have been regarded as barriers preventing young boys in participating to VMMC (Westercamp & Bailey, 2007; Auvert et al., 2005). This initiative has been adopted by South African government which form part of government strategic plan to reduce the spread of the virus (MMC Infor, 2015:277). Some South African studies exploring the effectiveness of VMMC as HIV prevention strategy confirmed that VMMC has been an effective method for HIV prevention and has reduced HIV infection by 65% of circumcised men compared to the uncircumcised men (Auvert et al., 2011:1574). However, studies argue that people who are engaging into unprotected sexual intercourse have equal chances of getting HIV/AIDS and other sexual transmitted diseases (WHO, 2007:284).

2.3.5 Abstinence, be faithful and condomise programs (ABC) for HIV prevention

Majority of people especial young people are engaging into an unprotected sexual intercourse and they lack knowledge about the diseases associated with unprotected sexual intercourse (Westwood & Mullan, 2006:213). Abstain be faithful and condomise programme is another practice that can be used to prevent the spread of HIV and AIDS. ABC programs encourage people to abstain, be faithful to their sexual partners and also encourage people to use condom all the time during sexual practice (Hardee *et al.* 2008:765). This practice reduces the spread of HIV and AIDS, sexual transmitted diseases and unplanned pregnancy (Kantor *et al.* 2008:81). It encourages wellness and promotion of sexual health information by "emphasizing partner communication, condom negotiation, problem solving, refusal skills, and resistance to peer pressure" (Hansen, 1996:161). ABC programs promote openness and transparency between sexual partners and encourage sexual partners to consider other things that could contribute towards a healthy relationship.

Other cultures are encouraging "virginity testing to promote abstinence" (George, 2008; Taylor et al, 2007:82). Having one sexual partner is regarded as effective HIV prevention strategy (Vessey, 1999:213). In promoting of ABC programs communication is regarded as effective method in creating a healthy relationship between sexual partners as it encourages them to "negotiate safe sex behaviour such as the use of condom" (Catania et al.,1992:214). However young South African women have different perceptions in negotiating the use of condom with their male sexual partners. Studies argue that some South African women believe that negotiating of condom use with their male counterparts is the symbol of disrespecting and being unfaithful to their male partners (Rickert, et al, 2002). In addition, WHO argued that female partners do not negotiate condom use with their male counterparts due to the fear of how their male partners would react (WHO, 2014:15). The perception that condom use disturbs sexual pleasure, lack of accessing condoms, shortage of knowledge about condom also impedes people from using condom (WHO, 2014:15).

One of the guidelines of UTT policy was to strengthen medical male circumcision as part of HIV prevention method especially to provinces with high HIV infection and limited uptake of MMC. Abstain, be faithful and condomise (ABC) programmes also form part of UTT policy and the policy guidelines also recommended the strengthening of ABC initiatives by emphasizing of one partner in a sexual relationship and the extensive use of condoms to prevent

the virus. These methods were encouraged in order to prevent the further transmission of the virus to other people.

2.4 The importance of Universal Testing and Treat (UTT) policy for HIV prevention HIV/AIDS in South Africa and around the globe remained very high (Beyrer, *et al.*, 2012; Prejean *et al.*, 2011; UNAIDS, 2013b). The introduction of antiretroviral treatment, pre-exposure prophylaxis (PrEP) and condom use became important in reducing the scourge of the virus (WHO, 2015). The recent guidelines by World Health Organisation "highlighted the need to strengthen HIV programs so that all key populations benefit from the advances in HIV prevention and treatment" (Hirnschall, *et al*, 2014). The UTT policy aims to benefit both HIV positive and negative people in order to prevent the further spread of the virus (WHO, 2014). These guidelines include early identification of the virus and the uptake of treatment in order to boost one's immune system and prevent the spread of HIV infections (Cohen *et al.*, 2011; Gardner *et al.*, 2011:103).

The UTT policy was initiated by World Health Organization in collaboration with the Department of health in 2015 around the world and it was effective in South Africa in 2016 to support the UNAIDS efforts of reducing HIV infection (WHO, 2016). UTT policy was introduced to support the UNAIDS target of ensuring that by 2020 90% of HIV positive people know their HIV status, 90% of people knowing their status are receiving sustained Antiretroviral treatment and 90% of people receiving treatment are viral suppressed (WHO, 2016). Amongst other things, the policy involves "voluntary counselling and testing, education and immediate linkage to care and antiretroviral therapy in a bid reduce the spread of the virus" (WHO, 2016). As part of controlling the spread of the virus, medication plays an important role to HIV positive people to remain strong from the virus (Cohen, *et al*, 2012).

HIV positive people were assessed their readiness to start using medication and Antiretroviral treatment was made available to all people living with HIV/AIDS regardless of their CD4 count and the treatment was made available immediately to people who tested positive under the process called same day initiation (SDI) (UNAIDS ,2016). The Ongoing counselling about the significance of starting using medication and the continuous check-ups of CD4 count to HIV positive was also considered during the introduction of the policy. Antiretroviral treatment such as Tenofovir disoproxil fumarate plus lamivudine (TDF/3TC) and Dolutegravir (DTG) were

recommended by the national department of health as the most effective HIV treatment to be used by all age group including pregnant women (DoH, 2016). Patients who were diagnosed for both TB and HIV were advised to start using treatment for TB, then at a later stage to start using Antiretroviral treatment for HIV (UNAIDS, 2016). TB patients that are HIV positive with CD4 cells >50 cells, are continually advised to start using HIV treatment within 2 weeks after they have already started treatment for TB, so that TB treatment would adapt first in their bodies before they begin using treatment for HIV (WHO, 2016). In the case of the people suffering from TB meningitis, they were advised to start antiretroviral treatment for HIV after a period of 4 to 6 weeks (WHO, 2017).

The challenge facing people living with HIV/AIDS regarding treatment is that some people do not collect treatment for their own reasons and others forget the treatment, other people use treatment with alcohol which would make medication ineffective and other people had a fear of public reaction when they collecting the treatment (Medley *et al.*, 2013; Naik *et al.*, 2015). The study that was conducted in Botswana in 2003 indicated that hunger was one of the challenges prevented HIV positive people from using and accessing Antiretroviral treatment especially those who were new from the treatment, as indicated above HIV treatment has some side effects, hunger is one of the side effects in HIV treatment as it always causes people to become hungry especially HIV patients who were new from the treatment (Weiser *et al* 2003). This means that people who are new from ARV's have to be told about all side effects about the treatment and to be also made aware of how long these side effects would last before the treatment is getting used to their bodies, so that they become aware of what will happen when they started using the treatment.

A study that was conducted in Africa to explore the effectiveness of UTT policy suggested that people with undetectable viral load were having more chances to sustain their health and they can live more years than people with detectable viral load (Thirumurthy *et al.*, 2016:4-5). The study that was conducted to check the use of UTT policy argued that if the policy is not properly implemented can lead to the failure of the policy in meeting its objectives of reducing the virus (Iwuji *et al.*, 2015). This failure can be evident by the limited uptake of HIV testing, poor linkage to health facilities for treatment and medical check-ups and the delays in taking antiretroviral treatment (Fox *et al.*, 2014:40). This study seeks to analyse how AFSA utilizes social media/Facebook for HIV prevention communication and testing following the release of

UTT policy and ways in which AFSA messages reflect the NDoH prevention and testing messages.

These HIV prevention methods which are: the encouragement of the extensive use of ARV's, condom usage, voluntary medical male circumcision, Abstinence programmes, the recommendation of pre-exposure prophylaxis and the declaration of UTT policy with its own guidelines. These initiatives were recommended to be strengthened in 2016 following the release of Universal Test and Treat policy and one of the guidelines for the policy is to encourage people to get tested for HIV/AIDS and to ensure an immediate access to medication for people who tested HIV positive. The policy in support of the UNAIDS, there was a target imposed to ensure speedily reduction of HIV/AIDS by 2020. The UNAIDS target was to ensure that 90% people should know their HIV status, 90% of HIV positive people should access a sustained Antiretroviral treatment and 90% of people who are receiving treatment should be viral suppressed (WHO, 2016). These HIV prevention methods were also recommended into the policy in order to reduce the spread of the virus in such a way that all HIV positive and HIV negative people should contribute in reducing the spread of the virus. This was done by imposing more methods to prevent the spread of the virus from both HIV positive and HIV negative people.

2.5 Conclusion

This chapter reviewed the literature for the study. It gave understanding on various communication methods used to communicate information on different health issues including but not limited to the use of social media platforms for health communication and on HIV prevention and testing, the use of social media by health organisations to promote HIV testing and prevention. It also gave an understanding about the importance of other HIV prevention methods used to prevent the spread of the virus including but not limited to condom usage, the use of pre-exposure prophylaxis etc. Based on the reviewed literature, the researcher hope that this chapter provided an in-depth knowledge and understanding about the importance and the effectiveness of social media platforms in disseminating information on health-related issues, particularly the use and the effectiveness of social media in communicating information on HIV testing and prevention. The next chapter discusses the theoretical framework used and adopted in this study.

CHAPTER THREE

THEORETICAL FRAMEWORK

3.1 Introduction

This chapter discusses the theoretical framework used in the study to understand prevention messages posted by AIDS Foundation on Facebook to promote HIV testing and prevention and how these messages reflect the national Department of Health prevention and testing messages. The social media health interaction theory was adopted for the study. The theory was developed by Dennis Glen and Jennifer Ramos (2017). The social media interaction theory also used and discussed some key components which are: the use of social media to access and gain information, the creation of virtual communities where interation occurs, people who engage in social media are seeking health related information, social media promotes wellness of people, interaction and access to health information has changed over a period of time and successful interaction leads to active participation (Ramos, 2017). These components were chosen to give clarity and broader understanding about the use and the effectiveness of social media in disseminating information on health-related matters. This chapter would also help to understand how AFSA as one of the key health organisations in South Africa used social media to further promoted HIV testing and prevention following the release of UTT policy in 2016 and also how AFSA's messages reflect the national Department of Health (NDoH) prevention and testing messages.

3.2 Theory

According to Sekaran and Bougie (2010), a theory is a set of interconnected ideas, definitions, and suggestions that present a methodical view of the phenomenon by stipulating relations between variables with the purpose of explaining and predicting a phenomenon. A framework is a set of ideas that people use when they are forming their judgments (Sekaran & Bougie, 2010). Researchers are guided by a theoretical framework in order to ask proper research questions, furthermore, theories help researchers to make projections. Similarly, a framework helps researchers by providing a structure that shows how variables of an explained phenomenon are related (Sekaran & Bougie, 2010).

3.2.1 Social media health interaction theory

Social media health interaction theory was established to explain on how social media can be used to communicate information around issues of health and how people respond to health-

related information posted on social media (Meleis, 2017: 29). The theory of social media interaction helps to show the use and the effectiveness of social media platform such as Facebook in responding to a variety of health-related matters from prevention to treatment. People are responding differently to those health messages communicated to them by people and health organisations through the use of social media such as Facebook (Meleis, 2017: 29). The social media interaction theory was introduced by Dennis Glen and Jennifer Ramos R.N in 2017 and the purpose of the theory is to explain the dynamics of using social media platforms for health communication (Meleis, 2017). Social media health interaction was developed to also explore the use and effectiveness of social media in communicating health information (Gay and Weaver, 2011). It was developed to give understanding on the use of social media or Facebook in responding to health-related issues both positive and negative (Meleis, 2017). The effective usage of this theory "can help people to understand the role of Facebook in disseminating of health information and influence personal health agendas and behaviours" (Meleis, 2017:61). The main aim of the study is to analyse HIV prevention messages communicated through on Facebook by AIDS Foundation of South Africa. Then social media health interaction theory became effective into the study as it was developed to give understanding on the use and effectiveness of social media such as Facebook in communicating of health issues and HIV/AIDS information. Theory of social media health interaction also offered a theory-based approach to explore the use of social media for health-related matters (Gay & Weaver, 2011:60). "Social media and the Internet have fundamentally transformed not only the way people communicate and interact, but also the way people comprehend and make decisions on the content published on social media" (Hawn, 2017:60). Internet and social media have created the free access and the free flow of information from one person to the other, as people access information anytime and anywhere (Bosslet et al., 2011).

Social media has been defined as internet-based communication that promotes and encourage the exchange of information between people (Social Networking Fact Sheet, 2015). Facebook is also one of the most important and popular communication platforms that also helps to encourage interaction between people (Daniel 2008). Facebook is also regarded as the world leading social media platform with over 2.38 billion of active users in December 2019 (Zuckerberg M. 2010). Facebook facilitate online communication between users, enables people to communicate with their friends, families, teachers and organisations (Boyd & Ellison, 2007). People use Facebook to share both written and visual content with others online, comment, like and share information posted by others online (Boyd & Ellison, 2008:84).

Facebook is also regarded as communication platform used by various health organisations to communicate information on different health issues (Fox, 2011:1). The theory of social media interaction helps to give understanding on how social media such as Facebook could be used to transfer information on issues of health and illness and also helps to change the way in which people receive and interpret information about health (Gay & Weaver, 2011:60). Key stakeholders of health communication are health care workers, health professionals, researchers and the patients who are regarded as recipients of health-related information (Demiris, 2006). However, the issues of trust, privacy and credibility of health-related information on Facebook is always in question as information posted on this platform is not always tested and verified by health care workers and professionals (Demiris, 2006).

Social media interaction has been used to make South Africans to have a broader understanding about the importance of using social media such as Facebook in communicating of health information. The theory of social media interaction is effective and relevant to the study because it explores how social media/Facebook can be used to disseminate health-related messages to people by exploring the benefits and challenges of Facebook in communicating of health information (Eysenbach, *et al*, 2004). The use and applicability of Facebook for health information also forms integral part in promoting access to HIV prevention messages and various health institutions use this platform to promote HIV testing and prevention (Mairs, *et al*, 2013:64).

The key aspects of this theory are around the issues of health promotion, health communication, health challenges and the exchange of various health communication messages through the use of social media interaction (Meleis, 2017). The theory of social media interaction has six main underlying key components which are: firstly, social media is the means of accessing and gaining information, secondly, the creation of virtual communities where interaction occurs, thirdly, people who engage in social media are seeking health related information, fourthly, social media promotes wellness of people, fifth, interaction and access to health information has changed over a period of time and, sixth successful interaction leads to active participation (Meleis, 2017). The following section discuss various components of social media interaction theory and these components are used to explore the effectiveness of social media communication for health communication, particularly the use of social media technology to access information on HIV testing and prevention.

Component 1: Social media is the means of accessing and gaining information

Social media platforms affect the way people and organisations communicate and exchange messages (Adler *et al.*, 2012). Through these communication platforms people are able to access and gain information on their everyday communication (Lipsman, 2010:348). People and organisations access and gain information on these platforms at any time and they use the information for different purposes (Boyd & Ellison, 2008:347). The proliferation and rise of social media technology were developed and enhanced social interaction between people by encouraging and facilitating the new innovative ways that are cheaper, quicker and easily accessible to many people (Livingstone & Brake, 2010). These platforms have also embraced by different institutions in the public and private sectors in their day-to-day communication to share messages to their clients, customers, patients and to different stakeholder groups (Connolly & Bannister, 2007). "People can exchange ideas, knowledge, and experience and collaborate on matters of their interest online" (Ali & Lee, 2010:51).

Social media is also used by government departments to engage and communicate with the public about service delivery through E-government. E-government "is the use of information communication technologies by government departments to exchange information with citizens, businesses and other arms of government for better service delivery" (The World Bank, 2011; Jones, 2009:52). According to the research conducted by Pew Research in 2018, exploring the effectiveness of social media for health information in the United States indicated that Facebook and Twitter were the suitable communication platforms for health information when the study was conducted (West & Turner, 2007:63). These platforms enabled the exchange of information on health issues between health organisations and patients in the United States and these platforms also allowed public response to the communicated message (West & Turner, 2007:63). The study that was conducted by Pew Research in the US about the effectiveness of social media was a success, in such a way that 137 million or 68% of Americans were using internet to access social media and 79% were using these platforms to access health information, with 40% of the population using these platforms to access medication (Fox, 2005:198).

However, social media platforms were also associated with some risks such as "cyberbullying, sexting and Facebook depression" (Ahn, 2011:09). Cyber bullying is based on the attack or inappropriate messages/content that one receives online which seeks to insult or intimidate another person (Ahn, 2011). Sexting refers to the process of sending sexual messages or pictures to another person and Facebook depression is referred to the psychological problem caused by spending a lot of time on social media/Facebook which would ultimately affects

one's wellness (Clarke-Pearson, 2011:09). Social media platforms are also used by people and organisations to deliver information about health-related issues (Ahn, 2011). Different health institutions use these platforms to communicate and disseminate health information to people (Mairs, *et al*, 2013:64). A study conducted in some South African hospitals in 2005 to investigate the use of new media by patients indicated that patients use social media as their primary source of health information prior visiting health care workers for health advice and assistance (Hesse & colleagues, 2005).

Systematic review of 12 studies that has been conducted to explore the experience of patients in using new media technology for health-related information, indicated that new media has "improved their knowledge, confidence, and health, and that also strengthened their relationships with health professionals" (Akesson *et al* 2007:17). However, the issues of security and trust are problems concerning many people who are using these platforms for health purposes (Acquisti & Gross, 2006:56). "The lack of basic security measures surrounding social media sites, such as secure sockets layer (SSL) login, can allow third party hackers to access one's private social media account" (Gross & Acquisti, 2005:146).

Social media is used globally for health information. Canada is amongst to countries that are using social media for health information in which 70% of its population has been using these platforms for health-related information and information about treatment (Statistics Canada 2013:2). Research that was conducted in the United States of America indicated that 72% of its population has been using new media to gain health information from prevention to medication (Fox, 2014:2). This shows that social media has been effective in gaining and accessing health related information by many people and many organisations for public consumption. In addition to security concerns associated to social media use, some study argued that most people provide their private information on these platforms which would make them vulnerable to different online problems such as online abuse and harassment (Gross & Acquisti 2005:146). It is important for social media users who normally seek health related information online to verify the authenticity of these online sources before they actually use them (Pequegnat et al. 2007:146). New media technology has also been used to communicate information on sexual related matters affecting men and women so that they can have a better understanding about sexual health issues (Suzuki & Calzo, 2004:267). Health institutions use new media to promote campaigns that seeks to educate people about sexual health and promote dialogue about HIV and AIDS which is the health challenge confronting the whole nation (Boyar et al 2011:27).

Health organisations also use social media as their primary source of information for health-related messages (Duggan *et al.*, 2015:19). This component has been applied to show that social media as the accessible communication channel to many people makes it easy for people to quickly access any information of their choice at any time, so through the use of social media people have been able to access health related information shared by health institutions for public attention. These platforms also helped to establish relationships between health institutions and patients respectively through the exchange of information and discussions on health-related matters. This component was used into the study to give understanding about the effectiveness of social media for health communication and to also consider public response on health-related messages shared by health organisations through the use of social media by exploring the use of social media platforms by AIDS Foundation of South Africa to promote HIV testing and prevention from 2016 to 2019 following the release of UTT policy and to explore how these messages reflect the NDoH prevention and testing messages.

Component 2: The creation of virtual communities where interaction occurs.

Virtual community is referred to the internet-based communication that enables people with similar interests to connect online (Kardaras, 2003). People and organisations also use social media as virtual spaces to establish relationships and to exchange ideas in those channels (Tardini *et al.* 2009:350). People in a virtual community share their thoughts, behaviour and their ideas on these platforms (Kardaras, 2003). Virtual space also helps people to "create a parallel social universe (subculture) with its own values, rituals, vocabulary and hierarchy" (Cova & Pace, 2006:229). People in virtual community have their norms and values that govern their actions as members of the community. Members of virtual community use social media to create a place to belong so that they can share their thinking, their problems and their visions to others and social media also facilitates the effectiveness of this community (de Valck *et al*, 2009; Kozinets *et al* 2012).

The study that was conducted by Iverson, Howard and Penny in 2008 in three osteopathic medical care facilities examining the effectiveness of virtual space offered by social media for health information indicated that 58% of patients effectively used social media as their channel for health information (Iverson *et al*, 2008:17). Majority of these patients indicated that new media has changed their thinking about health issues and also helped them to have a broader

understanding about health as a whole. For the success and for the achievement of its goals, virtual community depends entirely to its members who have to play different roles that benefit the community and its members (Porter *et al.*, 2011). Members of this community normally trust and help each other and ultimately work together to achieve a particular goal (Putnam, 2000; Johnston *et al.*, 2013). Various studies argue that virtual space through the use of social media has created a room and platforms for information exchange (Arguello *et al.*, 2006; O'Brien, 2011). A certain study argues that different organisations have developed virtual communities and have been using new media to encourage community members to share their thoughts, feelings and intentions so that they can help and support each other where is needed with respect of their needs and thoughts (Johnston *et al.*, 2013:130).

A study that was conducted to explore the effectiveness of virtual space for health communication found that patients as the members of the community had created a social media group which they used to chat or communicate amongst themselves as patients as well as use it to raise their health concerns to the health care workers (Institute for Healthcare Informatics, 2014:15). Patients have also been using these platforms to gain more information about their health problems and information about medication (IMS Institute for Healthcare Informatics, 2014:16). Community members are able to "access to their records and make appointments with health care workers online" (Cerrato, 2014: 650). Health care professionals have been using social media to create their community of health care workers. This community has been using virtual space offered by social media to communicate about health-related matters and find solution on these matters, this includes but not limited to the "delivery of health care services, staff or patient education, providing support, discussing health and treatment related issues and problems, sharing of health documents, consulting with health experts and ultimately sustaining relationships that are beyond face to face" (Demiris, 2006: 179).

The study that was conducted to investigate the use of social media as virtual community in the health sector indicated that health care workers have been using new media to interact with their colleagues from other institutions, to discuss various health issues, to advise each other and to engage on other issues that might affect their working environment (IMS Institute for Healthcare Informatics, 2014:16). In addition, these health care workers also use social media to share their health knowledge and experience in order to benefit other members within the community (Thackery *et al.*, 2008:131). These platforms encourage effective communication

between health care providers and the public on issues of health and to also help them to come up with measures that can be used to find solutions on different health problems (Ali 2015; Myneni, 2016). This component is used to show that social media is also used as virtual community where members within the community share their thoughts, feelings and suggestions to the community members through the use of social media. Social media as a virtual space also help community members to engage and discuss about the variety of health issues affecting them and other people and ultimately support each other in difficult moments.

Component 3: people who engage in social media are seeking health related information

Social media platforms are not only used for interaction and making relationships between people, they are also used as sources for health information (Dawes, 2010). Social media became important to many people who would like get and have access to various health issues (Powell et., al, 2011:236). People use these platforms to get information about the variety of health-related information and to get information about treatment (iCrossing, 2008:15). Other people use these platforms to gain more information about a particular illness and ways to prevent its transmission to other people (Keckley, 2010). These social media platforms were also used to raise public awareness during the outbreak of some diseases in South Africa and around the world in few years ago (Parmer et al., 2016). For example, in few years ago in the Middle East countries there was an outbreak of various diseases such as Ebola, Zika, influenza, H1N1 and Dengue fever and during the outbreak social media platforms were the primary sources of information used to raise awareness to the public and updated the public about the latest developments of such diseases (Wurz, et al 2013; Toppenberg-Pejcic et al., 2019; Ding & Zhang, 2010:2). "During the outbreak of these infectious disease, social media networking sites have functioned as firsthand information channels from which the public can obtain disease-related information and exchange it with their family, friends, and neighbours in real time" (Jang & Paek, 2019:1). During the outbreak people were adhering to various prevention and treatment messages provided by Government and different health institutions on social media (Chan et al., 2018; Lazard et al 2015).

Social media was used as the basic communication platform and many people were relying on these platforms for the new updates and latest developments about the diseases. Various studies argue that these platforms were also adopted by health departments and various health institutions to raise awareness on various health issues and to communicate information about treatment, prevention and control (Chan *et al.*, 2018; Lazard *et al* 2015).

The research that was conducted in South Africa and in other countries during the outbreak of various infectious diseases indicated that 71.5% of people have been using social media as their primary source of information for health issues (Kim & Yang, 2015:2). However, the use of social media platforms for health information has been associated with some challenges that would make people to question the effectiveness and the credibility of these channels for health information. Some studies argue that people sometimes receive false, inaccurate and irrelevant information about a particular disease and in some instances this information exaggerates the situation about a particular outbreak (Ofoghi *et al.*, 2016:2). These false claims normally cause people to panic and ultimately instil a lot of fear to the public (Song *et al* 2017:2). Another study argues that during the outbreak of Ebola, people posted false information on social media and exaggerated the situation and that created a lot of fear and panic to many people (Ofoghi *et al.*, 2016:2). Inequality in using the digital technology has also been regarded as deterrent to accessing health information to many people during the outbreak of various diseases (Haight, 2014). Social media technology has also been used to raise awareness on sexual and reproductive health issues.

These platforms have been used by many people and organisations during the outbreak of HIV and AIDS (Bull, et al. 2012). They have been used to promote HIV testing and encouraged condom use as well as raise awareness on other sexual transmitted diseases (Bull, et al. 2012; Friedman et al. 2014). Facebook has been seen as a popular social media platform used by many health institutions to raise awareness on sexual health issues and HIV prevention (Friedman, et al. 2014, Fuller & Carter, 2015). This component is used to show that social media is also used by people and health organisations for sharing and receiving health-related information. For social media health interaction, this component gives understanding that social media is used for interaction and exchange of information between people and it is also used by organisations to give out information about health and raise awareness to people on various health issues. This component was to show that social media is also effective in disseminating information on various health related matters. People were using these social media platforms to access information communicated to them by various health organisations (Kim & Yang, 2015:2).

This component shows that social media is important in disseminating information on various health issues and it was instrumental during the outbreak of different diseases in South Africa and around the globe in such a way that people were receiving regular updates and measures that were taken to prevent the spread of such diseases. AIDS Foundation of South Africa is one of the key health organisations using social media to disseminate health information to the public and this component would help to give understanding on ways people receiving health information communicated by AFSA on Facebook, particularly information on HIV testing and prevention.

Component 4: Social media promotes wellness of people

Wellness is important in ensuring that people are living good life and their lives are protected from harm or illnesses (Renger *et al.* 2000, 404). Wellness is defined as a "process of adopting patterns of behaviour that can lead to improve health and heightened life satisfaction" (Hales, 2009:4). Social media technology helps to encourage communication and interaction between people online (Choi & Shin, 2017). These platforms are also used to promote wellness and help people to access to health care services. These platforms improve one's wellness by encouraging online support that people get from their online friends to improve their wellness and help them to overcome any health-related problem they are facing (Chen & Li, 2017). Online support varies from emotional to informational support which is the "expression of care, concern, empathy and information advice" (Zhao & Basnyat, 2018:1429). Researchers argue that different health organisations and social groups also use social media to mobilize campaigns that encourage wellness and good health and to respond to various health challenges affecting them (Chou *et al.*, 2009; Johnston *et al.*, 2013:64).

Some health insurance organisations have already adopted social media platforms particularly Facebook for health purposes in order to improve people's wellness (Terry, 2011:64). They utilized these platforms to market their products, telling people about various health benefits they have and ultimately advising people about the use and effectiveness of their products (Terry, 2011:64). This component has been applied to show that social media as the useful communication platform to many people can also be used to promote wellness and welfare of people by allowing various health institutions to communicate health related information to the patients and allowing responses about the communicated message. This component has also been applied to encourage online support that help many people to get support from their online friends in order to improve their wellness.

Component 5: Interaction and access to health information has changed over a period of time.

Previously health professionals, health researchers, health care workers and traditional media platforms were regarded as primary sources of health information that were helping people to access information about various health issues (Parrott, 2004; Demiris, 2006). These traditional media channels and health care professional were effective in improving the health care service by ensuring equal access of people to health information and facilitating increased exposure to health information (Rogers & Storey, 1987; Hornik & Yanovitzky, 2003; Hoeken et al, 2009:175). Traditional media as one of the primary sources of health information in the past, it was helping people to access health information, to share information to others and to get advice on different health related problems (Chatterjee, 1999; Keating et al, 2006; Sood & Nambiar, 2006). The study that was conducted in India to examine the effectiveness of traditional media for HIV communication indicated that "people with media exposure to HIV/AIDS information were significantly more likely to discuss HIV related topics within social networks" (Chatterjee, 1999:2). However, the advent of social media platforms transformed the way people were accessing health information in such a way that these platforms alternate traditional media by social media for health messages (Olla & Tan, 2008). Social media technology changed the way people are interacting in their day-to-day communication and the way they are sharing messages (Buffardi & Campbell, 2008).

These platforms were used as additional communication platforms where people can communicate anytime, anywhere regardless of distance (Livingstone & Brake, 2010). Social media platforms also allow people to tell their stories and share their interests (Posey *et al.*, 2010:51). "Social media changed the flow of information and communications, and provide traditionally disadvantaged groups with the quickest communication channels" (De Souza, Z. & Dick, 2007:51). Social media health interaction theory would help to promote the use of social media for health communication and HIV communication. Social media has also been used as an effective platform of communication to encourage public awareness about HIV and AIDS (JAAIDS, 2005). These platforms also accelerate access to HIV information and equal access to health facilities (Scheibe *et al*, 2012). People can support or criticize health related

content posted by organisations or individuals on these platforms depending on their knowledge and interest to a particular content (Mangold *et al*, 2009:16).

This component has been used to show that the theory of social media interaction brought some changes on the ways of receiving and disseminating health information. In the past people were relying to health care professionals and health care workers to access health-related information (Hobgood *et al.*, 2002:138). Traditional media such as newspapers, television, radio etc were the only available communication channels used to communicate health messages to the general public (Neuhauser & Kreps, 2010). The proliferation of the internet has incorporated new media as one of the convenient and accessible platform of communication that would help people to access health information anytime and anywhere prior visiting health institutions for medical care (Maher *et al.*, 2014).

Components 6: Successful interaction leads to active participation

Interaction on using social media for health communication leads to active participation on health-related matters and engagement (Thackery et al., 2008). Active participation is the process of ensuring that people or organisations are participating and taking part in issues affecting them so that they can express their views and their opinions regarding a particular matter (Akerstrom & Brunnberg, 2012:703). Key to participation is the exchange of ideas and information about a particular matter and views of participants are taken into consideration (Collin, 2015). The rise of social media platforms created a room that allow users to actively participate in various issues that affect them and their living (Hawn, 2009; Orsini 2010:63). Studies argue that social media users are not only consumers of the content, but they are also producers of the content to be used, then the process of active participation comes into play when social media users are able to produce the content and not only relying on consuming it (Wirtz et al, 2011:143). Health organisations continuously using these channels for health awareness and allow the public to actively participate on these platforms by sharing their health knowledge and their own life experiences (Thackery et al., 2008). Public participation on social media use becomes important as it enables health institutions to consider public opinions when investigating or clarifying a particular health issue (Malinen, 2015). "Health organisations can also use social media to engage public in health-related issues, to create dialogue with them, and to connect them with others who share similar health concerns and interests" (Lovejoy et al, 2012:188). Neiger et al, (2013) argue that various health sectors post different health issues

online for public comments and advice about ways on how to deal with a particular health issue or how to respond to a particular health challenge to prevent/reduce its infection to other people.

The two-way communication between the public and health institutions by using social media becomes important in addressing health service delivery issues, in such a way that some health institutions use social media to deliver health related services to the public and the general public also use the same social media platforms to raise their health concerns to health institutions for consideration (Lovejoy & Saxton, 2012; Saffer *et al*, 2013:189). These social media channels are also regarded as "interactive communication tools between health professionals and the publics as they enable them to exchange information about various health issues online" (Jessen, 2008:411).

Health care workers and health professionals in their everyday communication are also using social media platforms to encourage discussions and engagements with the public on various health issues (Lovejoy et al, 2012:188). The online engagement between health care workers and patients also gives patients an opportunity to ask the effectiveness of some health information taken online, simple because there is a general concern about the accuracy and the effectiveness of some health-related information on these online sources (Metzger & Flanagin, 2011:189). The engagement and dialogue between health professionals and the general public on health issues also helps to improves health care service, in a way that "feedback from the public, in return, allows health organizations to tailor their messages to fit their audience's needs and knowledge levels" (Neiger et al, 2013:188). In that way social media becomes very important in improving the health care service as it fosters relationships and fruitful engagements between health institutions and the public which helps to improve service delivery (Thackeray et al, 2012). This component was used to show that social media platforms are also effective communication platforms that allow the exchange of health-related information between the public and health institutions in an effort to improve the health care service. This component also indicate that public participation is important when there are discussions about health-related issues in such a way that public participation enables the public to express their views, their concerns and their suggestions about a particular health problem. Involving the public on discussions about health-related issues also helps to get public views and their opinions on how are particular health problem can be prevented and treated.

3.3 Conclusion

Social media health-interaction theory is the theoretical framework adopted for the study to encourage the use of social media to disseminate information on health-related matters. This theory enabled the researcher to show the use and effectiveness of social media platforms in tackling health related issues. This chapter also discussed various components that gave understanding about the use and the importance of social media in communicating information on health-related matters. This chapter also discussed and gave in-depth knowledge and understanding about the use of social media by health organisations to raise awareness on various health issues and also gave an insight on the use of these platforms by the general public to exchange health-related information with health institution. Overall, social media health interaction theory helped to give understanding about the importance of new media technology in disseminating information on various health related issues including HIV prevention as one of the health problems. The next chapter focuses on methodology, it presents the approach used for the study and discusses the method used to collect data.

CHAPTER FOUR

RESEARCH METHODOLOGY

4.1 Introduction

The previous chapter presented the theory that has been used for the study. The current chapter focuses on the research methodology that was adopted for the study. The methodology chapter gives a clear view on how a research project was done, which methods or tools were used and how these methods assisted the researcher to get knowledge and better understand the issue being investigated (Creswell, 2009:2). The written content was collected from AFSA's and NDoH's Facebook pages and it was mainly on their programmes that promote HIV testing and prevention. The collected data was broken down into themes and categories through the use of thematic analysis. This chapter also presents research paradigm, research design that was used for the study. This chapter also highlights and gives understanding on the sampling method that was used. The instruments for data collection and analysis are outlined and applied in this chapter. Lastly this chapter discusses the ethical issues that the researcher had to consider when collecting data for the research study.

4.2 Research paradigm

A paradigm is the various set of beliefs that give direction on how a particular study can be conducted (Guba & Lincoln, 1994:26). In a research project, paradigm helps researchers to have a broader understanding about steps to be taken in conducting a particular research (Kuhn, 1970, Morgan, 2007). Researchers should use research paradigm that would help them to effectively interpret all collected data with respect of the aims and objectives of the study (Maxwell, 2009:224). "Paradigms are conceptual and practical tools that are used to solve specific research problems" (Abbott, 2004: 42). Effective paradigm helps researchers to find solution to a particular research problem. Paradigm gives an overview of how the research should be done and what set of procedures to be followed in order to achieve research objectives (Lather, 1986). It plays an important role in ensuring that suitable research questions and methodology are used and applied to a particular research (Morgan, 2007). A paradigm is

composed of four basic components which are: ontology, epistemology, methodology and axiology (Lincoln & Guba, 1985:26). Ontology is based on the assumptions that people make about something in order to understand it and make meaning to it (Scotland, 2012). Epistemology shows how reality is established and is based on the idea that people do things based on what they have seen and observed (Schwandt, 1997). Methodology is based on the use of various elements that can help researchers to structure the research project (Keeves, 1997:28). Methodology also "focuses on how people come to know the world or gain knowledge about part of it" (Moreno, 1947:28). Axiology is based on ethical issues that researchers should consider when conducting a research project (Finnis, 1980). In a nutshell paradigm is based on the use of different tools and equipment's that help researchers to give results to a particular research project (Myrdal, 1969:33).

4.2.1 Interpretivism

For this study, the researcher adopted an interpretive research paradigm to interpret the collected data. "Interpretivists aim to piece together people's words, observations and documents into a coherent picture expressed through the voices of the participants" (Trauth & Jessup, 2000:54). Interpretivists deal with the interpretation a wide array of data that emanate from different sources such as written and verbal information (Bhattacherjee, 2012:217). Interpretive researchers understand the situation and ultimately summarize it in a manner that could make sense to a given situation (Schultze & Leidner, 2002:2). The researcher used interpretivist research paradigm to interpret and give sense to the data that was collected from the NDoH's and AFSA's Facebook pages in their efforts to promote HIV testing and prevention. The public reaction to the posted content on these Facebook pages were also considered. For the purpose of the study the searcher draws on interpretivism, as the interpretivism deals with the interpretation of the wide array of collected data in order to make sense out of it, and the collected data allows to cater for a level of understanding how people make sense of their world, and in this regard the researcher can draw on social constructivism where applicable.

4.2.2 Social constructivism

The social constructivism paradigm is based on the idea that people make sense of the world through their own understanding and their experiences (Cashman *et al.*, 2008; Hein, 1991:2). Constructivist paradigm enables people to construct knowledge and give understanding based on their observation (Kim, 2005:3). Many constructivists ensure that people understand the entire research project through the meanings that people bring to them in order to make sense

to the study (Creswell, 2003:9). Some studies argue that constructivist researchers do not rely to the theory which is already available mostly, however they focus on establishing grounded theory which comes from the collected data (Lye *et al*, 2006). Social constructivists also believe that knowledge is established and constructed through human interaction (Ernest, 1999; Gredler,1997). "Individuals create meaning through their interactions with each other and with the environment they live in" (Kukla, 2000:4). People create meaning and understanding of something through knowledge they gained from other people and from other sources of information. For this study the researcher gained knowledge and understanding about the effectiveness and the use of Facebook for health communication through information provided by AIDS Foundation of South Africa and Department of Health on their Facebook pages. Meaning and understanding about the effectiveness of social media platform such as Facebook was also generated from the reaction of Facebook followers of these two organizations. Information on HIV prevention and testing messages generated from social media platforms of these two organizations would help South Africans to have a broader understanding about the use and effectiveness of Facebook.

4.3 Research approach

Research approach can be defined as plans and methods for research study that span the steps from the general assumptions to methods of data collection, analysis and interpretation. This plan includes several decisions that need to make sense to the reader, which include the entire process on the method to study a particular topic (Creswell, 2017). The researcher is collecting data from the existing sources of information (Saunders *et al.*, 2012:17; Myers, 2009:541). Methodology gives direction on how a particular research should be conducted (Grix, 2004: 32). "Methodology is the broad term used to refer to the research design, methods, approaches and procedures used in an investigation that is well planned to find out something" (Keeves, 1997:28). The methodology chapter helps the researcher to get meaning and understanding to the phenomenon under investigation (Leedy & Ormrod, 2001:14). This chapter describes the process of data collection and gives an insight on how the data would be analysed (Creswell, 2009:2).

Research methodology has two concepts that are used to measure the effectiveness and the quality of research and these are: validity and reliability (Lincoln & Guba, 1985). Validity is the process of using the right method or procedure that would help researchers to get the expected results in a particular research project (Babbie, 1998). Validity is also based on the use of effective instruments that would help researchers to come up with the relevant

information about an issue investigated (Simon & Francis, 1998:70). In qualitative content analysis "Validity depends on the nature of the texts being coded and the inferences being drawn from those texts" (Potter, 2006: 408). Reliability is based on the effectiveness of the methods used to collect and analyse data in order to achieve the objectives of the study (Riffe *et al.*, 2005). However, some researchers argue that reliability becomes ineffective when researchers have to analyse a lot of data (Riffe *et al.*, 2005). Studies maintain that the selection of a research method is guided by the purpose of the research in consideration of questions drawn for the research (Catanzaro 1988, Robson 1993, Marshall &Rossman 1995).

4.3.1 Qualitative research approach

According to Creswell and Creswell (2017), the qualitative research approach focuses on discovering and understanding meanings from individuals and groups about a certain social problem. This approach mainly focuses on how people perceive the environment around them. There are various approaches under qualitative method and most of them have a mutual aim/goal, which is to understand, explain and make sense of a social problem experienced by individuals, groups and culture (Creswell and Creswell, 2017). People's experiences, behaviours and feelings are better understood when using a qualitative approach. In addition, this approach is useful to explore change (Holloway & Galvin, 2016). When a qualitative approach is used, participants are allowed to share their experiences and points of view without the researcher being perceived as a judge. Researchers do not include any information that could be seen as changing the meaning of anything expressed by the participant.

The qualitative approach includes developing queries and measures (Rubin & Babbie, 2010). Information is normally gathered in the participant's environment; data analysis is done inductively establishing from details to common themes and the researcher constructing descriptions of the insinuation of the data. Denzin and Lincoln (2011) state that qualitative research is a positioned activity that localizes the observer in the world. It turns the world into a series of depictions, encompassing field notes, discussions, recording and memos. As a result, qualitative enquiry includes interpretative and naturalistic methods that attempt to create reasoning of, or to construe the phenomena in terms of the denotations people bring to them. However, Anderson (2010) presents both strengths and weaknesses associated with qualitative approach. Some of the strengths include:

- It produces detailed and descriptive information in order for one to understand the complexity of the issue under study.
- Interviews are open ended and the researcher is able to probe participants for more information.
- The outline and direction of the research can be quickly corrected as new information emerges.
- The data obtained from people's experiences is influential, and can evoke interest and attention than quantitative data.
- Data is usually collected from few cases, therefore, cannot be generalised to a larger population. However, findings can be transferrable to another setting.

This approach also has some limitations, despite the benefits. Qualitative researchers have been criticized for using interviews and focus groups extensively while ignoring other methods. The following are some of the weaknesses:

- It is easy for the researcher to manipulate data because qualitative data analysis is dependent on the researchers' skills.
- It is not easy to maintain, evaluate and validate the accuracy of data.
- The presence of the researcher during interviews, which cannot be avoided, may have an impact on the participants' responses.
- Due to large volumes of data, data analysis is time consuming.
- It is not easy to characterize findings visually.

Regardless of the limitations, in order to minimise challenges in this study, research questions were formulated simply and the strengths and weaknesses of this method were assessed so that they could supplement each other. This method was chosen concerning the type of data that was required to answer research questions.

4.4 Research design

Research design involves the linkage of various components of research that enable an effective flow of information from introduction to the conclusion of the research project (Saunders, Lewis & Thornhill, 2012: 7). Researchers argue that effective design depends on the type of paradigm that has been chosen for the study (Creswell, 2009:539). "A research design is the logic that links the research purpose and questions to the processes for empirical data collection, data analysis, in order to make conclusions drawn from the data" (Bloomberg *et al*

2008; Rowley *et al* 2009:539). It gives a broader understanding on what to expect out of a particular research project (Polit, 2001:19). The basic aspect of research design is to articulate data into details by explaining how the data was collected and how is it going to be analysed to give results about a particular phenomenon (Babbie: 4). It also guides researchers on how and what to include when constructing a research project (Mouton, 1996:107).

4.4.1 Exploratory

Exploratory research design was adopted for the study. It helps to give details on why and how a particular phenomenon has been investigated (Burns & Bush, 2006). Exploration in generally is based on bringing new information and ideas together to find out how something or situation happened (Glaser & Strauss, 1967). It also deals with investigating how and why something happened by involving the individual's knowledge and their understanding in order to get relevant information on what is investigated (Fetters *et al.*, 2013). The exploratory research design was chosen for the study. This research design helped the researcher to explore, investigate and to gain insight about the effectiveness of social media in promoting health messages particularly information on HIV prevention and testing by examining the social media platform of the AIDS Foundation of South Africa in their efforts of promoting health information particularly HIV testing and prevention messages on Facebook following the release of UTT policy in 2016 and the researcher also explored ways in which AFSA messages reflect the NDoH prevention and testing messages.

4.5 Population and sampling

This section focuses on the population of the study, the sample for the study and explains how a sample was selected.

4.5.1 Population

Houser (2016) defines a study population as a group of people or non-human entities such as objects, educational institutions or geographical areas who share the same characteristics that serve the purpose of the study. It is all individuals or institutions that possess certain characteristics that the researcher is looking for in order to collect data. In this study, the population refers to all social media messages from health organisations that talk about HIV/AIDS.

4.5.2 Sampling technique

A non-probability sampling was used in this study and purposive sampling was used to select all participants. It is important for researchers to know the type of sampling method to use that would help them to achieve the objectives of the study (Malhotra, 2004:12). Sampling is the process of selecting a sample from the chosen group (Osuala, 2007: 114). It is important for researchers to select the sample size that would help them to obtain a suitable data for the study (Best & Kahn, 1989:16). Researchers should select the sample size that would help them to get credible and reliable information about the issue being investigated (Graneheim & Lundman, 2004:4). Researchers must also have in-depth knowledge about the area where the research would be conducted in order to ensure that credible and reliable data has been collected to avoid sampling error (Malhotra, 2004:315). Researchers should select the effective sampling or unit of analysis that would help them to get the expected results about the issue being investigated so that reliable and relevant data can be obtained (Godambe 1982:154). Studies argue that key participants are people with broader understanding and are willing to provide their views and their perception about the issue being studied (Bernard 2002, Campbell 1955, Seidler 1974, Tremblay 1957). Before selecting the sample size, researchers should begin to explore whether the selected sample is going to help them to get the expected information (Tashakkori & Teddlie, 2003a:713).

For this study, the researcher was chosen the purposive sampling technique, which is used mostly in qualitative research study to get information to people who might have understanding of the issue investigated. "This involves identifying and selecting individuals or groups of individuals who might have an understanding of the area to be investigated" (Cresswell & Plano Clark, 2011:2). This is the non-probability method used mostly to select those participants or institutions with the key information about an issue being studied (Welman & Kruger, 1999). According to purposive sampling the sample size or unit of analysis is chosen based on the aims and the objectives of the study (Kemper et al., 2003). This method was selected with respect of the research questions to be answered for the study. Purposive sampling is also regarded as a particular kind of sampling method in which a "particular settings, persons, or events are deliberately selected for the important information they can provide that cannot be gotten as well from other choices" (Max-well, 1997: 87). People, organisations and other sources of information that have the relevant information about the matter being investigated are chosen (Patton, 1990: 169). Researchers use purposive or judgmental sampling to select a particular sample or unit of analysis with the purpose that relevant information about the investigated issue would be obtained (Maxwell, 1996). In purposive sampling the unit of analysis is selected from the entire population due to certain characteristics that associate it to the matter being investigated (Patton, 2002:83).

4.5.3 Sample

De Vos et al. (2011) define sample as a group of people or events that have been selected from the population. This study seeks to analyse AIDS Foundations Facebook page in their efforts of promoting HIV testing and prevention and also explore ways in which AIDS Foundation's messages reflect the national Department of Health (NDoH) prevention and testing messages. For this study, Facebook was purposely chosen as an effective source of information that would help the researcher to obtain information about the issue being investigated. Facebook posts for AFSA and NDoH were selected, not all the posts posted by these two organisations were selected, only written posts that are based on HIV testing and prevention following the release of UTT policy were selected. The researcher selected only written posts because these were the posts that would help the researcher to obtain rich information since these two health organisations communicated most of their HIV prevention and testing messages through by written content. The researcher purposely selected posts on HIV testing and prevention that were posted between September 2016 to December 2019. The researcher created a coding sheet to code similar categories and themes that emanated from the collected data. The coding terms that were used for this sampling method are: Freedom Day celebration. World AIDS Day celebration, educational campaigns on HIV/AIDS prevention, the HIV prevention programme, World AIDS Day celebration, the World Contraception Day celebration, World AIDS Celebration by the Department of health, know your health status, the international AIDS conference hosted by the national Department of health. World AIDS Day Celebration. The launch of new HIV treatment. NDoH hosted the 9th SA AIDS Conference at ICC Durban. The World AIDS Day celebration was used as a code and it appeared four times in this coding sheet and this day was celebrated by AIDS Foundation of South Africa to discuss various sexual health related issues such safer sex practice, the encouragement of HIV testing, the constant use of HIV treatment and the use of some HIV prevention methods such as condoms and preexposure prophylaxis to prevent HIV/AIDS. Miles & Huberman, (1994:28) argued that it is important to select the sample that would help to gain in-depth knowledge about an issue under investigation.

The researcher selected purposive sampling with the aim that Facebook posts of AFSA and NDoH would help to give in-depth information and understanding about the effectiveness of social media platforms in promoting of HIV testing and prevention. In purposive sampling "the researcher must also be aware of the possible biases on the part of the informant" (Seidler, 1974:154). In purposive sampling it is equally important for researchers to be aware that

research participants can provide unreliable information or they can obtain unreliable information about the issue being investigated. The researcher believes that the content from the AFSA's and NDoH's Facebook pages is effective and can be trusted because most of their content goes with pictures of their officials in the working field doing their work. This makes the researcher to believe that the Facebook content on these two organisations is reliable and effective.

4.5.4 Inclusion and exclusion selection criteria

Inclusion criteria is based to all the things that needs to be included into the study due to certain characteristics or features. Exclusion criteria is based to all other things that form part of the study but they could not help the study to achieve its expected results due to their characteristics and that also need to be excluded (Kabeer, 2006:20). For this study inclusion selection criteria are: posts that were posted by AFSA and NDoH on their Facebook pages on HIV testing and prevention. The key words/ coding words from the collected data were: Freedom Day celebration. World AIDS Day celebration, educational campaigns on HIV/AIDS prevention, the HIV prevention programme, World AIDS Day celebration, the World Contraception Day celebration, World AIDS Day celebration by the Department of health, know your health status, the International AIDS conference hosted by the national Department of health. World AIDS Day celebration. the launch of new HIV treatment. the South African AIDS conference at International Convention Centre (ICC) Durban by the NDoH. These key words were selected and further discussed to show their effectiveness to prevent the spread of HIV/AIDS and how AIDS Foundation of South Africa as one of the key health organisations in South Africa used these words to further promote HIV testing and prevention on their social media platforms between September 2016 and December 2019. Posts that were posted between September 2016 and December 2019 by these two organisations following the release of UTT policy. Public comments, only comments on HIV testing and prevention posts, likes from the Facebook followers and their shares were also considered and included. The researcher only analysed written posts from the Facebook pages of these two organisations.

Exclusion selection criteria were: All posts that were posted by AFSA and NDoH on their Facebook pages and posts that were not based on HIV testing and prevention, posts that were not posted between September 2016 and December 2019. Visual posts/content such as videos, pictures and illustrations. These posts were excluded because they were not posted between September 2016 and December 2019, other posts were not on HIV testing and prevention and other posts were videos and pictures and they would not serve the intentions of the study which

is to analyse only the written posts. AIDS Foundation of South Africa posted 11 posts and the national Department of health posted 9 posts. 58 people commented on the posts, posted by AIDS Foundation of South Africa on their Facebook page when promoting HIV testing and prevention and 27 people commented on the posts, posted by the national Department of health on their Facebook page when promoting HIV testing and prevention. 257 people shared AFSA's Facebook posts on HIV testing and prevention between September 2016 and December 2019 and 799 people shared the NDoH's Facebook posts on HIV testing and prevention during the same period. This means that the two organisations did their level best to promote HIV testing and prevention in their Facebook pages based on the number of posts posted by these two organisations between September 2016 and December 2019 against the number of people who shared and commented to the posted content.

4.6 Data collection method

Data collection is the process of collecting a wide range of information from various sources in order to get answers for a particular research problem (Starks & Trinidad, 2007). Researchers normally use the following instruments to collect information about an area being investigated "participant's observation, interviews, focus groups, documentary sources, archival records, content analysis and face to face interaction" (Mouton, 2001, Myers, 2009:540). To meet the aims and the objectives of the study, the researcher used the qualitative content analysis to collect and analyse data. Through the use of qualitative content analysis method, data was collected from the NDoH's and AFSA's Facebook pages and the collected data was based on HIV testing and prevention. 11 posts from the AIDS Foundation of South Africa were collected, analysed and grouped into categories and themes and were discussed to give meaning and understanding into the study. 9 posts from the national Department of Health that were based on HIV testing and prevention were collected, analysed and grouped into themes and categories and the details of this information will be discussed later. Qualitative content analysis involves the selection of relevant themes and categories from the data set, and it is important for researchers to consider "quotations or observations that go together, that are examples of the same underlying idea, issue, or concept" (Patton, 1987:149).

This method of data collection was adopted into the study because it was viewed as the easiest and the most convenient method to access and collect data anytime particularly given the COVID-19 restrictions imposed nationally. Qualitative content analysis has four important stages that help researchers to clearly articulate the chosen methodology and these are "data collection, coding, analysis and interpretation of coded content" (Duriau *et al.*, 2007; Holsti,

1969; Weber, 1990:7). In qualitative content analysis all visual and written content from different sources is collected and analysed in order to draw conclusion for the study (Krippendorff, 2004; Hsieh & Shannon, 2005:401). Qualitative content analysis is defined as "a research method for the subjective interpretation of the content of text data through the systematic classification process of coding and identifying themes or patterns" (Hsieh & Shannon, 2005:1278). Themes and patterns extracted from the text helped the researcher to better understand the importance and the use social media for HIV prevention and testing.

Researchers classify data to make people aware of how the data has been organised and how it is interpreted (Morse & Field 1995). In this study, the researcher is reviewing the posts relating to HIV prevention and testing posted in AFSA's Facebook page between September 2016 and December 2019 period, the researcher also aimed to explore how AFSA's posts during this period reflected the messages of the NDoH, and to achieve this the researcher also collected Facebook posts from the NDoH's Facebook page during the same time period. The meaning and understanding from the collected data are yet to be clarified during the process of analysis and interpretation (Silverman, 2011). The basic purpose of qualitative content analysis is to give understanding to a particular phenomenon being studied through collecting and analysing of a given content (Bloor & Wood, 2006:400). There are two different aspects of content analysis which are: manifest and latent content analysis (Driski & Maschi, 2016; Franzosi, 2004; Krippendorf, 2004). Manifest content analysis is used to collect and analyse visible and explicit content in a given research, while latent content analysis focuses on analysing implicit and unclear content in a particular area under investigation (Holsti, 1969). For this study, the researcher adopted manifest content analysis as the researcher collected and analysed visible textual content from AFSA's and NDoH's Facebook pages on the promotion of HIV testing and prevention posts. Qualitative content analysis in general is also used to classify verbal and non-verbal content in a given data for the purpose of selecting themes with similar meanings (Moretti et al., 2011). Text with similar meanings were collected and grouped into themes and analysed. However, some studies argue that qualitative content analysis can mislead researchers as it is difficult to organise and navigate themes and patterns if the researcher creates more codes during the process of analysis and that would affect the results of the study (Glaser, 1978:113). Another shortfall of qualitative content analysis is that researchers can miss the context for the study because it is difficult to assess the effectiveness and authenticity of the posted content (Morgan, 1993:401). Qualitative content analysis also focuses on "examining who says what, to whom, and with what effects" (Bloor & Wood, 2006:400).

For this study, the researcher collected and analysed the content posted on AFSA's Facebook page on HIV prevention and testing as well as the reactions and responses of the people's messages; their comments, likes and shares were analysed and ways in which AFSA messages reflected the national Department of Health prevention and testing messages. Qualitative content analysis has two different methods for collecting and analysing of data which are: inductive and deductive analysis and these two are used depending on the aims and objectives of a particular research (Elo & Kyngäs, 2008). Inductive approach is used when knowledge about an area being studied is limited (Elo & Kyngäs, 2008). Deductive content analysis is used when researchers want to verify or test the effectiveness of already available data into another study (Catanzaro, 1988). Deductive content analysis may include testing of "categories, concepts, models or hypotheses" (Marshall & Rossman 1995). This study adopted inductive content analysis to collect data since the study seeks to explore the effectiveness of social media in promoting HIV testing and prevention, and according to the literature reviewed there is not much research being done in exploring social media use in promoting of universal test and treat policy.

4.7 Justification for the use of qualitative content analysis

Qualitative content analysis method allows researchers to get in-depth understanding of the matter under investigation. Through the use of content analysis, the researcher was able collect rich data on AFSA's and NDoH's social media page on the promotion of their programmes around HIV testing and prevention. Qualitative content analysis enabled the researcher to gain insight and knowledge on how one of the key South African health organisations utilized Facebook to promote Universal Testing and Treat policy and how the national Department of Health as the leading department in health issues also promotes the use of Facebook for HIV testing and prevention. This data collection method has also been used to check validity and the reliability of the collected data from a given text in order to ensure that the collected data is accurate and reliable for use (Kyngäs *et al.*, 2011). This method has also been employed to ensure that effective and credible data is collected and applied to the study (Graneheim & Lundman, 2004). "Credibility deals with the focus of the research and to the confidence on how well the data address the intended focus" (Polit & Beck, 2012:3).

4.8 Data analysis process

Data analysis is based on giving understanding by interpreting all information provided by respondents or interpreting information coming from other sources in order give understanding

to the issue being investigated (Creswell, 2009). It helps to analyse the collected data in order to make sense out of it (Adèr & Mellenbergh, 2008:15). Thematic data analysis was adopted and applied to the study. Thematic data analysis is based on the selecting, extracting and identifying themes from a given text or data (Braun & Clarke, 2006:352). The researcher used thematic analysis in order to break down all themes and subthemes that emanate from the collected data (Braun & Clarke, 2006:92). Thematic data analysis "illustrates the data in great detail and deals with diverse subjects via interpretations" (Boyatzis, 1998:40). Researchers collect raw data and give meaning to the collected data through the process of analysis and interpretation. In this study, raw data was collected through qualitative content analysis and thematic data analysis helped the researcher to extract themes and categories from the collected data.

Thematic analysis enables researchers to have a broader perspective of the matter under investigation by clarifying and making sense to a given data (Marks & Yardley, 2004). "Thematic analysis provides the opportunity to code and categorise data into themes and processed data can be displayed and classified according to its similarities and differences" (Miles & Huberman 1994:42). The collected data has been coded into themes and categories through the use of coding sheet (Driski & Maschi, 2016). Coding sheet serves as a "data management tool for organizing segments of similar or related text to assist in the interpretation, providing a clear trail of evidence for the credibility of the study" (Crabtree & Miller, 1999:6). Schutz's, (1967) argued that coding guide should be developed based on the research questions and objectives of the study. Codes from the collected data were identified and selected as the case study to understand HIV prevention and treatment efforts.

In the created coding sheet, categories and themes with similar and different meanings from the pre-defined codes that were generated from the collected data were identified and interpreted to give understanding to the stud. Open coding has been employed to the study in order to give meaning and make sense to the collected data (Glaser, 1992:39). The researcher created a coding sheet by putting together all similar categories and themes that were found from AFSA's and NDoH's Facebook pages in their efforts of promoting their programmes around HIV testing and prevention. The sequence of words with similar meanings were analysed and interpreted (Creswell 2009; Braun & Clarke 2006). The process of breaking down different categories and themes from the collected data helped the researcher to produce a broader knowledge and understanding of the phenomenon being studied (Joffe & Yardley

2004; Blacker 2009:43). According to Braun and Clarke, (2006), thematic data analysis has the following different stages that were applied into the study.

Familiarization with the collected data: It is important for researchers to participate during data collection process so that they become familiar with the entire collected data (Braun & Clarke, 2006:5). For researchers to familiarise themselves with a given data it is important for them to make some notes by writing down all important themes and subthemes coming from the data set (Braun & Clarke, 2006). To be familiar with the collected data, researchers should read the available data now and again so that they gain knowledge of what the data is all about and how the data can be used for the study (Braun & Clarke, 2006). Researchers can also use notebook that can help them to write down some notes so that they become familiar with the collected amount of data (Ritchie & Spencer, 1994:75). In this study, the researcher read the collected amount of data repeatedly in order to gain meaning and understanding of the data.

Coding: Coding is the process of reducing and minimizing huge amount of data into a small organised information that would give meaning in a particular phenomenon under investigation (Braun & Clarke, 2006). Coding sheet has been created. A code is "a symbol applied to a group of words to classify or categorize them" (Robson, 1993:385). The researcher has selected all codes that were found from AFSA's Facebook page and those that reflect the NDoH HIV prevention and testing messages and were arranged and ultimately used to give meaning that each code has for the study.

Searching for themes: A theme is defined as a significant pattern of data that gives understanding to research questions (Braun & Clarke, 2006). Searching themes is important in helping researchers to select and categories themes with similar meanings. Researchers identify themes and subthemes coming from the text and create coding sheet that would help the researcher to group together themes with the same meanings and the process of grouping themes helps researchers to give understanding of what each theme meant for the study. Themes and categories with similar meanings from AFSA's Facebook page were identified and grouped together.

Reviewing of themes and categories: When reviewing themes, researchers have to identify preliminary themes in a given text and check if these themes are making sense for the matter under investigation (Braun & Clarke, 2006). It is also important to collect all data that is relevant to a particular theme. All themes and subthemes from the given text have been

identified and used correctly to make sense and to give understanding into the study. In this stage the researcher refined all the themes identified in the previous stage. This is to ensure that all identified themes are evident based and the researcher can make reliable and valid discussion (Braun & Clarke, 2006). Themes that are relevant to the phenomenon under investigation are integrated to give meaning and themes that are irrelevant to the area under study are excluded. In this study the researcher extracted and discussed themes that are relevant to the research and discarded themes that would not help the researcher to come up with the solid discussion for the study.

Defining and naming of themes: During data collection process researchers should select some areas of data that represent themes and identify/determine on how a particular theme is important for the study (Braun & Clarke, 2006:10). In all identified themes, researchers should provide a full writing to give meaning that each theme has for the study (Braun & Clarke, 2006). In this study, the researcher identified all themes coming from the collected data and also wrote a full detailed analysis of all themes coming from the collected data. The researcher also checked the effectiveness of each theme to the study and how each theme could be used to give understanding to the study.

Writing up: writing up is the most important step in thematic analysis, this involves bringing together all information coming from the collected data and write in a detailed and logical manner so that readers can have a deeper understanding on how the data has been analysed and applied to make sense to the study. The researcher was guided by research questions and objectives to clearly write up and analyse data. The researcher made abbreviation of each category that emanated from a particular text and codes were properly arranged alphabetically.

For this study, the researcher used qualitative content analysis to create coding sheet. From AFSA's and NDoH's Facebook pages words that were based on HIV testing and prevention were selected. All HIV testing and prevention posts that were posted between September 2016 and December 2019 by these two organisations were included. Public comments, only comments on HIV testing and prevention posts, their likes and their shares were also included.

In this study the researcher used thematic analysis to define all codes that were selected from the collected data. All the selected codes were broken down into smaller unit of data to give categories and themes for the study. All themes and categories that were selected from the coding sheet were discussed to give understanding into the study. Exclusion selection criteria were: All posts that were posted by AFSA and NDoH on their Facebook pages which were not based on HIV testing and prevention, posts that were not posted between September 2016 and December 2019. Visual posts/content such as videos, pictures and illustrations. These posts were excluded because they were not posted between September 2016 and December 2019, posts that were not based on HIV testing and prevention and other posts were videos and pictures and they would not serve the intentions of the study which is to analyse only the written posts. To effectively analyse the collected data, the researcher created a coding sheet that helped the researcher to differentiate raw data, coded data, categorized data and summarize data to give meaning into the study.

4.9 Data trustworthiness

The trustworthiness is the model that has been suggested by Lincoln & Guba, (1985) which is based on the idea that the available data is accurate and reliable and it would ultimately give the expected results for the study. Lincoln and Guba (1985) recommended four elements to be used to check the trustworthiness of the collected data which are: credibility, dependability, conformability and transferability.

Credibility: is based on the idea that the collected data for the study is effective and credible and that would help the researcher to get the expected results (Lincoln & Guba, 1985:2). The researcher believes that the content from the AFSA's and NDoH Facebook pages is effective and can be trusted because most of their content goes with pictures of their officials in the working field doing their work. This makes the researcher to believe that the work of these two organisations is credible and can be trusted. The researcher only selected public's Facebook comments that are based on HIV testing and prevention and the researcher trusted public Facebook comments and their reaction in such a way that most Facebook followers suggested on how AFSA and NDoH should improve their HIV prevention efforts on their Facebook pages following the release of UTT policy.

Dependability and reliability are similar terms: dependability/reliability ensures that the collected data is reliable and accurate for use so that researchers can present accurate findings about the research. The researcher believed that AFSA and NDoH are posting reliable content on their Facebook pages when promoting their programmes around HIV testing and prevention. The researcher also believed that public's Facebook comments and their reactions on these two organisations are reliable in such a way that most Facebook followers requested these

organisations to extend their visit to many rural areas in South Africa with severe shortage of health care facilities.

Confirmability: Is based on the idea that the collected data can be confirmed. Researchers should be impartial and objective when analysing the collected data. Researchers must not be bias or make some claims when analysing and interpreting data (Lincoln & Guba, 1985:2). The researcher has collected, analysed and interpreted data without modifying or making some additions to the collected data. The researcher was not biased when analysing and interpreting public comments on Facebook. All comments of the Facebook followers and their reactions to the posted content by these two organisations on HIV testing and prevention were analysed and interpreted without any bias.

Transferability: is the process that occur when findings of a particular study can be applied to another study (Shenton, 2004:7). The researcher is responsible for providing sufficient amount of data that would give meaning to the study, with the aim that readers would find it effective to be used in another study (Shenton, 2004:7). Transferability in the study has been ensured by giving of rich data through extracting rich content from the AFSA's and NDoH's Facebook pages that would make sense in order to give clarity to the methodology. The analysis has been credible, adequate amount of data has been presented so that readers can understand the trustworthiness of the research. Transferability on public's Facebook comments was ensured by clearly analysing and interpreting of all comments from Facebook followers and their reactions to the posted content by these two organisations and hoping that readers would find it effective to use this information in their studies.

4.10 Ethical Considerations

Ethical consideration is based on rules that guide researchers when conducting research project. "It is upon all researchers to familiarize themselves and adhere to the ethical code of the institution or organisation" in which the research project is based (Bell & Bryman, 2007, Saunders *et al*, 2011:7). Researchers should know the organisations rules and regulations that would enable them to gain access to information. To gain access to the organisation's information, researchers must tell who they are, where are they coming from, what the purpose of the study is and how the institution is going to benefit from the study (Fouka & Mantzorou, 2011:2).

Research ethics also ensure that the demographic information of the research participants is protected from any harm (Blumberg *et al*, 2005). During data collection process researchers

should guarantee confidentiality and anonymity of research participants by not revealing their private information such as their names, surnames and other credentials of participants. Instead, the researcher should use participant A or B when referring to research participants (Mugenda, 2011:6). Researchers should also provide informed consent form to the research participants to request their participation and researchers should make it clear that their participation is voluntarily and they can withdraw their participation at any time they wish to do so (Arminger, 1997:330). For participants to make informed decision to participate into the study, researchers should give a clear information about the purpose of the study, to indicate the benefits and any risks that are associated to the study so that participants could make informed decision whether to participate or not participate to the study (Mugenda, 2011:7). For this study, the researcher obtained the gate keepers' letter from AFSA that allowed the researcher to access and use their Facebook page.

This is the qualitative content analysis study, there are no specified research participants that were considered, only their comments on HIV testing and prevention after the release of the UTT policy between 2016 and 2019 and the researcher also explored HIV testing and prevention messages reflected on the NDoH during the same year period. The researcher did not disclose the names of the Facebook followers who commented on the pages of these two organisations, instead the researcher outlined only the number of people who commented and analysed their comments to give meaning into the study. Ultimately the researcher received permission from the UKZN ethics committee in the form of ethical clearance with the ethical clearance number: 00003885 that enabled the researcher to proceed with the study since all ethical related issues have been adhered to.

4.11 Conclusion

The research method applied in this chapter has been clearly defined and elaborated. Instruments and tools that were used to collect data have been defined and explained thoroughly on how they were used. This chapter has also described and elaborated on the sampling method that have been used for the study and the reasons for the use and the application of the chosen sampling method were also explained. This chapter also indicated how data was analysed and also touched on ethical considerations. The next chapter focuses on presenting of data, analysing of findings and the discussion of findings.

CHAPTER FIVE

DATA PRESENTATION, ANALYSIS AND DISCUSSION

5.1 Introduction

The previous chapter discussed the methodology used for the study. The main aim of this chapter is to explore and to give understanding on ways that AIDS Foundation of South Africa uses Facebook to promote messages around HIV testing and prevention and ways in which these messages reflect the national Department of Health prevention and testing messages. This chapter present and discuss the results of the study with respect of the research aims and objectives. Data that has been collected through content analysis is presented and discussed in this chapter. The start of this chapter assesses the Universal Test and Treat policy, key messages and plans of the UTT policy in South Africa, followed by a discussion of the key messages developed by the NDoH to ensure implementation of the UTT policy. Finally, this chapter discussed messages developed by AIDS Foundation of South Africa on Facebook page that complement the NDoH's key messages from 2016 to 2019. AFSA's Facebook page in their efforts of promoting HIV testing and prevention from 2016 to 2019. This chapter also discusses and engage on critical comparative analysis of UTT policy and explored what the NDoH promotes on their Facebook page in relation to UTT policy and how AFSA further promotes UTT on their Facebook page. Furthermore themes, subthemes and categories were identified and further discussed.

5.2 Data presentation

In this study, the researcher analysed the Universal Test and Treat Policy, key messages and plans of the UTT policy in South Africa. The researcher also analysed key messages developed by the NDoH to ensure implementation of the UTT policy. Lastly the researcher analysed messages developed by AFSA on Facebook that complement the NDoH key messages from 2016 to 2019. Data on HIV prevention and testing messages posted by AIDS Foundation of South Africa on Facebook and ways in which these messages reflect the National Department of Health prevention and testing messages. It is important for researchers to select important section of the text that would help them to identify themes and categories in order to effectively analyse a given data (King, 2004). Themes and categories from the Facebook pages of these two organisations were extracted and analysed to give understanding into the study.

For this study, the researcher extracted themes, patterns or categories from the collected data and interpret it to give meaning into the study (Strauss & Corbin's, 1998:238). In this study,

the researcher collected data and draw themes, subthemes and categories on HIV testing and prevention messages posted by these two health institutions following the release of UTT policy in 2016 and such information was interpreted to give understanding to the study. The following section is based on the presentation of findings from AFSA's and NDoH's Facebook pages when promoting HIV testing and prevention.

5.2.1 Facebook use by AFSA to promote HIV testing and prevention

The table below represents the coding sheet of AIDS Foundation of South Africa in promoting HIV testing and prevention on their Facebook pages and public comments are also represented

in this coding sheet. Categories, subthemes and themes that were extracted from the AFSA's Facebook pages when promoting HIV testing and prevention following the release of Universal Test and Treat Policy are represented on the table. The first column represents codes, the second column represent categories. The third column illustrates subthemes that are coming from the main themes and the last column shows main-themes that are coming from the entire collected data.

TABLE 5.1: CODING SHEET (AIDS Foundation's Facebook page from 2016 to 2019)

| | Date | Coding | Categories | Sub-themes | Main-themes |
|---|--------------------|--|---|---|--|
| 1 | 24 April 2016 | Mobilizing Communities to prevent HIV and AIDS infections | The use and uptake of HIV testing. | | Voluntary medical male circumcision |
| 2 | 27 April 2016. | Freedom Day celebration. | The use of Pre- Exposure Prophylaxis to prevent HIV infection. | | Encourage condom use for safer sex practice. |
| 3 | 24 October 2017. | Awareness about some causes of HIV and AIDS infection. | Gender based violence contributes to HIV infection. | | Early and forced marriage can lead to the limited negotiations of safer sexual practice between sexual partners for safer sex. |
| 4 | 09 May 2019 | HIV prevention programmes to control HIV infection at EThekwini and uMgungundlovu local areas. | HIV positive people were encouraged to use treatment and nearest health facilities to access treatment. | | AFSA officials educated people about the importance of the UNAIDS 90-90-90 target. |
| 5 | 21 September 2018. | Educational campaigns on HIV/AIDS prevention. | Some drivers of HIV/AIDS and decide on measures to reduce the virus. | Some measures taken by AFSA to keep young people busy in order to stay away from drugs. | Alcohol, drugs and substance abuse. Poverty, Sugar Daddies and HIV, AIDS. |

| 6 | 1 December | World AIDS Day | Stigma prevents | To prevent further | Health organisations should |
|----|--------------|--------------------------------|--------------------------------------|---|--------------------------------|
| | 2019. | educating people about | people from | transmission of the | take bold steps to fight |
| | | stigma. | accessing health care | virus to others. | stigma. |
| | | | services. | | |
| | | | | | |
| | | | | | |
| 7 | 15 September | The HIV prevention | Students were | | Students were educated |
| | 2019 | programme team | encouraged to be | | about the importance of HIV |
| | | encouraged students to | sexually responsible. | | testing. |
| | | take full responsibility | | | |
| | | about their health to | | | |
| | | prevent HIV/AIDS. | | | |
| 8 | 13 February | AFSA and AHF celebrated the | Encouraging use of | The use of ARV's | Collaborative efforts to |
| | 2019 | International Condom | condoms to prevent | helps HIV positive people to remain | reduce the spread of HIV/AIDS. |
| | | Day. | unwanted | strong from the | |
| | | | pregnancy, | virus and to prevent the spread of the | |
| | | | HIV/AIDS and other | virus. | |
| | | | sexual transmitted | | |
| | | | infections (STIs). | | |
| | | | | | |
| 9 | 03 December | World AIDS Day | To prevent the spread and further | | # Get tested Get treated |
| | 2018 | celebration | transmission of the | | We can beat HIV. |
| 10 | 15 December | Workplace should play | virus to others. Workplaces should | People in the | People in workplaces were |
| 10 | 2019. | a role in reducing | advocate the | working | encouraged to participate to |
| | | HIV/AIDS. | problem of stigma. | environment were | HIV testing and VMMC. |
| | | | problem of sugma. | also encouraged to | Tit's testing and vivilvie. |
| | | | | be sexually | |
| | | | | responsible | |
| | | | | Tesponsione | |
| 11 | 26 September | The World | Engaging young | Health services | Raising awareness about |
| | 2017 | Contraception Day celebration | people on their sexual health and | were made freely | contraception's |
| | | ceieoranon | allow them to decide | available on that | |
| | | | about their sexual lives. | day. | |
| | | | 11 vCS. | | |

Table 1: CODING SHEET (AIDS FOUNDATION'S OF SOUTH AFRICA'S FACEBOOK PAGE) 2016-2019

The table above shows the coding sheet of the collected data from AIDS Foundation of South Africa. This coding sheet illustrates 11 themes that were generated from the collected data. From the coding sheet the researcher created themes and categories. Each theme will be discussed below to give meaning and understanding into the study.

5.2.1.1 Mobilizing communities to prevent HIV and AIDS infections

The following themes, sub-themes and categories relate to mobilize communities to prevent the spread of HIV.

- The use and uptake of HIV testing
- Voluntary medical male circumcision

5.2.1.1.1 The use and uptake of HIV testing

AIDS Foundation of South Africa is one of the key organisations in reducing the spread of HIV and AIDS. It its HIV prevention efforts, the organisation on its Facebook page posted its officials visit at Peacevale Community in UMgungundlovu to encourage community members to go for HIV testing. HIV testing is important in reducing the spread of the disease by ensuring that people are aware of their HIV status so that they can immediately access medication to control the spread of virus (NDoH, 2010:4).

Facebook followers reacted on AFSA Facebook post promoting the uptake of HIV testing. 6 people commented, 5 people liked the post and 7 people shared the post. Most Facebook followers in their comments applauded the good job done by AFSA in reaching out communities to promote HIV testing. These Facebook followers also added that the presence of AFSA's officials in their communities would bring changes that would help them to live better lives and to have a better knowledge about the virus. Knowledge about HIV status is important to access treatment at the early stage of the virus and to prevent the further transmission of the virus to others (Shisana *et al.*, 2005). AIDS Foundation of South Africa supported the government efforts of ensuring that many people know their HIV status and the organisation did this by reaching out communities to educate the public about HIV prevention.

5.2.1.1.2 Voluntary medical male circumcision

The collected data indicate that voluntary medical male circumcision is important in reducing the spread of the virus. According to World Health Organisation VMMC is regarded as HIV prevention method that reduces HIV infections by 60% (WHO, 2012). AFSA on its Facebook page encourage young boys and men to undergo medical male circumcision to prevent the spread of HIV/AIDS. The reviewed literature argues that other provinces with high HIV infections are still not aware about the importance of voluntary medical male circumcision (VMMC) in preventing the spread of the virus (Lundsby *et al.*, 2012: 694). AFSA on its HIV prevention initiatives reached out different communities to educate people about VMMC and its importance in reducing HIV/AIDS. Facebook followers reacted to the posted content by AFSA in promoting VMMC. 10 people liked the post and 6 people shared the post and there was no comment. AFSA did this to prevent the spread of HIV/AIDS in communities and to

prevent further infections. AIDS Foundation of South Africa also did good job to educate the public about the importance of medical male circumcision in reducing the spread of HIV/AIDS.

The following themes, subthemes and categories were taken from the AFSA's Facebook page when they visited Durban University of technology at Roseville residence at uMgungundlovu on the 27 April 2016 to educate students about health-related issues including HIV/AIDS.

5.2.1.2 Freedom Day celebration

The following themes and categories relate to HIV prevention:

- Encourage the condom use to practice safer sex
- The use of pre-exposure prophylaxis to prevent HIV infection

5.2.1.2.1 Encourage the condom use to practice safer sex

During the Freedom Day celebration on the 27 April 2016, AFSA on its Facebook page posted their visit to Durban University of technology at Roseville residence at uMgungundlovu and amongst other things in their visit was to educate students about HIV/AIDS and to encourage safer sex practice to prevent the spread of HIV/AIDS. AFSA promoted safer sex practice and encouraged young people to prevent HIV/AIDS. AFSA encouraged the use of condoms and other HIV prevention methods by students above the ages of 18 to prevent HIV and other sexual transmitted diseases. Condom is the HIV prevention method used to prevent unplanned pregnancy, HIV/AIDS infection and other sexual transmitted diseases (Coates *et al.*, 2000:456).

5.2.1.2.2 The use of pre-exposure prophylaxis to prevent HIV infection

AFSA officials also encouraged students to use other methods to prevent the spread of virus. Pre-exposure prophylaxis was encouraged to be used by students above 18 years. AFSA officials emphasised that the use of these HIV prevention methods does not guarantee HIV prevention and PrEP only prevents HIV and do not prevents other sexually transmitted diseases. PrEP as a new HIV prevention method encouraged to be used by HIV negative people who are at risk of HIV infection to prevent HIV/AIDS (WHO, 2014).

There were 60 students who were present during the Freedom Day celebration. Facebook followers reacted on the posted content by AFSA in promoting the use of condom and PrEP usage. 7 people liked the post, 6 people shared the post and there were no comments. These two HIV prevention methods were encouraged by AFSA on Facebook due to their importance in prevention HIV/AIDS (AFSA,27/04/2016).

5.2.1.3 Awareness about some causes of HIV/AIDS infection

The following themes and categories are based on awareness about some causes of HIV/AIDS infection:

- Gender based violence contributes to HIV infection
- Early and forced marriage could lead to the limited negotiation of safer sex practice between sexual partners.

5.2.1.3.1 Gender based violence contributes to HIV infection

AIDS Foundation of South Africa raised awareness on gender-based violence which is regarded as a contributing factor to the increase of HIV/AIDS. Gender-based violence is defined as the violation of rights of the other gender (Bott *et al.*, 2012; Ellsberg & Emmelin, 2014). The UN Population Council was based on the idea that GBV contributes extensively to the increase of HIV/AIDS infection around the world (Horizons, 2001:3). GBV manifests itself in many ways such as physical, sexual, psychological or economic harm and also contributes to the rise of HIV/AIDS (WHO, 1997). In most reported cases for this violence, women are victims and men are the abusers (WHO, 1997). AFSA on its Facebook page raised awareness about the causes and effects of gender-based violence in contributing to HIV/AIDS infection.

Gender based violence makes women and young girls vulnerable to HIV infections in three ways which are: to be mentally disturbed due to their sexual intercourse by force, secondly it makes them reckless about their lives due to violent sexual experiences, thirdly the sexual traumatic experience can make them negligent about their lives and to be sexually irresponsible and those who are on HIV treatment could stop taking the treatment (Amdie, 2005:7). "The conditions under which women have sex is mostly determined by their male partner's use of violence and gender-role expectations about love, sex and compliance with the male partner's desires" (Karim & Karim, 2010:318). AFSA as one of key health organisations that focuses on reducing the spread of HIV, encouraged the victims of this violence on Facebook to stay away from abusive relationships and to report these incidences to the relevant institutions for consideration. AFSA also promotes safer sex practice by encouraging people to test HIV, to use condom and to have one sexual partner at the time (AFSA, 24/10/2017). Facebook followers reacted on the AFSA's Facebook posts of reducing the spread of HIV/AIDS by discouraging gender-based violence that seemed to be the contributor to the rise of HIV/AIDS. 10 people liked the post and 7 people shared the post (F.F, 24/10/2017).

5.2.1.3.2 Early and forced marriage could lead to the limited negotiation between sexual partners for safer sex practice

Early and forced marriage can contribute to the increase of HIV and AIDS. AFSA on Facebook raised awareness about consequences of early and forced marriage and its impact on HIV infection. Early and forced marriage is based on taking of young girls by force who are below the ages of 18 years old and turn them into wives (UNFPA, 2006). This marriage can contribute to HIV/AIDS infection because this marriage is sometimes characterized by the lack of negotiation for safer sex practice between the two partners, especially wives due to their ages (AFSA, 24/10/2017). AFSA shared information on Facebook about early and forced marriage and also raised awareness about the impact of this marriage to HIV/AIDS infection. Early and forced marriage would affect the UNAIDS target of reducing HIV infections by 2030 (WHO, 2016). Facebook followers reacted when AFSA raising awareness on gender-based violence and the forced marriage which could be the contributor into the increase of HIV/AIDS. 5 people liked the post and 13 people shared the post and no comments.

5.2.1.4 HIV prevention programme to control HIV infection at eThekwini and uMgungundlovu local areas

The following themes and subthemes were taken from AFSA's Facebook page on ways to control HIV infection during their visit at eThekwini and uMgungundlovu local areas on the 09 May 2019.

- AFSA officials educated the public about 90-90-90 UNAIDS target
- AFSA encouraged HIV positive people to use treatment and use nearest health facilities to access treatment.

5.2.1.4.1 AFSA officials educated the public about 90-90-90 UNAIDS target

AFSA visited various villages at eThekwini and uMgungundlovu local areas to educate people about 90-90-90 UNAIDS target and what is meant for HIV prevention and treatment. Villagers were encouraged to test HIV so that they could know their status. AFSA made community members aware that 90-90-90 was adopted by UNAIDS and NDoH to ensure that 90% of HIV positive people should know their status, 90% of people knowing their status should access Antiretroviral treatment and 90% of people receiving treatment should be viral suppressed. The 90-90-90 initiative was introduced to ensure a significant reduction of HIV/AIDS by 2020 (UNAIDS, 2014).

5.2.1.4.2 AFSA encouraged HIV positive people to use treatment and use nearest health facilities to access treatment

HIV positive people were encouraged to use treatment. They were also encouraged to use their nearest health care facilities to access treatment. Treatment is important in reducing the load of virus and make people strong from the virus (WHO, 2016).

Facebook followers reacted on this post, 6 people liked the post, 8 people shared the post and 3 people commented to the posted content. All people who commented on AFSA's Facebook page applauded the great job done by AFSA in educating the public about 90-90-90 UNAIDS target and its importance in reducing the spread of HIV/AIDS. AFSA aimed to reduce the alarming increase of HIV/AIDS in communities especially to young people who constitute the highest number of people with HIV/AIDS (AFSA, 09/05/2019).

The following themes and categories were taken from the AFSA's Facebook page when they rolled out HIV educational campaigns at Umlazi on the 21 September 2018 to educate the public about some drivers of the virus and some measure taken by AFSA to minimise the spread of the virus.

5.2.1.5 Drivers of HIV/AIDS

- Alcohol, drugs and substance abuse are regarded as drivers of HIV/AIDS
- Poverty, Sugar daddies and HIV/AIDS
- Some measures taken by AFSA to keep young people busy in order to stay away from drugs.

5.2.1.5.1 Alcohol, drugs and substance abuse are regarded as drivers of HIV/AIDS

AFSA on its Facebook page posted their visit at Umlazi section C to educate the public about HIV/AIDS and raised awareness about things that can drive the virus. Alcohol, drugs and substance abuse were regarded as drivers of HIV/AIDS infection in such a way that when people are drunk, they tend to do things that can be harmful to their lives under the influence of alcohol in such a way that people who are drunk sometimes engage into unprotected sexual practices which increases chances of contracting HIV/AIDS (WHO, 2016). AFSA in its educational campaign encouraged the public to drink responsible and urged them to refrain from engaging to sexual practices under the influence of alcohol as that could make them vulnerable to HIV infection. "Drinking of alcohol and smoking weed can lead to bad choices with consequences such as teen pregnancy and HIV infection" one of the AFSA official said

(AFSA,21/09/2018). The reviewed literature also supported that alcohol contributes extensively to the increase of HIV/AIDS (Peltzer & Pengpid, 2013:14).

5.2.1.5.2 Poverty, Sugar daddies and HIV/AIDS

On the 21 September 2018 AFSA posted on Facebook their visit uThukela District Municipality to educate young people about HIV/AIDS. AFSA officials found poverty as one of the drivers for HIV infections with sugar daddies (old men who are in sexual relationships with young girls in exchange of money) involved. One of the AFSA employee who was 34-year-old, who worked for AFSA for so many years was based on the idea that it was a horrible situation where young ladies engaged into sexual relationships with older men in the exchange of money. For being into a sexual relationship with older people in exchange of money poses high risks of HIV infections and other sexually transmitted diseases. The reviewed literature supported that young girls who are in sexual relationships with old men are at high risk of contracting HIV/AIDS in such a way that in most of the time men that are in concurrent relationships are afraid to undergo HIV testing (Luke, 2002). AFSA suggested that different organisations should work together to educate young people about self-respect, self-dependence so that they could not rely to other people for survival. These collaborative efforts would help to reduce the spread of HIV/AIDS to the young generation (AFSA, 21/09/2018).

5.2.1.5.3 Some measures taken by AFSA to keep young people busy in order to stay away from drugs

As a measure, AIDS Foundation of South Africa encouraged young people to participate to sport. The organisation organised different sporting codes to keep young people busy with something in an effort to take them out of drugs. AFSA officials also added that the purpose of engaging them to sport was not only to take them out of drugs, but to also afford them an opportunity for them to express their talents. Facebook followers reacted to the posted content when AFSA was responding to some of the things that seemed to be the drivers of the virus. 10 people commented, 20 people liked the post and 11 people shared the post. All Facebook followers commended the excellent job done by the organisation to keep educating young South Africans about HIV/AIDS and raise awareness to some of the factors that are contributing to the rise of the virus (F.F, 21/09/2018).

5.2.1.6 Factors that prevent people from testing and the uptake of other HIV prevention methods

The following themes, subthemes and categories were taken from the AFSA's Facebook page and is regarded as one of the factors that prevent people from HIV testing and the uptake of other HIV prevention methods:

- Stigma prevents people from accessing healthcare services
- Health organisations should take bold steps to fight stigma and further transmission of the virus to others

5.2.1.6.1 Stigma prevents people from accessing healthcare services

AFSA on its Facebook page indicated that stigma and discrimination directed to HIV positive people due to their HIV status is the major problem around the globe. Stigma is the discrimination directed to HIV positive people by HIV negative people and is characterised in various ways (Allport, 1954; Brewer, 2007:7). The reviewed literature supported that stigma prevents people from accessing healthcare services such as treatment and prevention (Earnshaw & Chaudoir, 2009:7; Young *et al* 2007). Stigma increased mortalities on HIV related illnesses because many people have a fear of being rejected by their sexual partners, community members and by their close relatives once they tested HIV positive (Irungu *et al.*, 2008; Subramanian *et al.*, 2008:4). The organisation took necessary steps to educate the public about stigma by embarking on various educational campaigns to educate the public about stigma and its effects to HIV positive people. The organisation also urged the public to desist from discriminating HIV positive people.

5.2.1.6.2 Health organisations should take bold steps to fight stigma

AFSA officials on Facebook requested a collaborative effort by all health institutions, health care workers and the general public to fight the problem of stigma. On Facebook AFSA requested community health workers in their health-related workshops and community meetings to educate the public about stigma and its effect to people. AFSA did that to ensure that many people know their HIV status in order to prevent the further transmission of the virus to other people. The organisation also urged all civil society groups to also work tirelessly to educate the public about stigma.

People reacted on AFSA Facebook post when educating the public about stigma and requesting health organisations to take bold steps to fight stigma. 3 people commented. All Facebook followers who commented support the efforts by AFSA on Facebook in fighting of stigma and

they shared the same sentiment that all organisations and people should play their part in fight against stigma.

5.2.1.7 HIV/AIDS prevention programmes

The following themes, sub-themes and categories were taken from AFSA's Facebook page when rolling out HIV prevention programme to encourage students to take full responsibility for their health to prevent spread of HIV/AIDS.

- Students were educated about the importance of HIV testing
- Students were encouraged to be sexually responsible in order to prevent HIV/AIDS.

5.2.1.7.1 Students were educated about the importance of HIV testing

AFSA posted its HIV prevention team on Facebook when rolling out educational campaign on the 15 September 2019 to the variety of schools around KwaZulu Natal to educate students about the importance of HIV testing and also encouraged them to undergo HIV testing. HIV testing is the process using the testing machine to test HIV/AIDS in order to know HIV status (Linas, 2015:10). AFSA educated students about the importance of HIV testing and risks associated to not knowing the status. HIV testing helps people to be sexually responsible and to take informed decisions about their sexual and reproductive health, AFSA officials added (AFSA, 15/09/2019).

5.2.1.7.2 Students were encouraged to be sexually responsible in order to prevent HIV/AIDS

During AFSA visit in various schools to KwaZulu natal Province to educate students about HIV/AIDS. AIDS Foundation of South Africa went to different schools in KwaZulu Natal to raise awareness about HIV/AIDS and also urged students to be sexually responsible in order to fight HIV. The organisation encouraged students to abstain from sexual engagement because for being in a sexual relationship they are easily exposed to HIV and to other sexually transmitted infections and unplanned pregnancies. The organisation further urged students who are above 18 years of age and those who are already in relationships to be sexually responsible by having one sexual partner and use protection in their sexual practice. The organisation also distributed some booklets on HIV/AIDS and safer sex practice for students to read so that they could be responsible and have a knowledge about the virus.

Facebook followers reacted to the posted content about the importance of HIV self-testing method. 15 people liked the post, 20 people shared the post and 7 people commented. Most

Facebook followers applauded the work done by AFSA in going to schools and educate young people about HIV and safer sex practice. These followers also regarded young people as the most vulnerable group to HIV and these educational campaigns could help to bring change. "Young people are more susceptible and vulnerable to HIV/AIDS and these HIV prevention programmes would help to bring some changes to them" Facebook follower said, (F.F, 15/09/2019).

5.2.1.8 International Condom Day

The international Condom Day is the day that is celebrated nationally and internationally to raise awareness about condom and encourage people to use condom in their sexual engagement. This day was created to educate the public about the importance of using condom in preventing the spread of HIV/AIDS. During this day people are reminded about the importance of condom in preventing sexual related problems including but not limited to HIV/AIDS, other sexual transmitted infections (STI's) and unplanned pregnancy. This day is celebrated nationally and internationally on the 13 of February every year. AIDS Health Care Foundation (AHF) celebrated the International AIDS day on the 13 February 2019 at loss Angeles. On its Facebook page the organization encouraged the public to engage into a safer sexual practice by increasing the public availability of condoms. AHF President Mr Michael Weinstein said that they are happy to celebrate ICD as it serves as a reminder of condom use to the world which seeks to prevent HIV, unplanned pregnancies and other sexual transmitted diseases that might occur due to unprotected sexual engagement. "We are delighted to observe and celebrate International Condom Day around the world our confident of reminding people about condoms and providing easy access to free condoms will go a long way in helping to reduce new HIV and STD infections as well as unwanted pregnancies", Mr Michael said.

The following themes, subthemes and categories were taken from the AFSA's Facebook page when celebrating the annual International Condom Day at Inanda KwaZulu that took place on 13 February 2019 in collaboration with the AIDS Health Care Foundation (AHF).

- Collaborative efforts to reduce the spread of HIV/AIDS by promoting of condom usage
- Encouraging use of condoms prevent unwanted pregnancy, HIV/AIDS and other sexual transmitted infections (STIs).
- The use of ARV's helps HIV positive people to remain strong from the virus and to prevent the spread of the virus.

5.2.1.8.1 Collaborative efforts to reduce the spread of HIV/AIDS by promoting of condom usage

AIDS Foundation of South Africa in collaboration with AIDS Healthcare Foundation celebrated International Condom Day at Inanda Township at KwaZulu natal province by educating the public about the importance of using condom in controlling the spread of HIV/AIDS and other sexually transmitted diseases. During the celebration AFSA also distributed condoms in public places to be accessed only by people who were 18 years of age. AFSA did this to promote safer sex practice and encouraged people to be sexually responsible. During the celebration AFSA officials encouraged the public to access condoms as it would help to prevent unwanted pregnancy, HIV/AIDS transmission and other sexual transmitted infections (STI's). The organisation also showcased the use of this HIV prevention method and encouraged the public to use it properly to avoid breakage.

5.2.1.8.2 Encouraging use of condoms to prevent unwanted pregnancy, HIV/AIDS and other sexual transmitted infections (STIs)

During the International Condom day, on Facebook AIDS Foundation of South Africa educated the public about the importance of condom use to prevent the spread of HIV/AIDS. The organisation promoted safer sexual practice by encouraging the public to use condoms in their sexual practice and the public was also requested to spread the word of condom usage to their communities in order to save lives of South Africans from HIV/AIDS. On the celebration, the organisation also distributed male and condoms in public places to be accessed by sexually active people who are above to the age of 18 years. The organisation made it clear that condom usage prevents a lot of things such as unwanted pregnancy, HIV/AIDS and other sexually transmitted infections (STI's).

5.2.1.8.3 The use of ARV's helps HIV positive people to remain strong from the virus and to prevent the spread of the virus

During the celebration of the International Condom day, AFSA officials encouraged HIV positive people to always collect the treatment to their health institutions. The organisation also told people to follow the instructions when using the treatment and use it properly. AFSA also raised awareness about the treatment, that the treatment might have some side effects especially to people who are new to the treatment. "The treatment might have some side effects to people who are new to it and be aware that these side effects can take place in a short period of time before the treatment adapts into your bodies" AFSA official said (AFSA, 13/02/2019).

Facebook followers reacted to the posted content. 10 people commented on the post, 35 people liked the post and 28 people shared the post. Facebook followers expressed their happiness for AFSA to reach out some of KwaZulu Natal townships and celebrate the International AIDS Day with the residents. Some Facebook followers argued that the education about condom usage would bring some changes in many communities and it would change the attitude of many people towards condom usage (F.F, 13/02/2019).

5.2.1.9 World AIDS Day of 01 December 2018

The World AIDS Day is the national and international day that is celebrated every year on the 01 December. This day was created around 1988 and its basic purpose is to raise awareness on HIV related illnesses and to pay tribute to all people who passed away due to HIV/AIDS. This day is also meant to educate the public about stigma and discrimination that is directed to HIV positive and encourage joint efforts by various health organizations to fight stigma and discrimination directed to HIV positive people. This day is also celebrated to give strength and courage to people who are living with the virus to remain strong and resilient from the virus. Various health organizations on their Facebook pages celebrated the 2019 World AIDS Day differently. The South African National Aids Council (SANAC) celebrated this day under the theme "The Right to Health". This was based on encouraging the equal access to health services and the continuous fight of stigma and discrimination that is encountered by people living with HIV/AIDS. "Only by placing human rights at the centre of global health we can ensure that health care is accessible, acceptable, available and of good quality for everyone, leaving no one behind" Mr. David Mabuza, the Chairperson for SANAC said on their Facebook page. Mr Mabuza also added that World AIDS day is the day that is celebrated to bring unity and togetherness where people from different language groups come together in the fight against HIV/AIDS and stigma.

Different health organizations celebrated this day differently. The Desmond Tutu HIV Foundation (DTHF) in collaboration with the Welcome Centre for Infectious Disease in Africa (CIDIA) celebrated the World AIDS day in Cape Town and they hosted an exhibition under the theme "communities make the difference". On their Facebook, the foundation expressed happiness to the tremendous role played by communities to raise awareness on HIV/AIDS and they also expressed their happiness on the important role played by health care workers to raise more awareness about HIV/AIDS in communities. "So today and in the future, I have no doubt of the role played by communities in responding to the virus," said Bekker Chief Executive Officer of the Desmond Tutu HIV Foundation. On the other side the AIDS Health Care

Foundation celebrated this day by connecting gay men and also encouraged people to work together to fight HIV/AIDS. AHF urged the same sex relationship to be supported and be considered in the efforts to fight HIV/AIDS.

The following themes and categories were taken from the AFSA's Facebook page when celebrating World AIDS Day on 01 December 2018 at Bhambayi Village, KwaMashu Township in KwaZulu Natal Province.

- Get tested, Get treated, we can beat HIV
- Prevention of the spread and further transmission of the virus to others

5.2.1.9.1 Get tested, Get treated, we can beat HIV

AIDS Foundation of South Africa (AFSA) on its Facebook page posted their World AIDS Day celebration that was celebrated in one of the KwaZulu Natal villages on 01 December 2018. The theme of the celebration was based on #Get tested, Get treated, we can beat HIV. During the celebrations, AFSA encouraged the public to test HIV so that they could know their status. Testing helps people to know their HIV status so that they can act on the status to prevent the spread of the virus (Morin *et al.* 2006:221:88). The organisation assured the public that the virus is not killing, the dangerous thing is when people do not know their status about the virus which would deteriorate their health condition and result to the spread of the virus to others. HIV positive people were encouraged to access health care facilities for treatment. HIV treatment helps HIV positive people to remain strong from the virus and to reduce the further spread of the virus to other people (Attia *et al.* 2009). The organisation also emphasised that people who found positive would be immediately taken to health care facilities for treatment and people should keep their status and visit their nearest health institutions for medical check-up (AFSA, 01/12/2018).

5.2.1.9.2 Prevention of the spread and further transmission of the virus to others

The importance of HIV testing is to know the status and to react about the status. The positive reaction to HIV status helps to prevent the further transmission of the virus to other people. Abstinence, safer sex practice and the use of treatment etc are primary measures that could be taken by people to prevent the spread and the transmission of HIV/AIDS to other people. During the World AIDS Day celebration AFSA officials requested both positive and negative people to play their part in reducing the virus and preventing the spread of the virus to other people by doing the right thing to save South Africans from the virus (F.F, 01/12/2018).

Facebook followers reacted to the posted content by AFSA. 120 people shared the post, 6 people commented and 15 people liked the posted content. All Facebook followers supported efforts done by AFSA during the World AIDS day celebration by appealing the public to do the right thing to prevent HIV/AIDS in order to save the country from the virus (F.F, 01/12/2018).

5.2.1.10 Workplaces should play part in reducing the spread of HIV/AIDS

The following themes and categories were taken from the article shared by AFSA on Facebook on the 15 December 2019 encouraging workplaces to play part in reducing the spread of HIV/AIDS.

- People in workplaces were encouraged to participate to HIV testing and MMC
- People in the working environment were also encouraged to be sexually responsible
- Workplaces should also advocate the problem of stigma

5.2.1.10.1 People in workplaces were encouraged to participate to HIV testing and VMMC

AIDS Foundation of South Africa shared an article on Facebook encouraging people in the working environment to participate to HIV testing and medical male circumcision. The article was based on the idea that workplaces should form part of HIV prevention efforts in such a way that employees themselves should take a leading role to prevent the spread of the virus by participating to HIV testing and undergoing other HIV prevention measures such as medical male circumcision. The article further argued that if all working environments could test HIV and make the use of other HIV prevention methods, HIV/AIDS infections and related deaths would be greatly reduced especially infections caused by people in the working environment.

5.2.1.10.2 People in the working environment were also encouraged to be sexually responsible

The organisation also encouraged people to be responsible about their sexual lives. For being sexually responsible would help to save the nation from the virus. People were also encouraged to do regular check-up for other sexually related illnesses that might affect their bodies.

5.2.1.10.3 Workplaces should also advocate the problem of stigma

The organisation also urged workplaces to advocate the problem of stigma. AFSA emphasised that if health organisations, government, working environment and the general public could

work together in the fight against stigma that would help to save many people from discrimination.

Facebook followers reacted to the posted content. 36 liked the post, 21 shared the post. No comments. Facebook followers supported the initiatives by AFSA of encouraging working environment to play part in reducing the spread of HIV/AIDS.

5.2.1.11 World Contraception Day

The World Contraception Day is the national and international day celebrated annually on the 26 September. This is the day celebrated to raise awareness on various contraceptive methods and allow people to take their own decisions about their sexual lives. Various organisations celebrated this day to raise awareness to the variety of contraceptive methods that people can use. Desmond Tutu Foundation, AIDS Health Care Foundation, HIV for South Africa etc, celebrated this day based on their key different messages of encouraging South Africans to be sexually responsible and encouraging young people to make good decisions about their sexual and reproductive health by using various available contraception's for males and females. The organisations added that people can take their informed decision to use various contraceptives such as condoms (male and female) condoms, contraceptive injection, combined pill etc depending to the individual's needs.

The following themes, subthemes and categories were extracted from the AFSA Facebook page when celebrating the World Contraception Day on the 26 September 2016 at Umlazi high school.

- Raising awareness about contraception
- Engaging young people on their sexual health and allow them to decide about their sexual lives
- Health services were made freely available on that day

5.2.1.11.1 Raising awareness about contraception

This is the day celebrated by South Africans every year on the 26 September. On the 26 September 2016 AFSA celebrated the WCD at Umlazi high school to engage students and discuss with them about their sexual and reproductive health. The organisation encouraged students to take informed decisions about their sexual lives and students were educated about the variety of contraceptives and the organisation made them aware that there are different kinds of contraceptives that are available for males and females and people can use them

differently depending on their needs. There are male and female condoms, contraceptive injections, contraceptive implant, contraceptive pills etc and they are all used depending to the individual's needs. AFSA came along with some services such as mobile clinics with counselling and testing services.

5.2.1.11.2 Engaging young people on their sexual health and allow them to decide about their sexual lives

During the world AIDS Day celebration health care workers and health advisors engaged students on the variety of sexual related matters affecting young people in South Africa. Students were engaged and given chances to express their personal experiences about their sexual and reproductive health. AFSA and other health care workers advised them on how to deal with some of their sexual health matters and they also advised them about the institutions they can visit when they needed help.

5.2.1.11.3 Health services were made freely available on that day

During the celebration, health care services such as condoms, ARV's and sanitary towels were made freely available to people to access them on that day. Students who are above 18 years of age were also advised to access these health services to their nearest health institutions.

Facebook followers reacted to AFSA Facebook posts celebrating the World Contraception Day. 10 people commented, 31 people liked the post and 28 people shared the post. All Facebook followers who commented expressed their happiness for the organisation in educating students about their sexual life at the early age so that they could take an informed decision about their sexual lives.

5.2.2 The use of Facebook by NDoH to promote HIV testing and prevention

The table below represents the coding sheet of the national Department of Health in promoting HIV testing and prevention on their Facebook pages and public comments are also represented in this coding sheet. Categories, subthemes and themes that were extracted from NDoH's Facebook pages when promoting HIV testing and prevention following the release of Universal Test and Treat Policy are represented on the table. The first column represents codes, the second column represent categories. The third column illustrates subthemes that are coming from the main themes and the last column shows main-themes that are coming from the entire collected data.

TABLE 5.2 CODING SHEET (National Department of Health's Facebook page from 2016-2019)

| | Date | Coding | Category | Subtheme | Main-theme |
|---|------------------|---|--|---|--|
| 1 | 01 December 2018 | World AIDS Celebration by the Department of Health. | People were encouraged to use condoms, ARV's, PrEP and participate to medical male circumcision. | People were encouraged to do HIV testing to prevent the further transmission of HIV/AIDS. | Policy makers encouraged the public to prevent the spread of HIV/AIDS. |
| 2 | 23 June 2017 | Cheka impilo wellness campaign (know your health status) | | | Health services such as testing blood pressure, testing diabetes, eyes, HIV and screening for TB were made freely available during the campaign. |
| 3 | 25 July 2018 | The international AIDS conference hosted by the national Department of health. | Discussions about stigmatization. | HIV positive people were encouraged not to be shy about their HIV status. | people were encouraged to do HIV testing. |
| 4 | 01 December 2016 | World AIDS Day Celebration. | Access to health care facilities. The constant use of medication was encouraged during the celebration. | Peer education and networking of people living with HIV was encouraged. | Community members should play part in reducing the spread of virus. |
| 5 | 27 November 2019 | Health Minister launched new HIV treatment. | The use of the nearest health care facilities to access treatment was also encouraged. | | ARV's such Tenofovir, lamivudine and Dolutegravir (TLD) were officially launched by Minister at Umzumbe Local Municipality. |
| 6 | 27 June 2019 | NDoH encouraged the distribution ARV's and other HIV prevention methods such as condoms, PrEP etc to the institutions of higher learning. | Educational campaigns to educate people about HIV/AIDS should be tightened in the institutions of higher learning. | To save lives of many people from HIV and to ensure immediate access of HIV positive people to treatment. | The distribution of Antiretroviral treatment and other HIV prevention methods such as condoms, PrEP etc |

| | | | | | were encouraged to |
|---|------------------|---------------------------------|---------------------------------|---------------------------|------------------------|
| | | | | | the institutions of |
| | | | | | |
| | | | | | higher learning in the |
| | | | | | fight of HIV. |
| | | | | | |
| 7 | 02 October 2017 | The Annual Rotary Family Health | To improve health and | | Different health |
| | | Day | livelihood of people living in | | services were |
| | | | remote areas by bringing health | | brought to people |
| | | | services to communities. | | living in remote areas |
| | | | | | on that day. |
| | | | | | , |
| 8 | 09 February 2017 | . National Department of Health | Different health care services | The department of health | The health |
| 0 | 0) Teordary 2017 | | | 1 | |
| | | Facebook when South African | should be taken to communities. | promised to partner with | department promised |
| | | government delivering the State | | communities to improve | to work with |
| | | of The Nation Address (SONA) | | availability of health | communities to meet |
| | | | | services to communities. | 90-90-90 2020 |
| | | | | | UNAIDS target. |
| 9 | 11 June 2019 | NDoH hosted the 9th SA AIDS | The use of creative and | Young people and their | The unprecedented, |
| | | Conference at ICC Durban. | innovative ways to fight the | use of the new technology | innovation and |
| | | | spread of HIV/AIDS in SA. | to create new ways that | technologies: HIV |
| | | | | would help to fight | and Change. |
| | | | | HIV/AIDS. | |
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Table 2: CODING SHEET (NATIONAL DEPARTMENT OF HEALTH'S FACEBOOK PAGE) 2016-2019

The table above shows the coding sheet of the National Department of Health (NDoH). Codes were created from the data that was collected from NDoH's Facebook page. From the coding sheet 9 themes were selected and the selected themes were based on HIV testing and prevention. From the created codes, the researcher extracted themes and categories. Each theme will be discussed below to give meaning and understanding into the study. On the discussion below various subthemes were also discussed collectively.

5.2.2.1 World AIDS Day celebration by the NDoH

The following themes, sub-themes and categories were taken from the national Department of Health Facebook page during the celebration of the world AIDS day on 01 December 2018.

- Policy makers encouraged the public to prevent the spread of HIV/AIDS.
- People should test and treat the virus to prevent its transmission to other people.
- People were encouraged to use condoms, ARV's, PrEP and participate to medical male circumcision.

5.2.2.1.1 Policy makers encouraged the public to prevent the spread of HIV/AIDS

During the world AIDS Day celebration hosted by the NDoH, policy makers on health-related matters urged the public to do their level best to prevent the spread of the virus by adhering to all HIV prevention methods. The DoH's officials on Facebook page encouraged the public to be sexually responsible by using all other HIV prevention methods such as abstinence and the use of condoms. The Department did that to prevent the spread and the transmission of HIV/AIDS to other people.

5.2.2.1.2 People were encouraged to do HIV testing to prevent the further transmission of HIV/AIDS

During the world AIDS day celebration, the national department of health encouraged the public to test HIV/AIDS. NDoH officials requested people to get tested for HIV and people were also encouraged to urge their sexual partners and their friends to test for HIV/AIDS. The Department was going along with the testing team to test people who were interested to test HIV. The department was also giving out some parcels to people who tested for HIV/AIDS such as T-Shirts, bags, caps, USB's etc to attract many people to get tested for HIV/AIDS.

5.2.2.1.3 People were encouraged to use condoms, ARV's, PrEP and participate to medical male circumcision.

During the AIDS day celebration, the Departmental officials encouraged people to use condoms and also encouraged people to participate to medical male circumcision and they made people aware that medical circumcision reduces chances of being infected by the virus, so people should go for circumcision. The Department went with the mobile clinic at Seshego to bring along all health-related services. HIV treatment was given out to HIV positive people and pre-exposure prophylaxis was also available and given out to people who are HIV negative and at risk of contracting the virus. Facebook followers reacted to the posted content by the NDoH. 12 people shared the post, 5 people liked the post and 2 people commented. The two commented supported the initiatives by NDoH to prevent the spread of the virus. Some Facebook followers requested the Department to also encourage other health care and HIV prevention organisations around the country to engage more communities to educate them about HIV/AIDS and ways to prevent it (FF, 01/12/2018).

5.2.2.2 Cheka impilo (know your health status)

The following themes, sub-themes and categories were taken from the NDoH Facebook page when hosting a campaign to encourage people around the country to know their health status under the theme called Cheka Impilo (know your health status).

- Health services such as testing blood pressure, testing diabetes, eyes, HIV and screening for TB were made freely available during this campaign.
- The purpose was to improve health and wellness of people

5.2.2.2.1 Health services such as testing blood pressure, testing diabetes, eyes, HIV and screening for TB were made freely available during this campaign.

The NDoH in collaboration with other health institutions posted their educational campaign on Facebook that was rolled out around the country to educate the public about good healthy lifestyle. During these campaigns the public was encouraged to know their health status by testing for HIV. The department also made various health services freely available to the public such as testing of diabetes, blood pressure, TB screening and HIV testing. These health services were made available to ensure that many people accessed and used them. The Department encouraged the public to do any testing they wished to do and made them aware that treatment is available to people who tested positive for whatever illness based on the testing services mentioned.

5.2.2.2.2 The purpose was to improve health and wellness of people

During the campaign, the Department distributed a variety of health-related services to people to ensure that people all people who are interested to test anything in their bodies get tested for free and got treatment for free. The Department did that to improve health and wellness of people living in townships and in rural areas. Facebook followers reacted to the posted by the NDoH on Facebook. 13 people liked the post, 127 people shared the post, 5 people commented on the post. All people who commented to the posted content supported and appreciated the important job done by the department to ensure that the lives of many people are protected from diseases by making a number of health services freely available to people and encouraged people to participate to HIV testing. Some followers argued that it could be better if the Department every after two months to communities to allow people to do check-ups. "it could be better if the Department could come in those areas every after two months to allow people to do check-up and issue out services to people who needed them" (FF, 23/06/2017).

5.2.2.3 The international AIDS conference by hosted by NDoH

The following themes, sub-themes and categories were taken from the NDoH Facebook page during the international AIDS conference hosted by the Department of Health at Sandton on the 25 July 2018 to educate the public about HIV/AIDS and other health related problems.

- People were encouraged to do HIV testing
- Discussions about stigmatization
- HIV positive people were encouraged to be not shy about their HIV status.

5.2.2.3.1 People were encouraged to do HIV testing

On Facebook the NDoH posted international AIDS conference that was hosted by the Department at Sandton on the 25 July 2018. Series of HIV related issues were discussed during the conference. People were encouraged to test HIV so that they could know their status and HIV positive people were encouraged to use treatment all the time in order to boost their immune system. The Department officials educated the public about the importance of HIV testing, among other things the Department requested everybody to participate to HIV testing and the Department requested the public to refrain from thinking that HIV testing is only done by people who are sick. The Department emphasised that people should participate on HIV testing for themselves and know their own status. Public should to stop thinking that HIV testing is only done by sick people and people should be aware that everyone should get tested for the virus irrespective of their health status, the departmental officials added (NDoH, 25/07/2018)

5.2.2.3.2 Discussions about stigmatization

During the International AIDS conference, the Department also encouraged various social groups to be vocal against stigma. "Stigma is regarded as discrimination characterized by behavioural expressions of prejudice by HIV-negative people directed at PLWHA" (Allport, 1954; Brewer, 2007:7). Discriminating and isolating people due to their sickness is not good and it required robust action by various social groups to end it (NDoH, 25/07/2018). The reviewed literature argued that stigma is a social problem that prevents many people from accessing healthcare services (Earnshaw & Chaudoir, 2009:7). The Department emphasised that stigma is not a departmental problem, it is a national and international problem that requires all government departments, private sectors, civil society groups and people to play their part to curb this problem (NDoH, 25/07/2018).

5.2.2.3.3 HIV positive people were encouraged to be not shy about their HIV status

During the conference, the Department also encourage HIV positive people to be not shy about their HIV status. For being not shy about their status, that would help them to get public support and would also encourage and give confidence to others who are living with the disease. The Department requested HIV positive people to tell their stories about the virus which would motivate those who are new from the virus to be strong and get courage that there is life even beyond HIV (NDoH, 25/07/2018). Facebook followers reacted on the posted content, 20 people shared the post, 15 people liked the post and 10 people commented to the post. Facebook followers argued that these HIV prevention efforts by the Department would help to reduce the spread of HIV. "These HIV prevention efforts would help to reduce the number of infection and related deaths on HIV related illnesses" (F.F, 25/07/2018).

5.2.2.4 World AIDS Day celebration by the NDoH

The following themes, subthemes and categories were taken from the national Department of Health Facebook page during the celebration of the world AIDS day on 01 December 2019.

- Community members should play part in reducing the spread of the virus
- Peer education and networking of people living with HIV was encouraged
- Access to health care facilities and the constant use of medication were also encouraged during the celebration.

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5.2.2.4.1 Community members should play part in reducing the spread of the virus

The national Department of Health discussed a variety of issues during the world AIDS Day celebration that took place around the country on the 01 December 2019. On Facebook the Department appealed community members to participate to the efforts that seek to reduce the spread of HIV/AIDS by also including HIV discussion in their community forums that were established to discuss social related matters.

5.2.2.4.2 Peer education and networking of people living with HIV was also encouraged

The Departmental officials on Facebook also encourage peer education by encouraging young people to educate each other about sexual related issues and HIV prevention issues. During the world AIDS day celebration, people living with HIV/AIDS were encouraged to establish their social networks so that they can talk about HIV and better ways to live with the virus. "Sharing

and exchanging of ideas to find better ways of living with the virus and also helping each other into a variety of issues that would help them to manage the virus" (NDoH, 01/12/2019).

5.2.2.4.3 Access to health care facilities and the constant use of treatment were also encouraged during the celebration

The Department encouraged people to access health care facilities for treatment and check-ups. HIV positive people were encouraged to constantly use HIV treatment which would help them to remain strong and live healthy life with the virus. HIV treatment is important in reducing the spread of the virus and further transmission to other people (WHO, 2016).

Facebook followers reacted. 10 people liked the post, 7 people shared the post. All Facebook followers supported the HIV prevention initiatives by the Department of Health by commending the good job done by the department by encouraging communities to play part into the efforts to reduce the spread of HIV/AIDS. Facebook followers argued that these efforts would enable many people to get tested for HIV and also enable many people to access treatment for the virus (F.F, 01/12/2019).

5.2.2.5 The launch of the new HIV treatment by Minister of Health

The following themes, sub-themes and categories were extracted from the NDoH Facebook page during the launch of HIV treatment on the 27 November 2019 by the Minister of Health at Umthwalume under Umzumbe Local Municipality.

- Antiretroviral treatment such Tenofovir, lamivudine and Dolutegravir (TLD) were officially launched by Minister of health at Umzumbe Local Municipality.
- The use of the nearest health care facilities to access treatment was also encouraged during the launch.

5.2.2.5.1 Antiretroviral treatment such Tenofovir, lamivudine and Dolutegravir (TLD) were officially launched by Minister of health at Umzumbe Local Municipality.

Minister of Health Dr Zweli Mkhize launched the new Antiretroviral treatment on the 27 November 2019 at Esibanini Sports Grounds, Umthwalume under Umzumbe Local Municipality. ARV's such as Tenofovir, lamivudine and Dolutegravir (TLD) were officially launched to benefit HIV positive people and to prevent the spread of the virus in the area of Umthwalume.

5.2.2.5.2 The use of the nearest health care facilities to access treatment was also encouraged.

The Minister encouraged Umthwalume residences to use their nearest health care facilities to access treatment. The treatment would help community members to remain strong from the virus by boosting the immune system and to reduce the number of infections and related deaths on HIV related illnesses. HIV treatment is important in reducing the load of the virus to improve wellness of people living with HIV/AIDS (Attia *et al*, 2009). Majority of people who commented applauded the important efforts done by the department of bringing health services to communities. Some Facebook followers requested the department to build health services in rural areas to avoid travelling of long distances for health services (F.F, 27/11/2019).

5.2.2.6 The distribution of ARV's and other HIV prevention services to the institutions of higher learning in the fight of HIV.

The following themes, sub-themes and categories were extracted from the NDoH Facebook page on the 27 June 2019 when encouraging health care facilities to distribute antiretroviral treatment and other HIV prevention services to the institutions of higher learning in the fight against the spread of HIV.

- The distribution of antiretroviral treatment and other HIV prevention methods such as condoms, PrEP etc were encouraged to the institutions of higher learning.
- Educational campaigns to educate people about HIV/AIDS should be tightened in the institutions of higher learning.
- To save lives of many people from HIV and to ensure immediate access of HIV positive people to treatment.

5.2.2.6.1 The distribution of ARV's and other HIV prevention methods such as condoms, PrEP etc were encouraged to the institutions of higher learning

The NDoH in collaboration with the Department of Higher Education on its Facebook page encouraged health care facilities to distribute Antiretroviral treatment and other HIV services to the institutions of higher learning. These Departments embarked on these efforts to ensure that the life of HIV positive people at the institutions of higher learning is taken care of. These Departments encouraged this service to all South African tertiary institutions in order to save lives of many people to immediately access health services. The department also encouraged the rolling out of more educational campaigns to educate the public about the virus. Other HIV prevention methods such as HIV testing, PrEP, condoms, VMMC were also encouraged to be

available in all South African Universities only to students who are above 18 years of age who can access them.

5.2.2.6.2 Educational campaigns to educate people about HIV/AIDS should be tightened in the institutions of higher learning

The national Department of health also encouraged the strengthening of campaigns on HIV prevention. The Department was based on the idea that the aim of strengthening these campaigns was to reduce the spread of HIV/AIDS in the institutions of higher learning and to reduce the related deaths on HIV related illnesses. Tightening these campaigns in the institutions of higher learning would help students to be sexually responsible and to prevent the spread of the virus.

5.2.2.6.3 Saving lives of many people from HIV and to ensure immediate access of HIV positive people to treatment

The department encouraged these HIV prevention efforts in the institutions of higher learning to save lives of many people from contracting the virus. This is also done to ensure that health services are easily available to students in order to save their time of travelling to other health care facilities that are outside of the institution. Facebook followers reacted to the content posted by Department of health when encouraging the distribution of Antiretroviral treatment in the institution of higher learning and encouraging the strengthening of educational campaigns in the institutions of higher learning. 45 people liked the post, 23 people shared the post and 3 people commented. "The distribution of health services to the institutions of higher learning would help to encourage access to health care services by many people and would also help to save time that could be waisted in going to health care facilities outside school" Facebook follower said (F.F, 27/06/2019).

5.2.2.7 Annual Rotary Family Health Day

The following themes, sub-themes and categories were taken from the NDoH Facebook page when the Department in collaboration with other stakeholders hosted the Annual Rotary Family Health Day on 02 October 2017.

• Different health services were brought to people living in remote areas on that day.

• Improve health and livelihood of people living in remote areas by bringing health care services to communities.

5.2.2.7.1 Different health services were brought to people living in remote areas on that day

The NDoH in collaboration with the Rotarians For Family Health & AIDS Prevention (RFHA) and the gift of the givers hosted the Annual Rotary Family Health Day on 02 October 2017 to encourage access to health care services by people living in areas away from the towns at Kgomo Local Municipality, Sekhukhune District at Limpopo province. The Department embarked on these initiatives because some of the areas that are far from the cities do not have access to health care facilities for medical services (NDoH, 2017). Various HIV prevention services such HIV counselling and testing, cancer screening, distribution of sanitary towels etc were brought to the public. The public was encouraged to use that opportunity of accessing such services because these services were distributed for free.

5.2.2.7.2 Improve health and livelihood of people living in remote areas by bringing health care services to communities

The Department of health brough various health services to people living in areas that are far from the town. This was done to improve lives of people living in those areas, because there is a shortage of health care facilities in most rural are and that makes the lives of people living in in such areas difficult. People who needed various health care services varying from cancer screening, HIV prevention and treatment would benefit in those services. Facebook followers reacted to the posted content. 13 people liked the post, 10 people commented and 33 people shared the post. Facebook followers expressed their support to the good job done by the Department by bringing health services to communities as it would help to save lives of many people who needed those services. "Government should build health facilities to communities, because the shortage of health care facilities is the challenge facing communities", the Facebook follower said (02/10/2017).

5.2.2.8 National Department of Health Facebook when South African government delivering the State of The Nation Address (SONA)

The following themes, sub-themes and categories were taken from the national Department of Health Facebook pages when South African government delivering the State of The Nation Address (SONA) on the 09th February 2017 into the parliament of South Africa.

- The health department promised to work with communities to meet 90-90-90 2020 UNAIDS target.
- The department of health promised to partner with communities to improve availability
 of health services to communities.
- Different health care services should be taken to communities

5.2.2.8.1 The health department promised to work with communities to meet 90-90-90 2020 UNAIDS target

The NDoH on Facebook page posted some key issues around health that the department promised to the country during the delivery of the State of the Nation Address (SONA) on the 09 February 2017. The department promised to meet 90-90-90 target and this could be done by incorporating communities on the efforts to fight HIV/AIDS. In communities the department wanted to ensure that 90% of people know their HIV status, 90% of people receive antiretroviral treatment and 90% of people receiving treatment are viral suppressed. These efforts should be done to ensure a speedily reduction of HIV/AIDS in communities.

5.2.2.8.2 The department of health promised to partner with communities to improve availability of health services to communities

During the State of the Nation Address (SONA) delivery, the department of health promised to partner with communities through community health care workers to improve service delivery in communities. To ensure the reality of this partnership, the department on its Facebook page argued that health care workers are people who know the health needs of their communities, then it would be easy for the department to work with health care workers in order to ensure quick access of health services to communities (NDoH, 2017).

5.2.2.8.3 Different health care services should be taken to communities

The department also promised to take services to communities. Doors are open for community health care workers to come to the department of health at any time to request whatever health service they needed for their communities; it would be made available. All these efforts were done to ensure that health services are taken to communities. Facebook followers reacted on Facebook when the department promised to collaborate to work with communities to ensure quick access of service delivery to communities. 6 people liked the post, 21 people shared the post and there were no comments.

5.2.2.9 The 19th South African AIDS Conference at Durban ICC

The following themes, sub-themes and categories were taken from the national Department of Health Facebook page when hosted the 9th SA AIDS Conference on the 11 June 2019 that was based on finding the new innovative ways to fight the spread of HIV/AIDS in SA.

- The unprecedented, innovation and technologies: HIV and Change.
- The use of creative and innovative ways to fight the spread of HIV/AIDS in South Africa

5.2.2.9.1 The unprecedented, innovation and technologies: HIV and change

The NDoH in collaboration with other health organisations hosted a 9th SA AIDS Conference on the 11 of June 2019 at the Durban International Convention Centre (ICC) under the theme: unprecedent, innovation and technology: HIV and change. The basic purpose of the conference was to discuss new ways that would help to reduce the spread of HIV/AIDS. The government spoke of the fourth industrial revolution (4IR) which is evident by the extensive use of technology, may be the introduction of 4IR would come up with the new creative ways that would help the government to manage HIV/AIDS.

5.2.2.9.2 The use of creative and innovative ways to fight the spread of HIV/AIDS in South Africa

During the conference, the national Department of health requested all creative thinkers to use their creative skills to find new ways that would help in fighting HIV/AIDS. Young people were encouraged to use their innovation to come up with the new ways that would help to detect the virus. Scientists were also encouraged to use their science to come up with their innovative ways that would help SA to manage the virus.

Facebook followers reacted to the posted content when government encouraged the new innovative ways during the 09th SA AIDS conference. 12 people commented, 20 people liked the post and 25 people shared the post. Facebook followers supported the efforts by government of finding the more innovative ways in the fight against HIV/AIDS. Most Facebook followers were based on the idea that this would give young people a chance to express and showcase their innovation in the fight against HIV/AIDS (F.F,11/06/2019).

5.2.3 The overview of the presentation of findings

The researcher found that AFSA and NDoH promoted HIV testing and prevention in their Facebook pages to prevent the spread of the virus. This was found when the researcher collected and analysed all HIV testing and prevention posts, that were posted by these two organisations on their Facebook pages between September 2016 and December 2019 after the release of Universal Test and Treat policy in 2016. On their Facebook pages these two health organisations encouraged South Africans to get tested for HIV/AIDS so that they could be aware of their HIV status. They also encouraged negative people to maintain their HIV negative status by rolling out more educational campaigns to educate the public about a responsible sexual behaviour and encouraged the use of other HIV prevention methods such as condoms, pre-exposure prophylaxis, medical male circumcision and abstinence that would help to reduce the spread of HIV/AIDS.

These two health institutions, in their HIV prevention programmes also raised awareness on some of the things that could contribute to the increase of HIV/AIDS including but not limited to drugs and alcohol abuse, poverty, gender-based violence, forced marriage, transactional relationships etc. These organisations also raised awareness about stigma which is the global problem that prevent people from accessing health care services such as ARV's etc. The researcher created a coding sheet for both AFSA and NDoH to code all their Facebook posts on HIV prevention and testing that were taken between 2016 and 2019. 11 posts from the AIDS Foundation of South Africa were analysed and grouped into categories and themes and were discussed to give meaning and understanding into the study. 9 posts from the national Department of Health were analysed and grouped into themes and categories and were further discussed to give meaning into the study.

5.2.4 Comparative analysis of NDoH and AFSA Facebook pages in relation to UTT

The Universal Test and Treat (UTT) policy in supporting the UNAIDS efforts of reducing HIV/AIDS suggests that everyone should test HIV. People who tested HIV positive should be immediately taken to health care facilities for medication and negative people are encouraged to maintain their status (WHO, 2016). HIV negative people are also encouraged to use other HIV prevention methods such as PrEP, VMMC, ABC and condom (WHO, 2016). The national Department of Health (NDoH) as one of the key Department dealing with all health-related matters keep posting various health issues on Facebook to improve wellness of people. NDoH also promotes UTT policy on Facebook by encouraging people to know their HIV status and encouraged them to participate on HIV testing by introducing variety of testing services and

made HIV testing services freely available. The NDoH officials also promoted the constant use of medication which helps to reduce the load of the virus and make people strong from the virus (WHO, 2016). The NDoH also suggested other HIV prevention methods such as PrEP, abstinence, condom use etc to ensure that HIV negative people maintain their HIV status.

AIDS Foundation of South Africa (AFSA) as one of the key health organisations in South Africa further promotes UTT on Facebook by encouraging people to get tested for HIV, the promotion of safer sex practice and the frequent use of treatment. The AFSA's priority programmes areas are based on HIV education, the promotion of HIV testing, VMMC, PrEP, and the condom usage. AFSA on its Facebook page promotes UTT by visiting different villages around KwaZulu Natal Province to encourage people to undergo HIV testing, young boys and men were encouraged to participate on medical male circumcision, the organisation also educated the public about PrEP and its use in preventing the spread of the virus. AFSA on its HIV prevention programmes also distributed condoms in public places for people to access them. On Facebook AFSA also posted some factors that could lead to the rise of HIV and that can prevent the effectiveness of UTT policy and these factors are: drugs, alcohol abuse, GBV, early and forced marriage and stigmatization and these factors can increase the number of HIV infections and related deaths.

The NDoH and AFSA online programmes do promote HIV prevention and treatment, for example the Minister of Health launched new antiretroviral treatment such as Tenofovir, lamivudine and Dolutegravir (TLD) on the 27 November 2019 in other parts of KwaZulu Natal Province to increase the number of people accessing HIV treatment. AFSA on the other side embarked on HIV prevention campaign by visiting many areas in KwaZulu Natal such as Umlazi, uMgungundlovu, KwaMashu etc to urge people to test for HIV/AIDS and also encouraged young boys and men to participate to medical male circumcision. Facebook as a communication platform can also be utilized to increase exposure, discussion and dialogue on UTT policy in such a way that both NDoH and AFSA have to streamline their HIV prevention efforts by posting their monthly target based on the number of people who tested and received treatment for HIV/AIDS. On their Facebook pages they must also provide provinces or villages they planned to test. Then at the end of the month they had to show the percent of the entire population that was tested for HIV/AIDS in each province/area as per their target. Then on their Facebook page, they could show the percentage of people who tested positive in such provinces/areas and the percentage of people who tested negative. These percentages would help them to identify areas that are the hotspots for HIV/AIDS so that it becomes easy for them (NDoH & AFSA) and other health institutions to strengthen their HIV prevention efforts in those areas.

5.3 Data Analysis

Data analysis is based on giving understanding by interpreting all information provided by respondents or interpreting information coming from other sources of information in order give understanding to the issue being investigated (Creswell, 2009). Data analysis also helps to clarify and discuss the collected data into details (Adèr & Mellenbergh, 2008:15). The researcher analysed data in the context of research questions. The findings for the study are discussed and analysed below.

5.3.1 Key messages and plans of UTT in South Africa

Universal Test and Treat policy support 90-90-90 target of the Joint United Nations Programme on HIV/AIDS. The policy also supports voluntary counselling and testing (VCT), voluntary medical male circumcision (VMMC), Pre-exposure prophylaxis (PrEP), Abstain be faithful and condomise (ABC). The introduction of UTT policy played an important role in reducing HIV infections and in reducing the number of mortalities on HIV related illnesses. HIV related death in 2002 was 35.1 percent and in 2019 was 23.4 percent (stats SA, 2019). The infant mortality rate on HIV related illnesses was 56.5 death per 1000 lives in 2002 and 22.1 infant death in 2019. Findings show that the HIV infection decreased severely from 2002 to 2019. This means the HIV prevention methods including the introduction of UTT policy were effective in reducing the spread of the virus. The recommendation of UTT policy played an important role in reducing the spread of HIV/AIDS in South Africa and around the globe. This evident by the increased number of HIV testing centre including the introduction of mobile clinics and self-testing services, the access to HIV medication regardless of CD4 count, the high availability of condoms in public areas, the introduction of pre-exposure prophylaxis for negative people who are at risk contracting the virus etc. These efforts were done by WHO, UNAIDS and the NDoH to ensure that by 2020, 90% of people who are HIV positive know their status, 90% of people who know their status access Antiretroviral treatment and 90% of those who accessing treatment are viral suppressed (WHO, 2016). Although the recommendation of UTT policy with its HIV prevention package seem to be effective in controlling the spread of the virus, WHO argues that only few methods that can be proven to prevent HIV infection (WHO, 2016).

key messages developed by the NDoH to ensure implementation of the UTT policy.

The spread of HIV in South Africa and around the globe prompted the National Department of Health to take further actions to prevent the spread of the virus. During the outbreak of HIV/AIDS, there was a shortage of equipment's and facilities to prevent the spread of the virus. The shortage of health care facilities and equipment's has resulted to the alarming increase of HIV/AIDS (WHO, 2016). The shortage of health care facilities and equipment's resulted government to impose some restrictions on HIV testing and access to treatment (NDoH, 2014). For example, HIV treatment was made available to certain individuals and this resulted to the increase of HIV/AIDS in South Africa. To reduce the increase of HIV/AIDS in South Africa and around the globe, South African government took some steps to ensure that all HIV positive and negative people are considered to prevent the spread and further transmission of the disease to others. As precautional measure to prevent the spread of the virus, in 2015 the National Department of Health (NDoH) and World Health Organisation (WHO) recommended the Universal Test and Treat Policy with some guidelines (WHO, 2015). To ensure implementation of UTT policy, the national department of health provided further directive to initiate Antiretroviral Therapy (ART) on the day that a person has been diagnosed HIV positive in September 2017 (WHO, 2017). The department conducted a qualitative research study to examine health providers perspectives on the implementation of the same-day-initiation (SDI) policy. The national department of health reviewed the policy in 2017 and provided some revision on HIV testing by ensuring that HIV testing and counselling information is available in all platforms both electronic and written documents (Church et al., 2017). Government also tightened trainings of health care workers to ensure that they gained necessary skills in order to exercise their duties. In 2015 World Health Organisation (WHO), recommended retesting of all people who tested either positive or negative in order to verify their testing results (WHO, 2015). The department of health also encouraged community delivery of Antiretroviral treatment to ensure that every HIV patient has access to treatment wherever they are around the country. The national department of health has also adopted method of tracking patients who are defaulting treatment under the strategy called "lost to follow-up" by tracking patients who fail to collect ARV's on the stipulated dates as per their agreement with health care workers or health institutions (WHO, 2017).

5.3.2 HIV testing and prevention

In the past there were difficulties to test and prevent HIV. There were few HIV testing centres that were available to test people so that they could be aware of their HIV status in order to

prevent the spread of the virus (Morin *et al.* 2006:221:88). The shortage of HIV testing centres increased the number of HIV infections and related death because many people did not know their HIV status and keep transmitting and spreading the virus to other people (Hutchinson & Mahlalela, 2006; MacPhail *et al.*, 2009). In the past HIV testing was only done to people who were very sick and that was increasing the number of deaths on HIV related illnesses because people were only tested when they were severely sick, and once they tested HIV positive, they were given treatment which became ineffective in most of the time because the immune system that prevent people from catching viruses was already attacked by the virus and that resulted to death (Hutchinson & Mahlalela, 2006; MacPhail *et al.*, 2009). Some researchers in South Africa exploring the unwillingness of people for HIV testing indicate that majority of people were unwilling to participate to HIV testing due to the shortage of HIV medication (Pettifor *et al.*, 2010).

When UTT policy was declared around the world in 2015 and became effective in South Africa in 2016, there were changes that took place on HIV testing and prevention. HIV testing services were expanded and were made available in many health care facilities in South Africa and around the world (WHO, 2016). Community testing centres and mobile clinics were introduced to scale up testing (WHO, 2016). These testing centres helped many people to test HIV/AIDS due to the convenient and accessible testing centres. There was an introduction of home-based HIV testing and self-testing kit to ensure that people test themselves anywhere at any time (WHO, 2016:103). HIV testing services were also improved by expanding testing services through introduction of mobile clinics that helped health care workers to visit communities to urge community members to test HIV/AIDS (NDoH, 2016).

5.3.3 HIV Treatment

HIV treatment is important in reducing the load of virus from one's body which helps to prevent the spread of the virus (Attia *et al*, 2009). During the outbreak of HIV/AIDS in South Africa and around the world, Antiretroviral treatment was made available to certain group of people, not to everyone who was HIV positive (Lawn *et al.*, 2008). Shortage of information about antiretroviral treatment and the cost of purchasing the treatment were also regarded as barriers to access the treatment (Posse & colleagues, 2008). Access to health care facilities for HIV treatment and stigmatization were amongst to barriers that prevented many people to get treatment (Posse *et al.*, 2008:211). According to the guidelines of World Health Organization, HIV patients who had CD4 count that was below 200 copies/mm3 were not eligible to access and use Antiretroviral treatment (MOH, 2005b; WHO, 2004). That process of selecting and

identifying people who were eligible for treatment resulted to the alarming increase of HIV and related deaths (MOH, 2005b; WHO, 2004). According to WHO guidelines, antiretroviral treatment was made available only to people who were very sick and required urgent attention (WHO, 2009; Zachariah *et al.*, 2006).

The World Health Organisation in 2013 released a document with guidelines that sought to save lives of many people who are HIV positive and to monitor their adherence to medication. Amongst to other things was the regardless of CD4 count during the distribution of treatment to all HIV positive people, all tuberculosis (TB) patients were advised to access Antiretroviral treatment, pregnant and breast-feeding women that were diagnosed HIV positive were advised to start Antiretroviral treatment with 7 days when they were fit to use medication (WHO, 2013). Patients with CD4 count that was above 350 cells and who were not ready to start using treatment, were taken to wellness programmes and constantly do CD4 testing for 6 times per month and they were also advised on how to prevent the spread of the virus from their partners and to their children (WHO, 2013). There were changes in the access and the use of HIV treatment.

During the distribution of HIV treatment to ensure that all HIV positive people are accessible to treatment, health officials noticed that some HIV positive people were not using medication to treat the virus, then there were alternatives that were recommended to ensure that they accessed and use treatment, therefore Directly Observed Therapy (DOT) was introduced in order to monitor and ensure that HIV positive people use HIV treatment on a regular basis (Gaur *et al* 2010; Garvie *et al* 2011;). The UTT policy in support of the UNAIDS target brought some changes in accessing HIV treatment and medication. Antiretroviral treatment was made available to all HIV positive people irrespective of their CD4 count and in addition HIV medication was made available immediately to people who tested positive for HIV under the process called same day initiation (SDI) which came into effect on the 1 September 2017 (UNAIDS, 2017). Antiretroviral treatment started to be delivered to communities outside of health care facilities to ensure that every HIV patient is accessible to treatment (WHO, 2016).

The World Health Organisation estimated that more than 18 million people were having access to Antiretroviral treatment in the mid of 2016 and the price of Antiretroviral treatment was reduced significantly (WHO, 2016). The study that was conducted in South Africa to explore the effectiveness of Antiretroviral treatment in serodiscordant relationship argues that the early use of Antiretroviral treatment by one of the HIV positive partners in serodiscordant

relationship can reduce the HIV infection by 96% (Cohen *et al.*, 2011). The NDoH in collaboration with the WHO ensured that HIV positive people were viral suppressed. *Tenofovir disoproxil fumarate plus lamivudine* (TDF/3TC) is the first line Antiretroviral medication that was introduced to be used by young, adults and pregnant women to improve wellness and to reduce the load of virus (DoH, 2016). Dolutegravir (DTG) was declared in 2018 as the first line antiretroviral regimen to be used by all people living with HIV/AIDS (DoH, 2016). The UTT policy also supported guidelines that seek to prevent the transmission of HIV from mother to child (PMTCT). Findings show that 4104 healthcare facilities that provide services to prevent the transmission of HIV from mother to child (PMTCT) were established to provide all HIV related services that help to prevent the spread of virus from mother to child (DoH, 2016). The wellness of pregnant and breastfeeding women who were HIV positive was also incorporated during the establishment of the policy. Findings indicate that WHO suggested that all HIV breastfeeding and pregnant women should start using antiretroviral treatment irrespective of their immunological stage (Option B+) (WHO, 2016).

In addition, all HIV breastfeeding mothers were advised to keep their triple ART with a viral load check-up and monitoring that would take place every after six months during their period of feeding (WHO, 2016). During that period these mothers would be provided with all the necessary support they needed including but not limited to counselling during the time of breastfeeding following the provision of food parcels for the period of 24 months, monitoring their use of HIV treatment and ultimately checking their load of virus on a regular basis (WHO, 2016). AFSA and NDoH in their Facebook pages promote UTT policy by rolling out various educational programmes in different provinces to educate people about HIV/AIDS, urging community members to do HIV testing, and urging them to constantly use HIV medication in order to prevent the spread of the virus.

5.3.4 Condom usage

During the outbreak of HIV/AIDS in South Africa and around the world condom was the most effective method used to prevent the spread of the virus (MacPhal & Campbell, 2001). It was regarded as cost effective and useful to prevent HIV infection by 80% if properly used (Weller & Davis, 2002; Catie, 2013; Roger, 2016). Condom use prevents family planning and other sexual transmitted infections (Grau *et al*, 2010). Some researchers argue that many people became reluctant in using condom claiming that there is lack of sexual pleasure and can also breaks during sexual engagement (Tschann *et al.*, 2010; R. Zhao *et al.*, 2008).

The shortcomings associated to the use of condom enabled other people to alternate the condom use by PrEP. "Condoms play the main role in long term romantic affiliations in curbing the spread of the virus, although consistent condom use continues to be a problem in various relationship and that encourage many people to adopt and make the use of pre-exposure prophylaxis as HIV prevention method in the absence of condom" (Brady *et al*, 2013:3). Many people started to use PrEP as an alternative for condom usage (Youle & Wainberg, 2003:102–103). Pre-exposure prophylaxis is the antiretroviral treatment (ARV's) created to be used by people that are exposed to HIV and that can be infected by the virus (WHO, 2016). PrEP was created to support condom usage in such a way that people who were not willing to use condom can use PrEP to prevent HIV and its transmission to others (Youle & Wainberg, 2003:102–103). AFSA and NDoH on Facebook encouraged the public to use condom and PrEP and these institutions in their Facebook pages made it clear that PrEP do not prevent other sexual transmitted diseases.

5.3.5 Facebook use by AFSA to promote HIV testing and prevention from 2016 to 2019 following the release of UTT policy

AIDS Foundation of South Africa posted a series of programmes to promote HIV testing and prevention. These programmes including but not limited to promoting HIV testing, prevention and treatment, medical male circumcision, condom use, the use of pre-exposure prophylaxis etc. AFSA on its Facebook page also raised awareness about the drivers of HIV/AIDS and actions that people can take to respond to such drivers.

5.4 Conclusion

This chapter analysed and interpreted all the collected data. This chapter used thematic data analysis to break down themes and categories and further discussed them to give understanding into the study. This chapter also provided discussion for the study. This chapter also presented and discussed findings from the collected data in order to give understanding about the effectiveness of social media platforms in disseminating of health-related messages. The next chapter presents conclusion drawn from the findings and provide recommendations for the study.

CHAPTER SIX

CONCLUSION AND RECOMMENDATIONS

6.1 Introduction

The previous chapter presented, analysed and discussed the findings of this study within the context of the current literature. Conclusions which were drawn from the findings are presented in the current chapter, as well as the recommendations.

6.2 Conclusions

This study sought to analyse the HIV prevention messages communicated through on social media by AIDS Foundation of South Africa following the release of universal test and treat policy in 2016 and ways in which AFSA messages reflect the national Department of Health prevention and testing messages. The literature review examined health communication, social media use for health communication, the use of social media for HIV prevention and treatment, the use of social media by health organisations to promote HIV prevention and testing, the importance of HIV testing and prevention and discussed other HIV prevention methods such as pre-exposure prophylaxis for HIV prevention, voluntary medical male circumcision for HIV prevention, ABC programmes for HIV prevention, the importance of Universal Test and Treat policy for HIV prevention. Research methods that were used for the study including research design, the research approach which is qualitative research approach, the use of qualitative content analysis for data collection and analysis. As discussed earlier, qualitative content analysis method was adopted. The data from AFSA's and NDoH's Facebook pages were presented and further analysed.

The research population was all social media platforms of health organisations. The non-probability purposive sampling method was chosen and used for the study to purposely select posts that were posted by AFSA and NDoH on HIV testing and prevention between September 2016 and December 2019, Facebook followers who reacted to the posted content on HIV testing and prevention by those two organisations between September 2016 and December 2017 were also considered during the analysis. The study was located within the effectiveness of social media platforms by AFSA and NDoH in promoting HIV testing and prevention and the public response on HIV prevention and testing messages posted by these two organisations. The key findings of the study indicated that AFSA and NDoH online programmes promote HIV prevention and testing and the Facebook followers support the HIV prevention efforts by these two health institutions. Facebook was the basic source of information to communicate

HIV prevention and testing programmes and social media comments also played important role to obtain an in-depth understanding about the effectiveness of social media for HIV testing and prevention.

The findings from these two health institutions in their HIV testing and prevention efforts also indicate that their Facebook programmes were not only promoting HIV prevention and testing but also raised awareness on factors that could contribute to the rise of HIV/AIDS and some interventions that could be made to minimize those factors.

The collected data was analysed through the use of thematic analysis. Themes that were emerged from the AFSA's and NDoH's Facebook pages in their efforts of promoting HIV testing and prevention were analysed. The public comments of the AFSA's and NDoH's Facebook followers were also analysed. This research study has added to the growing body of the literature and other studies that were previously published on the use of social media platforms for HIV prevention and testing. The data from the qualitative content analysis provided evidence about the effectiveness of social media use for HIV prevention and testing. The researcher found that AFSA and NDoH do promote HIV testing and prevention in their online programmes. However, the issue of stigma, shortage of health care facilities in other parts of South Africa are the challenges facing by South Africans who would like to access HIV prevention services.

6.3 Recommendations

The researcher recommends that AFSA and NDoH officials could be better if they could also provide videos on their Facebook pages when facilitating and distributing their HIV prevention services to the general public so that their work can also be seen in the form of videos not only into written content. AFSA and NDoH should also put more efforts in the fight against discrimination or stigmatization that is directed to HIV positive people around the globe. Stigma greatly affect both HIV positive and negative people in different ways. HIV positive people are greatly affected by stigma by being discriminated when they visited health institutions for treatment and other HIV prevention services and that public reaction makes them reluctant to attend health care facilities to access HIV treatment. Stigma also affect people who would like to undergo HIV testing to become unwilling for testing due to the fear of public reaction once they tested positive. Stigma also affect HIV negative people who would like to go to hospitals for HIV prevention services such as pre-exposure prophylaxis etc. They feared that when they visited health facilities to access PrEP, people would think that those people

were there to collect ARV's for HIV positive people and believe that they are HIV positive, then they start receiving unfair treatment which is constantly experienced by HIV positive people. In order to fight stigma more educational campaigns need to be further rolled out in South Africa by various organisations both government and private sectors. Health institutions seem to be contributing to the increase of stigma in such a way that, in hospitals especially in public hospitals there are queues that separate HIV positive patients to other patients who are in hospital for other sicknesses, that separation of patients based on their nature of sickness is the beginning of stigmatization. All patients should be treated the same irrespective of their nature of their sickness, queuing in the same line so that all patients are equal and receive the same treatment like others regardless of their illnesses. The researcher also recommends that the national Department of Health as the key department on health issues should keep encouraging other health sectors to promote guidelines around Universal Test and Treat policy by using various communication channels because this policy is still new and many people are still not aware about the policy and its guidelines, then it would be better if all South Africans would know the policy and understand what the policy entails.

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APPENDICE: ETHICAL CLEARANCE CERTIFICATE