

**RISK BEHAVIOURS OF YOUTHS  
THAT EXPOSE THEM TO CONTRACTING SEXUALLY TRANSMITTED INFECTIONS  
INCLUDING HIV AND AIDS IN TWO SELECTED PRIMARY HEALTHCARE CLINICS  
IN MPUMALANGA**

**by**

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**in the**

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Faculty of Health Science  
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## DECLARATION

I, Edith Balatieng Makua, hereby declare that the study entitled *RISK BEHAVIOURS OF YOUTHS THAT EXPOSE THEM TO CONTRACTING SEXUALLY TRANSMITTED INFECTIONS, INCLUDING HIV AND AIDS IN THE SELECTED PRIMARY HEALTHCARE CLINICS IN MPUMALANGA* is my own work and that all the sources that I have used or quoted have been indicated and acknowledged by means of complete references. I further declare that this work has not been submitted for any other degree at any other institution.

Edith Balatieng Makua

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**SIGNATURE**

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**DATE**

## ACKNOWLEDGEMENTS

*What is impossible for man, is possible with God. I thank the Almighty who took me from a vacuum and brought me to where things are happening; for giving me strength when I was falling and comforting me throughout my study years.*

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## ABSTRACT

Sexually Transmitted Infections and HIV and AIDS are one of the biggest global health challenges that cause mortality. Mpumalanga province is one of the province **that are** also challenged by the prevalence of STIs including HIV and AIDS among youths that is why the researcher was prompted to do the study about the risk behaviours that are affecting youth to expose them to contract STIs including HIV and AIDS. Living a healthy lifestyle is a matter of choice. Living a healthy sexual lifestyle should also be a matter of choice. Unfortunately, among the youth in South Africa it seems as if there are obstacles in the way to make the choice to live a safe and healthy sexual lifestyle.

The purpose of this quantitative study was to identify and describe the risk behaviours of youths which can lead to them contracting STIs including HIV and AIDS. It was conducted with 195 respondents who visited two healthcare clinics in Mpumalanga, South Africa.

The study was descriptive, non-experimental and contextual in design. Results revealed that youths are presenting with STIs such as gonorrhoea, syphilis, chancroid and HIV and AIDS; therefore, there is a need to have a strategy to intervene to minimise the spread among youths and to give a support to those who are already infected in the Mpumalanga province.

The population for this study was youths between the ages of 18 years to 24 years and the criteria used for the selection of this study was to include only youths who can read or write English or isiZulu and those who are not under psychiatric treatment; therefore, the researcher in this regard complied with the criteria.

The pilot study was conducted from the two primary health care clinics prior to test the feasibility of the instrument before the main research study. The respondents who took part during pilot studying were not included in the main study. The data was collected by means of a self-administered data collection instrument and out of 200 respondents, 195 respondents completed the forms and five were returned incomplete. Data analysis was done by the statistician in the University of Pretoria using the statistical package for the social sciences (SPSS).

The findings for this study reported that the majority of respondents were sexually active with n=162 (83.1%) in table 4.11 and that youths are also involved in risk behaviours of taking drugs when socializing. There is also a prevalence of alcohol and, table 4.15 show that n=41(21%) of respondents reported that they never used a condom as a protective measure. Therefore these youth are at the risk of contracting STIs including HIV and AIDS.

Voluntary counselling and testing programmes need to be strengthened by the programme managers for its effectiveness to empower youths about the information regarding the reproductive system, and to eliminate the information gap among youths. Youths know about the STI infections, but the preventive measures are still a problem as there is no consistency and they do not comply regarding condom use. Youths still need more support and encouragement to go for voluntary counselling and testing for HIV.

### **KEY CONCEPTS**

Youths, risk behaviours; STIs including HIV and AIDS; barriers; perceived susceptibility; perceived severities; perceived self-efficacy.

## ABSTRAK

Die doel van hierdie projek was om risiko gedrag wat na die kontrakisie van STIs, MIV en Vigs insluitend, te identifiseer en beskryf. Dit is met 195 respondente gedoen, wat die twee gesondheidsorg klinieke in Mpumalanga Provinsie besoek.

Die studie was beskrywend, nie-eksperimenteel nie en het 'n kontekstuele ontwerp. Die resultate wys dat die jeug bied aan met seksueel oordragbare siektes soos gonorree, sifilis, sjankroïed en MIV en Vigs; Dus, daar is 'n behoefte om 'n strategie te ontwikkel om die verspreiding tussen die jeug te verminder en ondersteuning aan diegene wat reeds in die Mpumalanga provinsie besmet is te gee.

Die bevolking van hierdie studie is jongmense tussen die ouderdom van 18 jare tot 24 jare en die kriteria wat gebruik is om dié jongmense te kies is hulle moet óf engels of isiZulu kan lees en praat en is nie onder psigiatriese behandeling nie; Dus die navorser het met die kriteria voldoen.

Die loodsstudie is uitgevoer van die twee primêre gesondheidsorg klinieke, voor die hoofstudie, om die haalbaarheid van die instrument te toets. Dié wat in die loodsstudie deelgeneem het, is nie in die hoofstudie ingesluit. Die data is deur middel van 'n self-gedadministreer dataversamelingsinstrument ingesamel en, uit 200 respondente, 195 respondente het die vorm voltooi terwyl 5 die vorm onvolledig teruggebring. Data-analise is deur die Universiteit van Pretoria se statistikus, met die help van die statistiese pakket vir sosiale wetenskappe (SPSS), gedoen.

Die bevindinge van hierdie studie berig dat die meerderheid van die respondente was seksueel aktief met  $n=162$  (83.1%) en dat jeugdige is ook betrokke in die risiko gedrag van dwelms te gebruik terwyl hulle kuier. Daar is ook 'n voorkoms van alkohol en  $n=41$ (21%) van die respondente het gerapporteer dat hulle nog nooit 'n kondoom gebruik as 'n beskermende maatreël nie. Daarom, hierdie jeug is by die risiko van seksueel oordraagbare siektes, insluitend MIV en vigs.

Vrywillige berading en toetsing programme moet versterk word deur die program bestuurders sodat dit doeltreffend kan wees en die jeug bemagtig met inligting oor die voortplantingstelsel. In hierdie manier sal die gaping van inligting, verminder word.

Jeugdige weet oor die STI infeksies, maar die voorkomende maatreëls is nog steeds 'n probleem, want daar is geen konsekwentheid en ten opsigte van die gebruik van kondome,

hulle gebruik dit eenvoudig nie. Die jeug het nog steeds ondersteuning en aanmoediging nodig het om vir vrywillige berading en toetsing te gaan.

## **KERNKONSEPTE**

Jeugdige, risiko gedrag, Seksueel oordraagbare siektes, insluitend MIV en vigs; hindernisse; beskouende vatbaarheid; waargeneem ernstige toestande; beskouende selfdoeltreffendheid.



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## LIST OF ABRIVIATIONS

i. Abstinence, be faithful, Condomise	ABC
ii. Acquired deficiency syndrome	AIDS
iii. Australian medical association	AMA
iv. Averting HIV and AIDS	AVERT
v. Department of Basic Education	DBE
vi. Department of Health	DOH
vii. Human immuno virus	HIV
Viii. National Strategic Plan	NSP
ix. South Africa Health Review	SAHR
x. United Nation Funds Population Activity	UNFPA

## CHAPTER 1

### OVERVIEW OF THE STUDY

#### 1.1 INTRODUCTION

Risk behaviour has adverse effect on the well being of the individual (De Guzman & Bosch, 2007: para1). Some risk behaviours practiced by youths expose them to the risk of contracting sexual illnesses; hence these behaviours are termed sexual risk behaviours. Sexual risk behaviour encompasses the tendency to have multiple sex partners and the irregular use of condoms (Department of Health, (DoH) 2003:103). A worldwide estimate of the number of youths who are living with Human Immuno Deficiency Virus (HIV) reveals that out of the total number of 12 million people with HIV and acquired immune deficiency syndrome (AIDS) five million comprises of youths of ages of 18-24 years. The number of infections was alarming despite the fact that transmission of HIV infection can be prevented. However a total of 890,000 of new HIV infections are reported annually among young people aged 15-24 years stated by, International AVERT HIV and AIDS Charity (AVERT, 2011:1) and this amounted to 40% of HIV infections globally World Health Organisation (WHO, 2011:15). The aforementioned statistics outline evidence that HIV infection and AIDS is a global sexual health problem experienced by youths which need to be prevented.

South Africa is one of the countries with a high prevalence of Acquired Immune Deficiency Syndrome (AIDS). It was estimated that 5, 6 million South Africans are infected with HIV and AIDS (UNAIDS Global Report, 2010:28). Furthermore in South Africa the HIV infection prevalence among pregnant women attending antenatal clinics have increased. In the Mpumalanga Province alone the reported increase was from 29.2% in 2001 to 34.7% in 2009 South African HIV and AIDS Statistics, accessed from (<http://www.avert.org>). The sexual risk behaviour of youths is central to the reported high incidence and prevalence rates of STIs, including HIV infection and AIDS.

South African youths also suffered from STIs including HIV and AIDS. This is evidenced by an increase in the syphilis prevalence rate in Mpumalanga Nkangala district which was from 0.5% in 2006 to 2.7% in 2010 as reported by the National Antenatal Sentinel HIV and Syphilis Prevalence Survey (Mpumalanga Department of Health, [MDoH] report 2011). The major health problem in the Republic of South Africa was that, STI infections amongst youths facilitated the spread of HIV and AIDS. Bana, Bhat, Godlwana, Libazi, Maholwana, Maralungana et al. (2010:1) indicated that in Eastern Cape 25% of women in reproductive

age had at least one of the known STI's. Muula (2008: 423) stated that, in the rural areas of Eastern Cape, Kwa-Zulu Natal, Mpumalanga, Cape Town and the major metropolitan areas of Johannesburg, recreational drug use, cultural limitations encouraged intergenerational sex, alcohol and non condom use among youths that perpetuated the spread of STI's and HIV and AIDS in South Africa.

The spread of sexual transmitted infections (STIs) resulted due to risk behaviours such as non-use of condom by youths. According to the WHO fact sheet (2011:1) STIs including HIV and AIDS are rated in the top five disease categories that youths are also counted among the infected people in developing countries. It is further stated that there are more than 30 different sexually transmitted bacteria, viruses and parasites which cause gonorrhoea, Chlamydia, syphilis, trichomoniasis, chancroid, genital herpes, genital warts, HIV and Hepatitis B infections. It is estimated that 448 million new curable STIs including HIV and AIDS are annually identified in youths (Stanhope & Lancaster, 2008:901).

The risks behaviour among youths, incidence of STI and HIV infection globally and nationwide emphasises the need to assess sexual risk behaviour of youths and that is why the researcher took the initiative and conducted this study in the Mpumalanga Province in order to use the collected data to raise awareness about the impact of sexual risk behaviours among youths.

## **1.2 BACKGROUND TO THE STUDY**

De Guzman and Bosch (2007:para1), reported that there are several factors that were identified as contributed to youths' risk behaviour. Among those factors was poor parenting whereby parents are practicing risk behaviour leading to youths replicating it. Poor literacy of youths was also reported as a risk factor which leads youths to get easily involved in risk behaviour. A negative school environment and a poor neighbourhood also identified contributing to the likely hood that youths took part in drug and alcohol abuse and unprotected sex. The following authors: Chopra, Townsend, Mathews, Tomlinson, Lisa, Johnston et al. (2008:1). Galvez-Buccollini, De Lea, Herrera, Gilman, and Soldan (2009:1) Dolan and Niven (2005:1) and Kaljee, Genberg, Minh, Tho, Thoa, and Stanton (2005:78) reported that the impact of the lack of support from the environment can therefore not be underestimated when assessing the sexual risk behaviour of youths.

In addition, abuse of alcohol among youths played a significant role in the spread of HIV infections. New partners were identified at taverns where males and females have high consumption of alcohol which leads to unsafe sex practices and thus the spread of STIs

including HIV and AIDS. Other risk behaviour was that youths became involved in sex with multiple partners. For young men having multiple sexual partners is a way of proving their virility while young women found it difficult to negotiate the use of condoms due to them being traditionally submissive partners in sexual relationships (Bearinger, Sieving, Ferguson, & Sharma, 2007:1220). Wealthy male youths tend to become involved in sexual relationships at a young age and have multiple concurrent sex partners. Males are less likely to consistently use a condom when having sex with a non-spousal partner (Kongnyuy, Wiysonge, Robinson, Nana & Kouam, and 2006:2). On the other hand poor young men often leave the school early to earn an income and exposed to situations in pubs and clubs where unprotected sex is practiced (WHO, 2002:8). Poor young women also tend to become involved with multiple sex partners for financial gain. Partners of young women sometimes much older than they are, contribute to the susceptibility of these women to STIs infections (Galvez-Buccollini, DeLea, Herrera, Gilman, & Soldan, 2009:2). The power imbalance between the younger women and older men makes it very difficult for the women to negotiate condom use (Ralph, Gina, Richard, Catlainn, Cobb, Harrington, et al. (2002:20). Youths' sexual risk behaviour thus exists whether there is poverty or wealth.

Sexual risk behaviour was reported that, it is associated with the abuse of alcohol and drugs that undermine individuals' capability to make informed decisions. Dolan and Niven (2005:1) and De Guzman and Bosch (2007: n p) asserted that, youths are found to be at the forefront regarding the spread of STIs including HIV and AIDS epidemic due to them taking part in sexual risk behaviour associated with the use of injectable drugs. The number of youths who make use of injectable drugs was found increasing in sub-Saharan Africa with the largest increase in Kenya, South Africa and Mauritius (UNAIDS Global Report, 2010:31).

Youths may appear to be mature but is often not the case. Intellectually and emotionally they still need guidance to accomplish the roles that society expects of them. After youths have left school they have to learn to socialise in a working environment which is much different from the secondary school environment that they have been used to (De Guzman & Bosch, 2007:para7). De Guzman and Bosch (2007:para7), further asserted that neurological studies have shown that before early 20's, development linked to general and future oriented decision making will not be fully functional. Youths who engaged in drinking alcohol may find themselves in stressful situations that further undermine their decision making capability and may expose them to STIs including HIV and AIDS. Thus for these reasons youths may engage in uninformed decision making that lead to being engaged in sexual risk behaviours. Notwithstanding many health education programmes in South Africa (DOH, 2003:15), that encouraged youths to abstain from unsafe sex, they are reported to portray health risky



behaviour. Programmes such as the National Adolescents Friendly Clinic Initiative (NAFCI) are designed to provide support to youths so that youths prevent sexual risk behaviour. Youths who attended NAFCI programmes are being equipped with knowledge and skills to identify the risk situation and to prevent it (Ashton & Dickson, 2008:99). Amidst the provision of these programmes these youths still take part in sexual risk behaviour which exposes them to STIs including HIV and AIDS.

### **1.3 RESEARCH PROBLEM**

In spite of various programmes such as the National adolescent Friendly clinic (NAFCI), Love Life, health education and condom promotion programmes offered by healthcare workers at Clinic A and B there is a high incidence of STI's including HIV infections among youths. Ineffective condom use, sex with multiple partners and the abuse of substances are reported to be contributed to the high rate of incidence.

Youths (18 to 24 years) are presenting with STIs such as gonorrhoea, syphilis, chancroid and HIV infection at clinics in Mpumalanga. According to the two clinics' statistics for STIs including HIV and AIDS from the targeted semi-rural municipal area for this study (Clinic A & Clinic B), nurses at both clinics consult about 50 youths in a month with different STIs, some of which are treated more than once. In the period of April, 2010 to March, 2011, the number of youths treated for STIs including HIV and AIDS from clinic A and B amounted to 415 cases. These statistics didn't include other health problems that the youths experienced. Voluntary counselling and testing was also encouraged as part of services which were rendered in these clinics. Almost 1 009 clients were tested for HIV and out of this number, 33% tested HIV positive.

Furthermore the statistics from the maternity ward in the public hospital of a sub-district in a feeder hospital for these two clinics shows that, 2 938 hospital deliveries were attended to in the period of April, 2010 to March, 2011 (Hospital statistics, 2010-2011). Of these deliveries, 857 of the mothers were HIV positive and some had already begun their anti retro viral treatment (ART) when they delivered. For March 2011 alone 19 of the youths mothers who delivered in this maternity ward were between 18 and 24 years and all were HIV positive (Hospital statistics, 2010-2011). The majority of females were diagnosed during antenatal visits in the clinics and the rest were diagnosed in the hospital after or before delivery, depending on their stages of labour on admission. From these statistics, it shows that STIs including HIV and AIDS is a challenge to this age group.

A study was needed to determine and describe the specific sexual risk behaviours of the youths which are exposed to contracting STI's including HIV and AIDS in the selected PHC clinics in Mpumalanga Province.

In Mpumalanga province survey conducted by Machaba (2010:13) about the prevalence of HIV the results revealed that STI's including HIV and AIDS among youths less than the age of 19 years, was 23.4% and, between the age of 20 to 24 years the results revealed that 29,8% were infected with STI's including HIV and AIDS. Therefore this study determined and described the risk behaviours of youths which exposed them to contracting STI's and HIV and AIDS in the selected PHC clinics in Mpumalanga province. The information from this study will be distributed to the Mpumalanga Department of Health to be used by the planners of programmes to develop programmes that will address risk behaviour of youths.

#### **1.4 RESEARCH QUESTIONS**

The questions that guided the research was only four of the six Health Belief Model components which were as follows:

- *What is the perceived susceptibility of youths with regard to the risk behaviour which expose them to contracting STI's and HIV and AIDS*
- *What are the perceived severities of contracting STI's and HIV and AIDS by youths?*
- *What is the perceived self-efficacy of youths who are at risk of contracting STI's and HIV and AIDS?*
- *What are the barriers to adopting healthy behaviours by youths in order to prevent risk of contracting STI's and HIV and AIDS?*

#### **1.5 AIM OF THE STUDY**

The aim of this study was: To determine and describe the risk behaviours of youths utilising the selected PHC clinics in Mpumalanga which expose them to contracting STI's, HIV and AIDS.

#### **1.6 OBJECTIVES OF THE STUDY**

The objectives of the study referring to specific 4 components of HBM were:

- To determine and describe the perceived susceptibility of youths with regard to the risk behaviour that exposes them to contracting STI's HIV and AIDS.

- To determine and describe the barriers to adopting healthy behaviours by youths in order to prevent risk of contracting STI's and HIV and AIDS.
- To determine and describe the perceived severity of STI's, HIV and AIDS by youths.
- To determine and describe the perceived self-efficacy of youths who are at risk of contracting STI's and HIV and AIDS.

## **1.7 SIGNIFICANCE OF THE STUDY**

During data collection the researcher explained the purpose of the study, to youths which started to make them aware of risk behaviours they were involved with. Those youths who wanted to know more about risk behaviour and exposure to STIs including HIV and AIDS was provided with information by the researcher. Incidences of STIs including HIV and AIDS may be curtailed when youths are aware of their risk behaviour and the results thereof.

Results of this study will be communicated to district health forums to make the officials aware of the risk behaviours of sexually active youths, who attend primary healthcare clinics in Mpumalanga. The impact of these risk behaviours with regard to contracting STIs including HIV and AIDS will be explained to the health forums members. In addition the findings will be communicated to other health providers; youths care providers and programme developers by means of an article that will be published in a scientific journal.

## **1.8 THEORETICAL FRAMEWORK**

The researcher identified the Health Belief Model (HBM) used by Allender and Spradley (2005:292) as a framework to study the sexual health risk behaviour of youth that expose them to contract STI's including HIV and AIDS. The components of the HBM are compatible with the risk behaviour that was described in the background of the study. The model was also used successfully by Lin, Simoni and Zemon (2005:469), in addressing sexual risk behaviour and HIV risk behaviour among Taiwanese immigrant students.

The HBM proposed that for the individual to take action to avoid risk behaviours the individual need to believe that he or she is susceptible to suffer the consequences related to risk behaviours (Lin, Simoni & Zemon, and 2005:471). HBM focuses on six components which are the perceived susceptibility of the individual, the perceived severity of the disease, the perceived barriers to the adoption of healthy behaviour, the perceived benefits of the healthy behaviour, cues to action regarding the adoption of healthy behaviour and the self efficacy of the individual (Lin, Simoni & Zemon, 2005:471).

In this study the researcher only used the following four concepts of the HBM which are; perceived susceptibility, perceived barriers, perceived severity and perceived self-efficacy which were the most relevant to address the research topic. These four components focus on risk behaviours unlike the two that are excluded as they involve benefits and cues to take corrective actions. These components will not be applicable to those respondents who may not be involved in practicing risk behaviours.

**Perceived susceptibility** implies that the individual believes that he/she is susceptible to get the disease. When it is combined with a belief that the disease poses a serious threat to the person, the possibility exists that the person will take action to try and avoid the disease. The more people realise that there is risk, and they take it serious that it is harmful, the more they are likely to try and avoid being exposed to situations where they can acquire the disease (Glanz, Rimer & Lewis, 2002:48).

External forces such as peer pressure and social clubs may also contribute towards a person's way of perceiving susceptibility. Youths need to belong to a group of the same age for socialisation therefore; pressures from the group may influence their behaviours. Unemployment and lack of knowledge may also contribute to risk behaviours. A person may become involved in multiple partner sex due to peer pressure when he/she observes that their friends have more than one sex partner and appear to be healthy (Schlickau & Wilson, 2004:202).

**Perceived barriers** refer to the individual's own evaluation of the obstacles in the way of the individual to change behaviour. In order for the individual to change the behaviour, this individual needs to outweigh the benefits of the new behaviour and have a belief in it (Center for Disease Control and Prevention, 2010). It may sound easy for example to tell youths to collect condoms and use them but the barrier to youths which may interfere with youths to use the condoms effectively may be the use of drugs and alcohol.

**Perceived severity** implies the impact of the situation on the individual's perception (Allender & Spradley, 2005:292). It entails the individual's beliefs about the seriousness of the illness. The individual may know about the illness but foster the belief that it will not cause any complications. Some people associate the severity of the disease with the experience of pain and discomfort which may not be obvious when people have STI's including HIV infection. Poverty and the inability to afford transport to visit healthcare centres may influence people to disregard the severity of diseases (Glanz, Rimer & Lewis, 2002:48).

STIs, globally, are taken as a serious health problem which is why there are protocols to be followed by health workers for the treatment of patients affected in all PHC facilities in order to control the spread of this disease. These protocols stipulate the guide to the comprehensive management of patients with symptomatic Including HIV and AIDS (HIV infection included) (DOH 2003: 4).

**Self efficacy** looks at the person's ability to make health related changes (Allender & Spradley, 2005:292). It involves the individual's ability to take a decision to change his/her behaviour independently. By persuading youth patients to take ownership of the knowledge imparted to them, they might be able to take informed decisions regarding behaviour changes.

People can only adopt changes of behaviour if such change will improve their lives. They must accept the changes and take ownership of it to ensure that it becomes sustainable (Schlickau & Wilson, 2004:202). These components of the Health Belief Model will direct the study

## **1.9 CLARIFICATION OF CONCEPTS**

The concepts used in this study were defined to clarify their meaning to ensure that the reader has a clear understanding of the concepts that featured throughout the study.

### **1.9.1 Youth**

According to Child ACT no 38 of 2005 as amended 2007 chapter one on the definitions clarifies that, any person under the age of 18 is a child. According to Webster's New World college dictionary (2004), the concept 'youths' generally refers to "a time of life that is neither childhood nor adulthood, but rather somewhere in-between" adulthood and the end of adolescent stage.

In this study, youths referred to a female or male between the ages of 18 and 24 years.

### **1.9.2 Risk behaviours exposing youths to STI's and HIV and AIDS**

Sexual risk behaviour in this study referred to when an individual is engaged in sexual activities without using protective measures such as a condom which will increase the probability of contracting Including HIV and AIDS including HIV infection, more especially if the person has multiple partners, frequently changing partners or practicing sexual activities with strangers (DOH, 2003: 104).

Risk means “a situation involving exposure to danger” or “act in such a way as to incur risk” (Concise Oxford English dictionary, 2002: 1235) while behaviour refers to “the way in which someone behaves or responds to the stimuli” (Concise Oxford English dictionary, 2002: 123).

In this study, sexual risk behaviour was referred to behaviours of youths utilising health services from the two selected PHC clinics in Mpumalanga which would influence their health by exposing them to STI's including HIV and AIDS infection.

### **1.9.3 Primary Health Care Clinics**

PHC clinics are clinics that offer different types of health care services which are based on the overlap of mutuality, social justice and equality. Their focus is on the individual and the communities in which the individuals reside (WHO, 2000:1). The main focus of PHCs is to bring services to the people, to prevent diseases by using health technologies, to offer care that is socially appropriate, universally accessible and scientifically sound. This level of care is the first level provided by trained health professionals, supported by an integrated referral system for further management at a higher level if is necessary (Australian Medical Association (AMA), 2010:1).

In this study PHC clinics refer to the two clinics (clinic A & clinic B) which the researcher has identified in one of the municipal areas in a semi-rural part of the Mpumalanga Province which operate for eight hours per day and five days per week.

### **1.9.4 Sexually Transmitted Infection**

Sexually Transmitted Infections (also called venereal disease) are infections that are passed from one person to the other more often through sexual contact (Lane, KAG, Kelly & Schindler, 1998:937). According to the WHO on Fresh Tools for Effective School Health (2004: 6) Including HIV and AIDS referred to the most common infections like, gonorrhoea, Chlamydia, syphilis, trichomoniasis, genital warts, chancroid, genital herpes hepatitis B and HIV infection. These Including HIV and AIDS are usually contracted when unprotected sex is practiced.

In this study including HIV and AIDS referred to infections that are contracted during unprotected sex practice which include gonorrhoea, chlamydia, syphilis, trichomoniasis, genital warts, chancroid, genital herpes hepatitis B and HIV infection. Even though HIV is contracted through unprotected sex practice the researcher defined the concept HIV and

AIDS in order to contextualise them in this study, again because they are not always linked to the presence of the different Including HIV and AIDS that are included in the definition.

In this study STIs was referred to all sexually transmitted diseases that may be contracted when risk behaviour is practiced by youths.

### **1.9.5 Human Immunodeficiency Virus Infection**

Human Immunodeficiency Virus Infection (HIV) as defined by Lane et al. (1998: 926) is an infection caused by a virus that progressively destroys the white cells called lymphocytes. This lowers the immune system of the individual causing acquired immunodeficiency syndrome (AIDS) and other opportunistic diseases that result from the impaired immunity depending on the stage of the infection (Lane, et al.1998: 926). The staging system of HIV is divided into clinical and biological parameters. Biological parameters are the serological results for CD4 count and other investigations done to diagnose HIV which will give the health workers a guide to manage the individual. According to HIV Guide for Primary Health Care in South Africa (2010:190) the individual who is HIV positive in stage one is asymptomatic with persistent generalised lymphadenopathy. In stage two there is moderate weight loss; recurrent upper respiratory infections which can make the health worker to decide on further investigations to rule out HIV. With stage three and stage four, the individual will complain of severe weight loss chronic diarrhoea and all the conditions that are immune compromised based.

In this study HIV will refer to being positive or negative, where the status was known after VCT which was done within the past three months and no risk behaviour has been practiced.

### **1.9.6 Acquired Immunodeficiency Syndrome**

AIDS is a clinical diagnosis defined by one of the indicators diseases which appear from stage one to stage four of the individual infected with HIV. At this stage the individual present with symptoms of diseases which are immune compromised based for example, extra pulmonary tuberculosis Kaposi, severe weight loss and impairment of central nervous system like confusion and meningitis to quote the few (HIV Guide for Primary Health Care in South Africa, 2010:191).

In this study AIDS will refer to youths who are symptomatic presenting with opportunistic infections.

## **1.10 RESEARCH DESIGN, SETTING AND METHODOLOGY**

In this study a quantitative design and methods were used. A non-experimental design was used. The population was the clients both males and females who attended the two PHC clinics used in this study. Convenience sampling was used and 200 respondents were sampled. A self administered questionnaire was used for data collection. Data analysis used quantitative data analysis where frequency tables, graphs and tables were developed. Ethical considerations were upheld. Validity and reliability were ensured. The research design and methods are discussed in chapter three.

### ***1.10.1.2 Hypothesis of the study***

Hypothesis according to Polit and Beck (2008:66) is defined as the statement of the researcher's expectations regarding the relationships between study variables or predictions of expected outcomes from the study. The author further explains that the questions found in the research questionnaire will determine the relationships between the concepts under investigation. Therefore the research questions found in the questionnaire for this study determined and described the risk behaviours practised by youths that utilised selected PHC clinics in Mpumalanga which expose them to STIs including HIV and AIDS. The Hypothesis of this study was as follows: The risk behaviours practiced by youths that utilise selected PHC clinics in Mpumalanga which expose them to STIs including HIV and AIDS.

## **1.11 ETHICAL REQUIREMENTS**

Ethical consideration in research means that the subject in the setting should be protected and respected for their rights (Burns & Grove, 2005: 83). The authors further explain that there may be risks in every study but only minimal risks are accepted. Ethical research is essential to protect the respondents. It was commenced during the identification of the topic, throughout, until the research results are published. It also entails that the data be stored properly once the study has been completed and it serves as a guide to prevent misconduct by the researchers (Burns & Grove, 2009:184).

### **1.11.1 Ethical considerations related to the researcher-participant relationship**

Creswell (2003:64) explains that respondents must be respected and protected against human rights violations and their human dignity should be respected. The author further explains that respondents' needs should also be considered to enhance their cooperation in the research.



The researcher ensured that the respondents' anonymity was maintained by not reflecting any identity of the respondents on completed questionnaires. In addition the youths who consented to take part in the study did so alone behind closed doors. The researcher explained to the respondents that their participation was not compulsory. The researcher further explained to the respondents that, they had the right to withdraw from the study at any time without stating a reason. (Speziale & Carpenter, 2007:62). Informed consent was obtained after the objectives, implications and their rights to take part in this research have been explained.

### **1.11.2 The right to freedom from harm and discomfort**

According to de Vos, Strydom, Fouché and Delport (2005: 64) the researcher must be competent to do the study and should respect the culture of the community where the study will take place, adhere to the promises and refrain from value judgement.

The researcher considered and respected the culture and customs of the participants, refrained from value judgements to make sure that respondents were comfortable to respond on the questionnaire. The researcher is a registered nurse that is able to assess risks and challenges which can impede the process of the study and make sound decisions to make sure that the arrangements at the clinics regarding the study were honoured under the supervision of the supervisor (de Vos et al., 2005: 64).

In this study there were no treatments that could cause any harm or discomfort. The researcher prepared the respondents to complete the questionnaire by explaining to them the objectives of the study and encouraged them to feel free to ask questions before the commencement of the completion of the questionnaire to clear their queries.

### **1.11.3 The right to protection from exploitation**

The researcher answered all questions asked by the respondents and made sure that she does not use her power as a registered professional nurse to persuade them to take part in the research which might be against their free will, by explaining to the participants that the researcher was a student at the University of Pretoria and the researcher was not taking the information as a health worker.

#### **1.11.3.1 Respect for human dignity**

The respondents had the right to participate or withdrew from the study at any given time without giving a reason. The respondents were given a chance to decide to participate

without pressures from the researcher (Polit & Beck, 2008:69). Their right to be informed about the purpose and aim of the study was respected.

### **1.11.3.2 Justice**

The respondents were informed about the possible publication of the research findings. They were, however, reassured that no information will be able to identify them as the questionnaire was anonymous.

Approval from the Provincial office, Municipal manager and Faculty of Health Sciences Research Ethics Committee of the University of Pretoria was obtained before the commencement of the study.

## **1.12 LIMITATIONS**

The limitations of this study were contained in the fact that questionnaires were only given to youths between the ages of 18 to 24 years who attend the two clinics in one of the municipal areas in the Mpumalanga province. Only youths who can read and write English and isiZulu was included in the sample.

## **1.13 SUMMARY**

Chapter 1 dealt with the preparation phase for the collection of data including the legal and ethical processes the researcher had to consider before she started with the actual study. The next chapter will give an overview of the literature to support the study's results.

## CHAPTER 2

### LITERATURE REVIEW

#### 2.1 INTRODUCTION

In Chapter 1 the researcher presented the overview of the study. In this chapter the literature review that guided the study is discussed. The literature review follows the stream of thoughts that provided the foundation of the study. It tells what is known previously by sharing the results of previous studies. It also places the present study within the larger body of work and shows how the present study fills the gap identified from previous studies. The literature review serves as the benchmark for the present study (Randolph, 2009:1531). The rationale for a literature review in this study was to review previous results regarding risks to contract STIs among youths in other provinces in South Africa and other countries.

This chapter comprehensively presents the literature review which discusses risk behaviours of youths which expose them to STIs including HIV and AIDS. The literature review was integrated with the theory of the Health Belief Model (HBM) which was developed by Hochbaum, Leventhal, Kegeles and Rosenstock in the 1950s (Lin et al., 2005:481). Four of the concepts of this theory, namely, perceived susceptibility, perceived barriers, perceived severity and perceived self-efficacy were used to guide the study to determine the risk behaviours of youths in the identified two public primary healthcare clinics (PHCs) in Mpumalanga. The other concepts which are perceived benefits and cues to action were excluded as the researcher decided they would not be applicable in the risk behaviours that expose youths to contract STIs including HIV and AIDS. The literature review was sectioned according to the objectives of the study and the HBM.

#### 2.2 THE OBJECTIVES OF THIS STUDY

##### 2.2.1 The objectives of this study were:

- to determine and describe the perceived susceptibility of youths with regard to the risk behaviour that exposed them to contracting STIs, HIV and AIDS
- to determine and describe the barriers to adopting healthy behaviours by youths in order to prevent the risk of contracting STIs and HIV and AIDS

- to determine and describe the perceived severity of STIs, HIV and AIDS by youths
- to determine and describe the perceived self-efficacy of youths who are at risk of contracting STIs, HIV and AIDS.

One of the outcomes of the strategic framework of the South African Government is to improve the health profile of all South Africans on the ten-Point Plan which includes accelerating the implementation of HIV and AIDS and STI programmes that will support youths and curtail their risk behaviours. This was among the motivations to conduct this study. The legal framework will be discussed first to provide the extended need for conducting this study and outline the legal context in the Republic of South Africa National Strategic Plan (NSP, 2012-2016:7).

## **2.3 CLARIFICATION OF CONCEPTS**

The clarification of the concepts featured in this study is discussed below which are: vulnerability and risk behaviours.

### **2.3.1 Vulnerability**

Vulnerability, Is when the individual is prone to be affected by a situation, harm or disease (Concise Oxford English dictionary, 2002:1608). In this study vulnerability will mean the risk behaviour of youth practising unsafe sex which will expose them to acquire STIs, HIV/ AIDS and unplanned pregnancy.

### **2.3.2 Risk behaviours**

Youth risk behaviours in this study refers to when an individual is engaged in sexual activities without using protective measures such as a condom which will increase the probability of contracting STIs including HIV and AIDS. More specifically if the person has multiple partners, frequently changing partners, or practicing sexual activities with strangers (DoH, 2003:104).

## **2.4 ORGANISATION OF THE LITERATURE REVIEW**

The literature review is organised and discussed under the South African National Health System, the Legal Framework for Youth Care in South Africa, and the NAFCI as programmes established under the WHO. Each topic has sub-topics which the researcher

explains as factors which affirm risk behaviours of the youth as well as the implementation of interventions.

#### **2.4.1 South African National Health System: school-based health programmes**

The National Health System (NHS) encompasses the total healthcare services that are networking in the country such as policies to guide health workers in the implementation of programmes to maintain and improve the health status of South Africans. These systems are divided into the spheres of the Government which are the national, provincial and local spheres and district levels (van Rensburg, 2008:2).

This study was conducted in a sub-district of the Nkangala district which is situated in Mpumalanga. Among the programmes which are available under the NHS in the Nkangala district are primary healthcare (PHC) programmes that include reproductive health programmes which are one of the programmes available and relevant to the youths in preventing and treating STIs including HIV and AIDS.

#### **2.4.2 Legal framework for youth care in South Africa**

The legal framework for youth care refers to the guidelines and policies available in the country to guide health professionals to function within the stipulated law. These guidelines include an ACT of Parliament the Constitution of the Republic of South Africa and other related health acts.

At the end of apartheid in 1994 the government of South Africa developed a policy which guided health professionals regarding health for all which included improving reproductive healthcare in South Africa (Maharaj & Rogan, 2007:3). Irrespective of the availability of resources and policies, there is still a challenge among the youths regarding reproductive health promotion. Programmes such as Love Life and the NAFCI were introduced by the government to address health issues. Among those issues are the reproductive health programme to address the youths and the community about healthy behaviours to prevent STIs including HIV and AIDS.

#### **2.4.3 NAFCI as a programme established under the WHO**

With support from the South African DoH the non-governmental organisation (NGO) Love Life launched the National Adolescent-Friendly Clinic Initiative (NAFCI) in 1999. There is the clinical side that focuses on reducing the physical and social barriers that prevent the youth from accessing reproductive health services. Then there is the educational side to educate

the youth on healthy sex behaviours and empower them with life skills to make the right decisions about their sexual behaviours. The essential service package of the NAFCI in South Africa have systems in place regarding information and education on sexual and reproductive health and sexually transmitted infections including information about the prevention of STIs management including HIV and AIDS (NAFCI, 2010:17). These National Standards were developed to reduce the barriers that youths encounter in the public clinics when going for health services. But, despite the availability of these programmes, youths remain ignorant and inconsistent to test and collect condoms to protect STIs including HIV and AIDS (NAFCI, 2011:1353).

In most cases females will not seek treatment if the health worker is a male person, particularly if a physical examination is involved. This will delay treatment and encourages the spread of STIs and HIV infections. It is therefore important that gender should be taken into consideration in terms of screening for STIs to enhance proper diagnosis and treatment (United Nations Fund for Population Activities (UNFPA), 2010:6). Furthermore, health workers need to be empowered regarding syndrome recognition, partner notification and for effective management of STIs to prevent the spread. It is suggested that STI services should be user friendly, particularly for youths to ensure that they feel comfortable to disclose their problems (UNFPA, 2010:6).

In the United States of America (USA), school-based programmes were supported by former President George W Bush who said that the youth is facing dangers of exposure to STIs because of the risk behaviours they are involved with. Therefore, he was prepared to give funding from the USA Government to support the abstinence programme to teach youths at schools about ways to prevent STIs including HIV and AIDS (African Union (AU) 2008:par.9). This was a motivation to facilitate school-based sexuality programmes. Boonstra (2004:1) evaluated through a comprehensive approach the implementation of the programmes in schools and the finding was that the goals of these programmes enhanced social functioning by 81%; the youths' cognitive skills by 79%; their academic competence by 27% and their hope for the future success by 73%. These findings support NAFCI in that information and education on sexual and reproductive health and STIs including information about management of HIV and AIDS may improve the behaviour of youths towards their sexual orientation (NAFCI, 2010:17).

In Europe STIs is also a problem among youths. A study done by Lazarus, Sihvonen-Riemenschneider, Laukamm-Josten, Wong and Liljestrand (2010:2) on the systematic review of intervention to prevent the spread of STIs among youths explains that youths accept peer-led education more than teacher-led education. The study found that peer-led

education was seen to be successful in changing the behaviours of youths and empowered them with knowledge. The improvement in sexual health knowledge helped youths to improve their health-seeking behaviours which is a positive intervention for reducing STIs, HIV and AIDS (Lazarus et al., 2010:2).

In order to enhance sexual health to prevent risk sexual behaviours which lead to STIs among youths also require adults and health personnel to show a positive and respectful approach to sexuality and sexual relationships of youths (Spauwen, Hoebe, Brouwers & Dukers-Muijters, 2011:1). Public and private health centres should take the responsibility of accommodating youths in their programmes and have a positive attitude towards helping youths. These sectors' staff must have a good understanding of the youths' developmental stages and challenges they may encounter in youth communities so that youths can feel free to use these sectors for health problems. According to Fugate Woods (2009:199), health education about healthy sexual behaviour is important during the early age of transition into adulthood. Youths need to be educated on healthy/risk sexual behaviours in an informal way (in other words in their home by their family based on their culture; this is known as an informal education system. In addition formal education should take place in schools, healthcare centres provided by health professionals and through government and community initiatives. What this study is bringing to us is that charity begins at home and the impact of the community's rituals plays a major role in shaping the youths' behaviours.

#### **2.4.4 School-based health programmes**

School-based health programmes are implemented in the schools to identify and treat health problems of the youth at an early stage; to address health and economic, political and educational issues that have impact in the life orientation of youths. Sawyer, Afifi, Bearinger, Blakemore, Dick, CEzeh et al. (2012:1630) support this statement and add that investment in the youths' education will have benefits to youths in empowering them with knowledge from primary level in the subject Life Orientation (LO) to enhance their skills about the reproductive system (Sawyer et al. (2012:1630).

Globally it is reported that 500000 of youths are infected with STIs including HIV and AIDS each day; however, they are vulnerable to STIs because of their social, political, cultural, biological and economic experiences that impact on their vulnerability (WHO, 2009:2). The youth needs to be informed about reproductive health and be provided with supportive environments at schools and in the community which need to be user-friendly to prevent the onset of STIs, HIV and AIDS (WHO, 2009:3). The Government of South Africa suggests that it is important to have youth specific interventions programmes such as school-based sexual

health programmes which will empower youths and enable them to acquire skills to protect themselves from STIs including HIV and AIDS (NSP, 2012 –2016:7).

To prevent new infections of STIs, HIV and AIDS among the teenagers who are the youths of the future, the Department of Basic Education (DBE) in South Africa provides reproductive health promotion information to learners from primary school phase. The introduction of Life Orientation (LO) as a subject was one of the interventions approved by the Department of Basic Education (DBE, 2008:1) to provide learners with knowledge about sexuality issues including HIV. The introduction of the LO subject is acknowledged by Mulaudzi (2007:34) and Lebese, Davhana-Maselesele and Obi (2010:34). The authors agree that abstinence must be included and promoted, while a safe environment has to be created to talk about sexual health with children and youths. Harrison, O'Sullivan, Hoffman, Dolezal, and Morrell (2010:2) point out that the need for school-based sexual and reproductive health promotion is mostly in developing countries to prevent the youth from becoming involved in sexual risk activities that lead to reproductive and sexual health problems.

## **2.5 HEALTH BELIEF MODEL AS APPLIED IN THE STUDY**

The four HBM components as applied in the study were: perceived susceptibility, perceived barriers, perceived severity, and self-efficacy. They were chosen by the researcher as she perceived them to be relevant in addressing the objectives of this study. Factors contributing to the youths' sexual risk behaviours are grouped and discussed according to these four major HBM components.

### **2.5.1 Perceived susceptibility and perceived barriers**

**Perceived susceptibility** implies that the individual believes that he or she is susceptible to get the disease. When it is combined with a belief that the disease poses a serious threat to the person, the possibility exists that the person will take action to try and avoid the disease. The more people realise that there is a risk, and they take it serious that it is harmful, the more they are likely to try and avoid being exposed to situations where they can acquire the disease (Glanz et al., 2002:48).

**Perceived barriers** entail what the individual perceives as a block for the accomplishment of a certain goal or objective (Glanz et al., 2002:48).

These two components are discussed changeably as they share a commonality about the risk behaviours of youths. According to Taylor-Seehafer and Rew (2000:16); Upreti, Regmi, and Simkhada. (2009:386); Hendriksen et al. (2007:1248); Booth (2009:1) and WHO



(2006:11) youths are faced with numerous factors that make them susceptible to contract STIs, HIV and AIDS. They also encounter barriers in their lives that bring them into contact with these infections. These factors include among others:

- age of sexual debut
- the use of alternative health services
- social status
- gender inequality
- drugs and alcohol abuse.

### **2.5.1.1 Age of sexual debut**

The age of sexual debut of females and males differ in South Africa. Harrison et al. (2005:259) in the first South African Youth Risk Behaviour Survey (SAYRBS) conducted in 2002 revealed that more male youths (25.4%) than female youths (5.6%) started sex at 14-years-old. In 2008 the second SAYRBS was conducted and the results showed that 12.6% youths ever had sex and of the group who had sex 21.2% were males and 4.3% were females (Reddy, James, Sewpaul, Koopman, Funani, Sifunda, et al., 2008:31).

Early sexual debut is perceived as high risk, especially among female youths. Early sexual debut increases the risk of contracting STIs because of their biological cervical immaturity (Taylor-Seehafer & Rew, 2000:16). The cervix becomes matured only two to three years after menarche or just after menarche has started. This means if female youths start sexual relations before menarche, they will be highly at risk to STIs, HIV and AIDS. The study further confirms that pathogens like chlamydia, gonorrhoea, syphilis and the herpes virus are more likely to grow better on the immature cervix than on the mature cervix.

Age is a further barrier because youths are not really able to take decisions independently. Female and male youths may differ when confronted with choosing a risky sexual outcome. This characteristic is controlled by the innate preference of the person which is modified by pressures outside the person to conform to gender stereotypes (Booth, 2009:1).

### **2.5.1.2 Use of alternative health services**

Traditional medicines in the communities are still used to treat STIs including HIV and AIDS and this delays early treatment which lead to complications. This statement is confirmed by the findings of Ehsanul (2011:1) who conducted a study in Durban, South Africa, about knowledge regarding STIs among undergraduate students. The findings confirm that a high

number of students who engaged in risk sexual behaviours did not have knowledge regarding signs and symptoms of STIs. Some of the youths consulted the traditional healers for health advice and care. It was discovered in this study that in black South African communities, there is still a belief among individuals that it is better to seek medical attention from traditional healers for STIs before seeking western medical attention. This practice may lead one to experience complications while still bargaining for health care. Upreti et al. (2009:386) reported that in Nepal the youths' general knowledge about STIs was poor and their careless attitudes and behaviours towards the prevention of STIs, HIV and AIDS were worrying. Youths were involved in unprotected sex and had multiple partners.

Upreti et al. (2009:386) explain that knowledge among youths from specifically the rural areas in Nepal was extremely low regarding the prevention of STIs, HIV and AIDS as compared to that of the urban youths. The main reason for the knowledge differences among these two groups could be poor education and fewer discussions about sex education among family members and friends of youths in the Nepalese communities.

It was further confirmed that rural youths have high practices of premarital sexual relations without having any knowledge of the use of protective measures against STIs including HIV and AIDS which placed them at the risk of contracting STIs (Upreti et al., 2009:386). Therefore, communication is the key factor among families, peers and the community to empower youths about sexual health because of the fact that the youth is at the forefront of participating in sexually risk activities that results in them being the source of STI and other sexually transmitted diseases (Upreti et al., 2009: 386).

### **2.5.1.3 Social status**

Social issues such as ethnic inequalities, religious beliefs, cultures and wealth shape the development of youths from childhood and may be negative or positive depending on the relationship of these issues and factors that affect their overall health. This includes their sexual health and orientation about the prevention of STIs including HIV and AIDS (Viner et al., 2012:1644).

In a study done by Davis (2009:267), the author explains that unemployment and poverty increase sexual appetite which subsequently leads to youths taking sexual risks that may continue into adulthood. The study findings revealed that individuals with a high poverty status were more likely to have sex more frequently with different partners. In addition, from this study it was evident that 'irregular workers' (not permanently employed workers) tend to have a greater sexual appetite and sexual risk behaviours resulting to be infected with STIs

including HIV and AIDS. Davis (2009) points out that 77% of new cases with STIs were youths between the ages of 20 and 24 who were living in poverty. The author observed that poverty status is a negative contributory factor towards the youths' risk behaviour of practicing sex without the use of condoms which can lead youths to contract STIs including HIV and AIDS. The youths therefore need to be aware of this and other factors that may expose them to contracting STIs including HIV and AIDS (Davis, 2009:267).

Female youths, who are economically dependent on their male youth partners, have limited ability to negotiate for condoms to prevent STIs because they want (or need) to secure the relationship and financial support. Higher levels of education also play a role in female youths' perception of the risks associated with contracting STIs, HIV and AIDS. Educated female youths can prevent the spread of STIs by using their knowledge, and they have the ability to negotiate for safe sex with their male youth partners; this also applies to young educated females who are in a marriage (Hendriksen, Pettifor, Lee, Coates & Rees, 2007:1248). Results from this study showed that approximately 35% of female respondents who had STIs reported having only one sexual partner which is a sure sign of acceptable and responsible sexual behaviour (Hendriksen, et al., 2007:1248).

Speizer, Pettifor, Cummings, MacPhail, Kleinschmidt, Rees et al. (2009:425) confirm that power sharing and education play a role in the youths' decision making. Youths with a lower education level are more prone to risk behaviours. The authors further note that female youths seem to have less relationship power and are forced to have sex with their partners. Therefore, there seem to be higher risk for female youths to be infected with STIs than for adult women with more relationship power and a higher level of education (Speizer et al., 2009:425). According to these authors, violence may also affect the youths' power sharing if the perceived self-efficacy component of the HBM is taken into consideration. Violence in the community and in homes affects the youths' (perhaps more so the female youths who are the more vulnerable partner due to the submissive role they take in a domestic and relationship context) ability to take positive decisions regarding protection against STIs.

In accordance with the HBM, perceived barriers can be a huge obstacle to living a sexual healthy lifestyle. A person, female and male, needs to weigh her or his new behaviour's consequences. One of the major reasons people do not change their behaviours is the fact that they think it is hard to change; they perceive change as a difficult move in life that becomes a barrier to new behaviour. Culture and religion to youths may play a major role as a barrier to use protective measures (condoms) against STIs. This may lead to youths having serious complications related to reproductive health in future, for example, infertility.

Social and environmental factors contribute to an individual's risk behaviour. Along with this, a combination of personal factors, factors related to the quality and coverage of services and programmes and societal factors increases or reduces an individual's vulnerability to sexual and reproductive risk behaviour (WHO, 2006:11).

#### **2.5.1.4 Gender inequality, level of education, negotiation and decision-making**

Female and male youths may differ in choosing a risky outcome. This is controlled by the innate preference of the person which is modified by pressures outside the person to conform to gender stereotypes (Booth, 2009:1). The same author found that sexual risk-taking behaviour among female youths was higher because of cultural gender differences. Also, gender inequality might reflect social learning; the culture often defines the role of males and females in the community and, as Bearinger, Sieving, Ferguson and Sharma (2007:1220) stating that, if in the culture of the community decision-making is dominated by males, it can lead to an imbalance in communication between the youth about safe sexual practises. The male, for example, can refuse to use a condom and the female, as the submissive partner, will have no say in the matter.

Bearinger et al. (2007:1220) also state that young males often have multiple partners because they have to 'prove' their virility in the society or culture. But, it is a sexual risky behaviour because it can result in physical and reproductive health problems for both partners: either can be infected with STIs or HIV or it can result in an unwanted pregnancy for the female. Bearinger et al. (2007:1220) also note only a small number of youths use condoms as a way of controlling or preventing STIs including HIV and unwanted pregnancies. The UNAIDS Global Report (2010 a :30, par. 4) states traditional roles and societal values related to masculinity "might encourage boys and men to adopt risky behaviours, including excessive alcohol use and concurrent sexual relationships, so increasing their risk of acquiring or transmitting HIV".

A low level of education, poverty and gender inequality operate in a cycle as explained by (Krishnan, Megan, Dunbar, Minnis, Medlin, Gerdts et al., 2008:1136). According to these authors, uneducated or females with little education are more bound by the norms and values of their society or culture and are therefore prone to poor decision making with regard to sexual activities.

#### **2.5.1.5 Alcohol and drug abuse**

According to Sawyer et al. (2012:1634), drug and alcohol abuse in South Africa has seemingly become an outlet for the majority of youths in communities. The authors state the

youth makes up the majority of users of injectable drugs, alcohol abuse, practicing unsafe sex, depression and antisocial and illegal activities that increase the spread of STIs including HIV and AIDS. In a study conducted in the Free State with learners 14 years and older regarding voluntary counselling and testing (VCT) for HIV and AIDs, the participants in four focus groups were in agreement that drug and alcohol abuse has an enormous impact on the youths' risk behaviours by "exposing them to high-risk sexual behaviours" (Botma, Motiki & Viljoen, 2007:55).

In Ethiopia, a national survey was conducted on alcohol abuse among the youth and adults. It was reported that alcohol use increased with age (31% of boys between 15 and 17 drank occasionally or regularly; 46% of boys aged 21 to 24 drank occasionally or regularly). Young males in Ethiopia with no education consumed more alcohol on various occasions and locations than those with higher levels of education (UNFPA, 2010:33).

## **2.6 PERCEIVED SEVERITY**

Perceived susceptibility implies that the individual believes that she or he is susceptible to get the disease. When it is combined with a belief that the disease poses a serious threat to the person, it is perceived severity and the possibility exists that the person will take action to try and avoid the disease. The more people realise that there is risk, and they take it serious that it is harmful, the more they are likely to try and avoid being exposed to situations where they can acquire the disease (Glanz et al., 2002:48). This component is discussed under the following contributory factors:

- Knowledge and signs and symptoms
- Complications.

### **2.6.1 Knowledge and signs and symptoms**

Knowledge and education is the key for youths to know the impact of STIs in their life so that they can take the initiative to prevent STI and HIV infections. (Upreti et al., 2009:386) in their study done on the Nepalese youths discovered that there was a gap in the youths' general knowledge about STIs and that their attitudes and behaviours towards the prevention of STIs, HIV and AIDS was poor and uncaring. Among the rural youth there were high practices of premarital sexual relations involving unprotected sex with multiple partners because they had little or no knowledge of the use of protective measures against STIs including HIV and AIDS making them highly at risk of contracting STIs including HIV and AIDS (Upreti et al., 2009:386).

In Europe STIs is also a problem among youths. A study done by Lazarus et al. (2010:2) on the systematic review of intervention to prevent the spread of STIs among the youths indicates that youths accept peer-led education better than education from seniors or older people. The authors found that peer-led education was more successful to change the behaviours of youths and empower them with knowledge. The improvement in sexual health knowledge helps youths to develop health-seeking behaviours, and knowing where, when and how to seek reproductive health knowledge and advice is regarded by Lazarus et al. (2010:2) as a positive step from the youths' side to reduce STIs, HIV and AIDS among them.

Globally, STIs continues to be a huge health and economic burden for developing countries (Lan, Quan & Yang, 2009:1). The presence of STIs, particularly those that cause ulcers, can promote the spread of HIV and AIDS which is a serious long-term chronic disease involving expensive treatment. In developing countries, females are the biggest target of STIs because they seem to be the ones with insufficient knowledge about their reproductive rights; There is a lack of proper facilities to help female youths with proper and on-time screening for STIs in order to treat them and prevent further reproductive health complications (for example, infertility or developing stage four HIV and AIDS). There are also little resources in terms of time and staff in place in developing countries to educate the youth on safe sex practices and warn them about the dangers of sexual risk behaviours during first consultations. Lan et al. (2009:1) suggest that in poor developing countries governments cannot afford to distribute adequate funding for programmes on sexual health to run effectively.

### **2.6.2 Complications**

Complications in this study referred to the stage were STIs were not managed at an early stage thus affecting the reproductive system negatively, for example, blocked fallopian tubes due to untreated gonorrhoea in female youths or infertility. According to the Health Belief Model (HBM), perceived severity of the disease speaks to the individual about the danger and the seriousness of the disease based on the health information the individual has. It is important that the individual believes that the disease is a health threat to her or his life so that action is taken to prevent the contraction of the diseases. Applicable diseases in this study referred to STIs including HIV and AIDS changes (Allender & Spradley, 2005:292). It involves the individual's ability to take a decision to change his or her behaviour independently. By persuading young patients to take ownership of the knowledge imparted to them, they might be able to take informed decisions to change their sexual risk behaviours.

People can only adopt changes of behaviour if such changes will improve their lives. They must accept the changes and take ownership of it to ensure that it becomes sustainable (Schlickau & Wilson, 2004:202). The following contributory factors were included in the discussion of perceived susceptibility:

- abstinence as a sign of self-efficacy
- fidelity.

### ***2.7.1 Abstinence as a sign of self-efficacy***

Abstinence is when an individual abstains from sexual activities. Abstinence, monogamy and consistent condom use are the primary ways of self-efficacy to prevent STIs, HIV and AIDS (DiClemente, Salazar & Crosby, 2011:209). Abstinence as a protective measure to prevent the spread of STIs including HIV and AIDS is recommended by public health policies in targeting the youths (DiClemente et al., 2011:211). The findings from these authors' study show that more than 10% of STIs positive participants reported abstaining from sex in the previous 12 months before the study was conducted. Yet, they also shared that they had contracted STIs. The results shows there are discrepancies in the youths' behaviours regarding protecting themselves against STIs including HIV and AIDS or they are not honest about their sexual activities (DiClemente et al., 2011:208).

Maharaj and Cleland (2008:840) conducted a study in Durban to examine the protective behavioural strategies used by college students (youths). The study revealed that abstinence is the most prevalent protective method used among Indians and whites and half of that sample claimed that they were still virgins or had not engaged in sex in the 12 months before the study. These findings illustrate the conclusion that risk behaviours regarding STIs differ according to ethnic groups.

The acceptability or feasibility of abstinence was found to be lower in African groups than in Indian and white groups although it was stated in Maharaj and Cleland (2008:840) that abstinence is more practiced among Indians and white. In their study Maharaj and Cleland (2008:840) they further stated that, 17% of the African male youths were still virgins or had abstained from sex in the year prior to the study. A high frequency of condom use was found to be the next biggest contributor to protection against STIs for the male and female students. A total of 20%-30% of African and Indian men protected but only 15% of White males are protected.

The first step towards healthy sexual behaviours of youths to ensure that they do not get STIs is to practice abstinence. Abstinence is the best choice until the right time when they

are matured enough to be able to make the right decision about the right thing regarding their sexual relationships (WHO Fact Sheet, 2009:6). Youths should be faithful to their partners if they are in the relationships. If they are not able to stay with one partner the best other method to prevent getting STIs and spreading these infections is to use a condom and to follow the A, B, C method (Abstinence, Be Faithful and Condomise) which is the key to prevent sexual risk behaviours and promote sexual health programmers to reduce the spread of STIs for sexually active youths (ABC of HIV Prevention, accessed from: <http://www.avert.org>).

### **2.7.2 Fidelity**

The best protection method for the youth is fidelity; having a sexual relationship with one partner (Maharaj & Cleland, 2008:840). In order to enhance sexual health to prevent risk sexual behaviours which lead to STIs among youths it also requires a positive and respectful approach to sexuality and sexual relationships to youths (Spauwen et al., 2011:1). Public and private health centres should take the responsibility of accommodating youths in their programmes and have a positive attitude towards helping youths. These sectors staff must have a good understanding of the youths' developmental stages and challenges they may encounter in youth communities and address them so that youths can feel free to use these sectors for health problems.

### **2.7.3 Support and promotion of self-efficacy**

Health professionals regarding self-efficacy should also play a major role in shaping youths behaviours hence charity begins at home. Therefore, the following sub-heading will be discussed to affirm self-efficacy:

- support by family
- support by health professionals
- support by partners
- work place support.

#### **2.7.3.1 Support by family**

Family play a major role in shaping youth from childhood with regards to the way they socialise in life, in the environment and how to relate with other in society (Fugate Woods, 2009:199) states in the youths' development stages, informal education is managed in the safety of their homes and is family-based on their culture. The impact of the family and community rituals play a major role in shaping youths' sexual risk behaviours.



Communication is therefore the key factor among families, peers and the community in empowering youths to make informed decisions about sexual behaviour (Upreti, et al. 2009: 386) because they are exposed to so many diverse negative influences from outside the family circle. For example, peer pressure to engage in early sexual debut, pressure to use alcohol or drugs to 'fit in', pressure to have unsafe sex with multiple partners for money (DiClemente et al., 2007:889). These authors further state one of the multiple intervention approaches is the mesosystem approach. The family is an important part of this system and DiClemente et al. (2007:892) advise that the family should make a point of knowing the whereabouts of their children and who they associate with in an attempt to protect and reduce their risk behaviours.

Regarding the study they conducted in Nepal, Upreti et al. (2009:386) explain that the main reason for knowledge differences about safe sexual activities and reproductive health matters; health among the youth can be ascribed to poor informal education and fewer discussions about sexual matters among family members and adult friends of the youth in the community. Adult friends may include an older sibling, an uncle or aunt or even a close family friend. It was suggested by the findings that rural youths have high practices of premarital sexual relations without having knowledge of the use of protective measures against STIs including HIV and AIDS which make them at the risk of contracting these diseases (Upreti et al., 2009).

### **2.7.3.2 Support by health professionals**

Through formal health education by health workers (at clinics and PHC facilities) youths may begin to understand and perceive STIs as a threat to their reproductive health. If they are made knowledgeable and made aware of the health consequences of participating in unsafe sexual activities by health professionals who understand them and can communicate with them at their level, it may empower them to make the right decisions (DiClemente et al., 2007:894). Botma et al. (2007:53,) note that the Grade 12 learners in their study shared that they did get information from the clinics (healthcare workers) but that they did not get "enough parental guidance regarding HIV and AIDS". The fact that youths seek help from the healthcare workers and collect condoms to protect themselves from contracting these diseases is a positive step to curb the spreading of STIs including HIV and AIDS (DiClemente et al., 2007: 889).

In South Africa healthcare workers, particularly nurses, are in the position to support and advise the youth on safe sexual practices because they work in primary healthcare clinics that support the National Adolescent Friendly Clinic Initiative (NAFCI) which makes it easy

for the youth to use clinic services (Dickson, Ashton & Smith, 2007:81). Having the correct knowledge and information must be coupled with understanding the youths' needs by delivering youth friendly services so that the youth will make use of these services.

### **2.7.3.3 Support by partners**

Partners who are open to discuss sexual related issues, for example, signs and symptoms of STIs, contribute towards supporting each other (WHO Fact Sheet, 2009:6). Male youths who have multiple partners and who do not support the use of condoms with their partners are at the risk to contract or transmit STIs including HIV and AIDS. However, youths between the ages 18 and 24 do not always find themselves in a long-term relationship and so communication and discussion about condom use with casual sexual partners is unlikely (WHO Fact Sheet, 2009:6).

### **2.7.3.4 Support by health promoters**

Community health promotion about sexual health to youths, especially to female youths, is important to empower them with information to be able to prevent STIs (Ralph et al. 2002: 20-24). Therefore, health promoters should be able to identify those at risk, who are vulnerable and address the risks according to the situation. For example, youths who are known to abuse alcohol should be encouraged by community initiatives to go for counselling (Draper, Pienaar, Parker & Rehle, 2007:7). It is in this area that the support and information provided by the NAFCI initiatives play an important role to give information and education on sexual and reproductive health and sexually transmitted infections including HIV and AIDS.

### **2.7.3.5 Workplace support**

In today's world at least one, and in many cases both, parents need to work to support their children financially. They do not have much time to spend with their children from their early stages (DiClemente et al., 2007:888). These authors suggest that programmes which are offered in the workplace related to sexual health and STIs can help most of the young parents with information. By introducing such health promotion programmes, young parents will be able to discuss sexual issues among themselves to bring about a change in their sexual risk behaviours (DiClemente, et al., 2007:894).

## **2.8 SUMMARY**

Accurate information is the key to change the youths' attitudes regarding sexual risk behaviours. Teachers, parents, and health workers who are involved in teaching youths

regarding reproductive health issues need to be accurate when sharing information. According to (Boskey, 2010:2), youths who do not have accurate information about sex-related issues and the consequences of unsafe sex may falsely assume that they are safe from STIs including HIV and AIDS. There is a need for the youth to be fully educated about STIs, HIV and AIDS. There is a need for parents and healthcare workers to join hands in order to improve the health status of the youth. On the other hand, the youth needs to make an effort to change their own sexual risk behaviour in order for them to lead healthy and fulfilling lives. This will to change is maybe summarised best by the following statement of Mokhele and Jita (2010:1765):“*Change occurs most rapidly when people want to change*” and when they see the benefit in it.

## CHAPTER 3

# RESEARCH DESIGN AND METHODOLOGY

### 3.1 INTRODUCTION

In Chapter 2 a literature review pertaining to the behaviours of the youth that expose them to STIs including HIV and AIDS was presented. The conducted literature review was used to identify information and integrate it into the questionnaire that was used to collect the data for this study. In this way it was ensured that the data collected would be relevant to the context of the study. In this chapter the research design and methods used in this study are described.

### 3.2 OBJECTIVES

The objectives of the study were based on four of the components of the Health Belief Model (HBM) used by Allender and Spradley (2005:292). In the current study these four components were used as the framework to:

- determine and describe the perceived susceptibility of the youth with regard to the sexual risk behaviours that expose them to contracting STIs, HIV and AIDS.
- determine and describe the barriers preventing the youth from adopting healthy sexual behaviours that will protect them from contracting STIs, HIV and AIDS.
- determine and describe the perceived severity of STIs, HIV and AIDS among the youth.
- determine and describe the perceived self-efficacy of the youth who are at risk of contracting STIs, HIV and AIDS.

### 3.3 RESEARCH DESIGN

A research design is the entire plan the researcher uses to obtain the desired answers regarding the study questions (Burns & Grove, 2008:66). By following a planned design, the researcher is in the position to timeously pay attention to challenges that may hamper the success of the research study (Burns & Grove, 2008:66). The research design is thus the plan that guides the researcher on how to conduct the study and how to gather relevant information to address the research question (Nieswiadomy, 2012:37).

In this study the researcher used a quantitative, descriptive, non-experimental and contextual design to determine and describe the risk behaviours of youths that could expose them to contracting STIs including HIV and AIDS in two selected primary healthcare clinics (PHCs) in a semi-rural municipal area in Mpumalanga, South Africa.

### **3.3.1 Quantitative design**

According to Polit and Beck (2008:763), quantitative research involves the investigation of a topic following extreme, thorough and exhausting measures. In this study the researcher conducted an in-depth quantitative study to determine and describe the sexual risk behaviours which exposed youths to contracting STIs including HIV and AIDS in the selected PHC clinics in Mpumalanga. The nature of the quantitative design was descriptive, non-experimental and contextual.

### **3.3.2 Descriptive design**

Descriptive research is defined as a research study that describes the topic or situations as they happen in a natural setting (Nieswiadomy, 2012:318). In addition, descriptive research is used to describe the characteristics of the persons, the situation, and the frequencies that depict the characteristics of the phenomenon that is being investigated (Polit & Beck, 2008:752). In this study the researcher described the risk behaviours of youths within the framework of four concepts of the HBM model (as described in Chapter 1, Section 1.8 Theoretical framework) suited to the study context.

### **3.3.3 Non-experimental design**

Non-experimental research refers to a study where no treatment is administered to the respondents or the control group (Nieswiadomy, 2012:32). Only youths attending the two selected PHC clinics and who fit the inclusion criteria participated in the current study. No interventions from or comparisons to other groups of youths formed part of the current study. A questionnaire was administered without manipulating any factors that might have affected the participating youths personally, socially and environmentally.

### **3.3.4 Contextual setting**

The research setting refers to the place where the study is conducted (Polit & Beck, 2008:766). The research setting for this study was the two selected PHC settings in Mpumalanga that were referred to as Clinic A and Clinic B for the purposes of maintaining anonymity and confidentiality.

Clinic A is a Gateway clinic situated in the grounds (meaning outside the hospital building but in the grounds) of a hospital in a town in Mpumalanga. Clinic B was situated in the municipal buildings complex in the same town. The two clinics were situated about one kilometre from each other. As shown in the Hospital Statistics (2010-2011), in Clinic B (the one situated in the municipal building) about 40 627 patients were consulted per year of which 10 000 were youths between the ages of 18 to 24 years. On the other hand, in Clinic A (a Gateway in the hospital grounds) approximately 9 490 patients were consulted per year of which 2 000 were youths between 18 to 24 years old. It can be assumed that the populations from the area visited Clinic A more often since they had access to medical doctors in the hospital whereas in Clinic B there was no immediate access to doctors. Patients (including youths) who visited Clinic A could therefore combine consultations provided in the clinic as well as consult medical doctors for other ailments or illnesses. Both clinics were open from 07h30 to 16h00 Monday to Thursday and 7h30 to 13h00 on Friday for clinic B.

The researcher identified these two clinics because their statistics reflected a high attendance of youths. At the time of study Clinic A was a PHC where healthcare was provided by five professional nurses trained in PHC. There was one enrolled assistant nurse, one enrolled nurse, two lay counsellors, one cleaner and two family medicine doctors. These doctors came to Clinic A twice a week for treatment review and to attend to patients with complicated health needs. Clinic B was under municipal administration. It was managed by a PHC manager with a staff consisting of two clinic supervisors, seven community health nurses, one clerical assistant, one general worker on contract and two lay counsellors.

### **3.4 RESEARCH METHODS**

Research methods are the techniques used by researchers to “structure a study in order to gather and analyse information in a scientific way” (Polit & Beck, 2008:765). The research methods for this study are discussed in terms of the population, sampling, data collection and data analysis.

#### **3.4.1 Population**

The population refers to all the individuals with common, defining characteristics (Polit & Beck, 2008:338). Burns and Grove (2005:746) define population as the group of people that meet the criteria for the research study. In this study the population were youths between 18 and 24 years old who attended the two selected PHC clinics (Clinic A and Clinic B) in Mpumalanga.

The population for this study was calculated to be 12 000 youths who were seen at the two selected PHCs in Mpumalanga per year. The accessible population for this study were 1 000 youths; it was an estimate for the number of youths who visited both clinics during the month of data collection.

### **3.4.2 Sample and sampling**

The sample refers to the subset of the population from which the researcher collected the data (Polit & Beck, 2008:339). In this study the sample selected by the researcher during data collection were youths between 18 and 24 years old who visited the two selected PHC clinics in Mpumalanga.

The sample size refers to the number of respondents included in the sample. According to Polit and Beck (2008:348), there is no specific population size needed for a quantitative study; however, a larger population can increase the validity of the results. The sample size was 200 youths from the selected PHC clinics in Mpumalanga during the time of the data collection. The sample of 200 respondents was regarded as a representative size according to the statistician consulted and would be generalisable to the population.

Sampling is a process whereby researchers select a unit from the population with the specific characteristics that they want to research (Lobiondo-Wood & Haber, 2010:585). In addition, sampling refers to the process in which units of a population are selected to represent the entire population for the research study (Polit & Beck, 2008:338). In this study all youths who visited the two selected PHC clinics in Mpumalanga and met the inclusion criteria were sampled as respondents. During the sampling process the researcher approached youths who visited the two clinics every day for a period of two weeks. She explained the objectives of the study to those youths who suited the inclusion criteria, and used the clinic register to verify the age of youths as stated in this study.

A non-probability convenience sampling method was used. Convenience sampling is described as a relevant sampling method when the respondents who meet the inclusion criteria are available to the researcher (Polit & Beck, 2008:750). The researcher used convenience sampling because the youths who visited the two selected clinics were available at the time of data collection. It was easy to sample the respondents as the researcher approached respondents as they came into the clinic and she could verify whether they met the inclusion criteria for the study quite easily.

The researcher made sure that the respondents were not selected twice. This was a possibility because some youths would alternate between the two clinics or make two or

more visits to a clinic during the period of data collection. Explanation with regard to the set criteria was explained daily to the youths by the researcher during data collection. In this way those who had been already included in the sample at one clinic were not reselected at the other.

#### **3.4.3.1 Inclusion criteria**

In this study youths between 18 and 24 years who visited the selected Clinic A and Clinic B for health services during the period of data collection and who met the following selection criteria were invited as respondents.

- Both female and male youths had to be between 18 and 24 years old.
- The youths had to utilise one or both the two selected PHC clinics. (Those who alternated were only invited to participate once as explained in Section 3.4.2 Sample and sampling).
- They had to be able to read and write in English or isiZulu.
- Both females and males had to independently attend the two PHC clinics selected as the setting for this study.

#### **3.4.3.2 Exclusion criteria**

According to Polit and Beck (2008:338), the exclusion criteria are aimed at identification of the characteristics of the population which does not meet the inclusion criteria. In this study youths who were physically very ill, needed urgent healthcare provision or who had illnesses related to their mental health were not included in the study. These youths needed emergency care and their time could not be used for research purposes.

Individuals who could not complete the questionnaires independently and who could not read or write in English or isiZulu were not included in the study due to the sensitive nature of the questions. If the questions had to be explained to a youth and her or his response had to be written down on her or his behalf, the youth might have felt obliged to provide the answers that the interviewer would find acceptable. This would mean that true and honest answers might not have been provided which would jeopardise the integrity of the study and nullify the findings.

### **3.5 DATA COLLECTION**

Polit and Beck (2008:751) refer to data as pieces of information collected from the study. In the current study the 'pieces of information' were obtained through the administration of a



questionnaire distributed to each youth by the researcher at the two selected PHC clinics in Mpumalanga. The respondents that complied with the inclusion criteria were provided with respondent information leaflets in their own language (see Annexures D and E) and written consent was obtained from each to participate in the study.

The data were collected over a period of two weeks in Clinic A and Clinic B. As mentioned earlier, access to respondents was easy; therefore, it was possible to select and obtain informed consent from the desired number of 200 respondents within two weeks. The questionnaire was self-administered which ensured a high return rate; from the total 200 questionnaires distributed, 195 were returned fully completed.

### **3.6 ADVANTAGES OF A QUESTIONNAIRE**

The advantages of using the questionnaire as a tool for data collection in this quantitative study is that it was self-administered; it included questions that were arranged in a sequential or then logical order which encouraged the respondents to answer all the questions, and the questionnaires covered a large number of respondents in a shorter period thus facilitating economic use of time for both the respondents and the researcher (Polit & Beck, 2008:324). Secondly, the questionnaire was written in clear and simple English and isiZulu and common, known words were used that were understood by the respondents. Thirdly, the types of questions were multiple-choice and closed-ended. With the closed-ended questions the respondents only had to indicate with a tick either 'Yes' or 'No' (dichotomous questions) (Polit & Beck, 2008:324).). There were 17 questions included in the questionnaire and it took each respondent about 30 minutes to complete; therefore, completing the questionnaire did not take up a lot of the respondents' time.

### **3.7 DISADVANTAGES OF A QUESTIONNAIRE**

The disadvantage of using questionnaires is that respondents might return unanswered papers if the questions are not understood, and if the perception of the investigated group is of a sensitive nature. Also, it is easy for the respondents to ignore a question if they are left to complete the questionnaire in their own time (Hassan & Marston, 2010:33). However, in this study only 5 respondents did not complete most parts of the questionnaire and therefore the incomplete questionnaires were treated as spoiled questionnaires.

### **3.8 HOW QUESTIONNAIRES WERE MANAGED**

The researcher arranged one month's leave from her work for data collection. She arranged with the managers of Clinic A and Clinic B for a private area where the questionnaires could

be administered and completed by individual respondents. To ensure confidentiality all respondents were requested not to write their names on the questionnaire and only one respondent at a time was sampled to complete a questionnaire. This guaranteed anonymity.

The completed questionnaires will be kept under lock and key in a safe office at the institution where the researcher is employed for 15 years as stipulated in the policy of the university.

### **3.9 DATA COLLECTION INSTRUMENT**

The data collection instrument used in this study was a questionnaire developed by Lin et al. (2005:471) in the USA based on the Health Belief Model (HBM). The researcher modified and adopted the questionnaire to be aligned with the objectives and context of the current study. There was no need to ask for permission to use the questionnaire since it is freely accessible.

The questionnaire was divided into two sections, A and B, and the combined total number of questions was 25. Section A consisted of eight questions relating to the demographic information of the respondents and included name, gender, age, relationship status, work experience and educational status. Section B had 17 questions that focused on the risk behaviours that were in line with the selected HBM concepts, namely perceived susceptibility, perceived severity, perceived barriers and perceived self-efficiency. (See Annexure F and G for the questionnaires in isiZulu and English respectively). The questions were arranged sequentially and logically to encourage the respondents to answer all the questions (Polit & Beck, 2008:426).

### **3.10 VALIDITY AND RELIABILITY OF THE INSTRUMENT**

#### **3.10.1 Validity**

Validity refers to the extent to which a measurement is well founded and corresponds accurately to the real world; the extent to which the measurement can reflect the actual construct being examined (Burns & Grove, 2009:757). Validity explains the soundness of data obtained based on the method used and it also refers to the degree to which the instrument can measure what the researcher is intending to measure (Polit & Beck, 2008:196). In this study the following types of validity were assured: face validity and content validity.

### *Face validity*

Burns and Grove (2009:381) explain face validity as the relevant appearance of the measuring instrument/tool to those who would use it. The study supervisors and a statistician assisted the researcher in adapting the questionnaire so that it would in fact measure the risk behaviours that were investigated in this current study. All risk behaviours that would expose the youths to contract STIs including HIV and AIDS were included and based on the literature review.

### *Content validity*

Polit and Beck (2012:336) explain content validity as a measure of how the tool or instrument is relevant to measure the target construct; it is a similar definition to that of Burns and Grove (2009:381). The authors Polit and Beck (2012:336) together with Burns and Grove (2009:381) agree that content validity refers to “the degree in which the instrument or tool has an appropriate sample of items that will cover the construct domain” (Polit & Beck, 2008:458).

In the current study content validity was assured by including questions that related to the risk behaviours that youths may be involved in that could result in them contracting STIs including HIV and AIDS. Moreover, an expert in the sexual and reproductive health of the youth was consulted to assess the type of questions that had to be asked on their sexual and reproductive health to elicit data relevant and focusing on their risk behaviours for contracting STIs, HIV and AIDS. A supervisor who had previously been involved in this study and who was an expert in research studies using the HBM was also consulted.

### **3.10.2 Reliability**

The reliability of the instrument refers to the “ability of the instrument to perform and produce similar or the same results when administered again under similar circumstances” (Burns & Grove, 2009:719). To realise reliability in this study an existing questionnaire that had previously been used to measure the risk health behaviours of youths regarding STIs including HIV and AIDS was used after adjusting it to fit the objectives of the current study. A draft of the questionnaire was presented to the statistician to ensure that the questions would be understood and correctly interpreted by all youths of different literacy levels and, subsequently, that the results would be similar despite the difference in the respondents’ literacy levels. A pilot test was conducted to make certain that the questions were viable and would render information relevant to the research topic.

### **3.10.3 Pilot testing**

Polit and Beck (2008:213) state pilot tests are done by researchers to test the feasibility of the questions to be used in a questionnaire. Secondly, to identify potential problems and, thirdly, to estimate the costs that will be used for the study. Therefore, before the main study was conducted, the researcher obtained permission from the relevant committees to select five youths to do a pilot study in one of the PHC clinics in Mpumalanga. The five completed questionnaires were collected from a drop box and the results were discussed with the supervisors to assess whether questions used in the questionnaire (as the data collection tool) would indeed provide information on the risk behaviours of youths that exposes them to STIs including HIV and AIDS in selected PHC clinics in Mpumalanga. The questionnaire was not altered after a data analysis had been completed together with the supervisor. The information or respondents that participated in the pilot study was not part of the main study.

### **3.10.4 Negotiating access to research setting and respondents**

The researcher first obtained permission to do this study from the Research Ethics Committee of the University of Pretoria (see Annexure A). After permission had been granted by it, she sought permission from the manager at the Mpumalanga Provincial Office (MPO) (see Annexure B) and the manager of the Steve Tshwete municipality (see Annexure C) to conduct this study. The researcher provided these managers with the information leaflet which included the topic, objectives and data collection method (see Annexure D and E). Permission from the clinic managers was asked a week before the date on which the researcher intended to start with data collection. Access to the respondents was ensured through the clinic managers of the two selected clinics who allowed the researcher to talk to the youths. The administrator of each of the two clinics assisted her with verifying the ages of the youths who volunteered to participate in the study.

A venue was arranged for the day of data collection. The researcher explained the topic, the study objectives, data collection instrument and estimated time to complete the questionnaire to the sampled respondents. The respondents made an informed decision whether to participate in the study or decline participation. Once a written consent (see Annexure D and E) was obtained, the respondents were given the questionnaires which they completed in a private room giving one another a chance to enter into the room in each of the two clinics secured by the researcher and the respective PHC clinic managers to ensure confidentiality and privacy. The researcher handed every youth a questionnaire; explained how it had to be completed and made sure the youth understood the process. Once she had ascertained that they understood what to do, she left them alone to complete the

questionnaire in their own time. All the respondents were requested to drop the completed questionnaire into a designated box that stood in the room. At the end of each day the box was sealed and was opened during data analysis. The questionnaire was completed individually by the respondents at separate times and this procedure was applied in both of the two clinics.

### **3.11 DATA ANALYSIS**

Data analysis refers to the interpretation of data obtained from the study respondents (Nieswiadomy, 2012:39). Frequency tables were developed to represent how the respondents responded to each question.. The questionnaires were coded by the researcher and were sent to the statistician at the University of Pretoria. The statistical package for Social Sciences (SPSS) was used by the statistician (see Annexure H) to analyse the data. Interpretation and discussion of the results was done to describe the risk behaviours of youths in the Steve Tshwete municipality in the Nkangala district in Mpumalanga.

### **3.12 SUMMARY**

The research methodology of this investigation preceded the actual presentation and data analysis. Quantitative data was considered pertinent to the realisation of the study objectives. In the next chapter the researcher presents a data analysis to determine and explain the results regarding the risk behaviours of youths in Mpumalanga that cause them to contract STIs including HIV and AIDS.

## CHAPTER 4

### DESCRIPTION OF THE STUDY RESULTS AND FINDINGS

#### 4.1 INTRODUCTION

In Chapter 3 the research methodology was outlined and the research design, population, sampling, data collection methods and measures to ensure ethical integrity, validity and reliability adhered to were described in detail. In this chapter the results of the study are discussed from the data that were collected through a self-administered questionnaire to 200 respondents. The return rate of the questionnaires was 195.

For the data analysis, the collected data were coded by a statistician from the University of Pretoria and the statistical package for the Social Sciences (SPSS) was used. According to Nieswiadomy (2012:39), the data analysis refers to the interpretation of data obtained from the study respondents. The data analysis for this study is presented in frequencies, tables and graphs and supportive literature. The data were analysed using descriptive statistics.

The questionnaire consisted of two sections.

- Section A: Demographic information
- Section B: Health Belief Model (HBM) addressing risk behaviour

The objectives of this study were to:

- determine and describe the perceived susceptibility of the youth with regard to the sexual risk behaviours that expose them to contracting STIs, HIV and AIDS.
- determine and describe the barriers preventing the youth from adopting healthy sexual behaviours that will protect them from contracting STIs, HIV and AIDS.
- determine and describe the perceived severity of STIs, HIV and AIDS among the youth.
- determine and describe the perceived self-efficacy of the youth who are at risk of contracting STIs, HIV and AIDS.

The researcher identified the Health Belief Model (HBM) used by Allender and Spradley (2005:292), as the framework to study the sexual health risk behaviours of youths that exposed them to STIs, including HIV and AIDS. Although the HBM focuses on six components, in the current study the researcher used four concepts of the HBM as they were the most relevant in addressing the research topic, namely, to determine and describe the risk behaviours of the youth utilising the selected two PHC clinics in Mpumalanga and the role these risk behaviours play in exposing them to contracting STIs, HIV and AIDS. The four concepts of the HBM used were: perceived susceptibility, perceived barriers, perceived severity and perceived self-efficacy.

## 4.2 ANALYSIS OF DEMOGRAPHIC DATA OF RESPONDENTS

The demographic data of the respondents in this study included gender, age, marital status, residential address, level of education, employment status, family support, and number of dependents. As mentioned in Chapter 3 under heading 3.7 disadvantages of a questionnaire, the incomplete questionnaires were treated as spoiled questionnaires. Therefore, if all questions were answered N=195; if two respondents did not, for example answer the specific question, N=193.

### 4.2.1 Gender of respondents

Males and females had an equal chance to be included and the sampled respondents are presented in Table 4.1 below.

Table 4.1: Gender distribution (N=195)

<b>GENDER</b>	<b>FREQUENCY</b>	<b>PERCENTAGE</b>
Male	30	15.4%
Female	165	84.6%
<b>Total</b>	<b>195</b>	<b>100%</b>

As seen in Table 4.1 both males and females were included in the sample population (n=195). The majority of the respondents who attended the clinics were females n=165 (84.6%). As opposed to their male counterparts who represented n=30 (15.4%). The females utilised health services because these services include reproductive health that has been vertically designed to meet females' health needs.

According to the NAFCI (2011:1353), collecting condoms to prevent STIs including HIV and AIDS are inconsistent among the youth. Table 4.1 clearly shows a huge difference in the

numbers of males and females visiting the clinics over the period of data collection (two weeks). If one calculates then that about 84.6% of the approximately 12 000 youths between the ages of 18 to 24 who visited Clinics A and B (Hospital Statistics, 2010-2011) were females (10 152 females) and 15.4% were males (1 848 males). It is thus reasonable to deduce that a significantly higher number of females might have collected condoms from the clinics apart from visiting them for sexual health related issues. These results would correspond with the NAFCI's statement that collecting condoms to prevent STIs including HIV and AIDS are inconsistent among the youth (NAFCI, 2011:1353). "Slightly more than half of all people living with HIV are women and girls. In sub-Saharan Africa, more women than men are living with HIV, and young women aged 15-24 years are as much as eight times more likely than men to be HIV positive. Protecting women and girls from HIV means protecting against gender based violence and promoting economic independence from older men" (WHO, 2010a:10). Of concern in the current study is that, despite the fact that reproductive health that constitutes of ongoing education to the youth of why condoms must be used during sexual intercourse, making them aware of the dangers of unprotected sex and supplying them with condoms during each visit, many nonetheless return for treatment of repeated STIs or when they have become pregnant.

#### 4.2.2 Age of respondents

To identify and describe the sexual risk behaviours related to age, the ages of the respondents had to be determined. In table 4.2 the different age groups of the respondents (N=193) are indicated. Two respondents returned questionnaires not answered on this question.

Table 4.2: Age of respondents (N=193)

AGE	FREQUENCY	PERCENTAGE
18	16	8.2%
19	21	10.8%
20	24	12.3%
21	20	10.3%
22	24	12.3%
23	37	19.0%
24	51	26.2%
<b>Total</b>	<b>193</b>	<b>98.97%</b>



The majority of respondents were 24 years old. This was more than half of the sample population  $n=51$  (26.4%). The second highest percentage was found in the age group 23 years  $n=37$  (19 %). A similar number of respondents  $n=24$  (12.3%) were 22 years old,  $n=20$  (10.3%) were 21 years,  $n=24$  (12.3%) were 20 years and  $n=21$  (10.8%) were 19 years. Only  $n=16$  (8.3%) were 18 years old. However, in this study not all respondents completed all the parts of questionnaire and therefore the incomplete questionnaires were treated as spoiled questionnaires.

One of the key populations identified by the National Strategic Plan for HIV, STIs and TB (NSP) who are most at danger of being exposed to and/or transmit STIs, HIV and AIDS includes 24-year old women since women between the ages of 15 and 24 are “four times more likely to have HIV than males of the same age” (NSP 2011-2016:25). In addition, it is noted in the NSP that, on average, “young females become HIV-positive about five years earlier than males” (NSP, 2011-2016:25).

#### 4.2.3 Marital status

The question regarding respondents’ marital status was to identify the sexual risk behaviours affecting youths who are single, separated, in long-term relationships or married. All participants answered this question ( $N=195$ ).

Table 4.3: Marital status ( $N=195$ )

RESPONSES	FREQUENCY	PERCENTAGE
Single	142	72.8%
Married	37	19.0%
Separated	2	1.0%
Living together	14	7.2%
<b>Total</b>	<b>195</b>	<b>100%</b>

Regarding the relationships status of the respondents, table 4.3 indicates that most of the respondents were single  $n=142$  (72.8%). Only  $n=2$  (1%) were separated while  $n=37$  (19%) were married. Of the 195 respondents,  $n=14$  (7.2%) were living with partners. The majority  $n=142$  (72.8%) of the respondents were single youths. It also emerged that most of the youths (61.0%) were parents (see table 4.9).

It can be posited that some single youths who have children may have a lack of knowledge about how to practise safe sex and prevent a pregnancy. Also worth noting is that in table

4.6 it is reflected that n=143 (73.3%), did not earn a salary. In table 4.10 it is indicated that n=97 (61.0%), had to support their own children. It can be seen as contributory factor for financial aid to have children whether youths are married, divorced, separated or single. In a study conducted by Makiwane (2010:193) regarding the government's support grant in South Africa, it was found that there was an increase in young people having children. Social and economic issues (poverty) apparently contributed to youths becoming parents at an early age. Child support grant is the state money that is given to parents who are not able to maintain their children due to unemployment and chronic illnesses like HIV (Makiwane, 2010:194).

#### 4.2.4 Distribution of residential areas

Determining where the youths resided was important because it indicated the residential areas that were closest as well as the furthest from the clinics. It also to a certain extent gave an indication of their lifestyle and who their friends were. Most importantly, it could be established whether the youths attending the two clinics were from the local (near) or rural (far) communities. Table 4.4 shows the distribution of the residential areas. All participants answered this question.

Table 4.4: Distribution of residential areas (N=195)

AREAS	FREQUENCY	PERCENTAGE
Farm	47	24.1%
Town	80	41.0%
Township	65	33.3%
Informal settlement	3	1.5%
<b>Total</b>	<b>195</b>	<b>100%</b>

The majority of the youths n=80 (41.0%) resided in the town where the clinics were situated. As indicated in table 4.4 above, n=65 (33.3%), lived in the township, n=47 (24.1%) came from the surrounding farms while only n=3 (1.5%) stayed in the informal settlement.

This study was conducted in a semi-rural area where primary healthcare services (PHC) including reproductive health were provided in the two clinic settings in town. The representation of only n=47 (24.1%) youths from farms who visit the clinics in town is understandable if one considers that mobile clinics visit the surrounding farms once a week to render PHC including reproductive health. Farmers in this area apparently have regular

transport problems and cannot always travel to the satellites clinics about 10-50 km from their farm. It can thus be posited that the young farm dwellers may be in the position where they have limited access to information on reproductive health and other health related issues. Netangaheni (2008:1) observes that for people who live far from facilities where treatment for STIs, HIV and AIDS can be given, early diagnosis or treatment of any of these diseases can be difficult because they live far from the PHC clinics where a diagnosis can be made or a treatment plan can be worked out by the professional nurse.

It was a positive result that approximately  $n=145$  (74%) of the respondents did have access to the two PHC settings as they resided in town and township near the town. Only a minimal percentage came from a disadvantaged environment: from the informal settlement around the mines and farms. Although respondents from the informal settlement were in a lower percentage  $n=3$  (1.5%) in this study their risks also needed to be addressed so that their susceptibility to STIs, HIV and AIDS can be prevented. Sverdlik's (2011:123) findings indicate that the effect that living in an informal settlement can have on the young individual's health and lifestyle, is multifaceted. No or little access to proper PHC services including reproductive health; extreme poverty which may lead to dangerous sexual encounters (young women may have older partners to obtain money and a condom is not used); they are not knowledgeable about STIs, HIV and AIDS and can contract these diseases (having multiple sex partners and not knowing their status); and premature death (by early childbirth, a backstreet abortion or from AIDS).

#### **4.2.5 Levels of education**

For youths to understand the risk behaviour that exposes them to STIs including HIV and AIDS, literacy, knowledge, understanding *why* these behaviours are dangerous, and being enlightened as to *how* to protect themselves, are extremely important. Table 4.5 illustrates the educational level of the respondents in this study. One respondent did not answer this question.

Table 4.5: Levels of education of the youths (N=194)

EDUCATIONAL LEVEL	FREQUENCY	PERCENTAGE
Little/No schooling	1	.5%
Grade 7	5	2.6%
Grade 8	2	1.0%
Grade 9	8	4.1%
Grade 10	21	10.8%
Grade 11	39	20.0%
Grade 12	69	35.4%
Certificate	24	12.3%
Diploma/Degree	23	11.8%
Postgraduate degree	2	1.0%
<b>Total</b>	<b>194</b>	<b>99.48%</b>

The highest number of respondents, n=69 (35.4%) had passed Grade 12. Next were respondents who had completed Grade 11 n=39 (20.1%). Some respondents n=24 (12.3%) had obtained certificates, n=23 (11.8%) had obtained diploma or degree with n=2 (1%) having a postgraduate degree. The results report that the majority n=69 (35.4%) had a matric certificate.

In the South African schools, a Life Skills Education (LO) programme forms part of the curriculum in schools. Learners are taught how the body functions but, more importantly, in this subject learners learn about safe health promotion at both primary and high school levels. Taking into consideration that the majority of the respondents n=69 (35.4%) in this study had passed Grade 12, it can be deduced that these youths are expected to have knowledge about reproductive health because they received relevant education from primary level (Van Deventer, 2009:2). Bosky (2010:1) supports Van Deventer (2009) and adds that youths should actually be much more aware of avoiding sexual risk behaviours that can lead

to STIs, HIV and unintended pregnancies because they receive comprehensive formal education starting from primary school years. According to this author, youths should demonstrate more assertiveness in sexual relationships, for example, they must be able to say 'no' to unprotected sex. The UNAIDS Global Report (2010c:68) reports that improving the prevention of HIV and risk behaviours through knowledge is still a global problem. It states "less than half of young people living in 15 of the 25 countries with the highest HIV prevalence" (South Africa included) "can correctly answer five basic questions about HIV and its transmission."

Noted in table 4.5 is also that a combined  $n=49$  (25.1%) of the respondents had post-matric education (certificates, a diploma or degree and a post-graduate degree). If it is assumed that the higher the level of their education, the more youths will be aware of the consequences of engaging in sexual activities, tables 4.3 and 4.10 clearly shows that this is seemingly not the case. In table 4.3 the majority  $n=142$  (72.8%) reflected they were single and in table 4.10  $n=97$  (61%) listed their own children as the type of dependents. Furthermore, table 4.1 indicates the majority  $n=165$  (84.6%) of respondents were female.

The statistics noted in Chapter 1, Section 1.3, namely, that nurses consulted approximately 50 youths per month in each of the two clinics and that all of them presented with different STIs and that from April 2010 to March 2011 the number of youths treated for STIs including HIV and AIDS in one clinic only was 415 cases. The maternity ward statistics gathered from the feeder hospital recorded a number of 2 938 hospital deliveries in one year with 857 of these mothers HIV positive and on antiretroviral treatment (ART) at the time of delivery. In the month of March 2011 alone 19 of the mothers who delivered in this maternity ward were between 18 and 24 years and HIV positive (Hospital Statistics, 2010-2011). It is obvious that formal education on sexual risk behaviour seemingly plays a very small role in preventing youths' exposure to contracting STIs, HIV and AIDS through sexual risk behaviours.

#### **4.6 Are you currently earning a salary?**

In Table 4.6 respondents' employment status is indicated. The intent with this question was to determine whether the respondents earned a monthly salary. All respondents answered this question.

Table 4.6: Earning a salary (N=195)

REPONSES	FREQUENCY	PERCENTAGE
Yes	52	26.7%
No	143	73.3%
<b>Total</b>	<b>195</b>	<b>100.0%</b>

The results show that a high percentage, n=143 (73.3%) of the female and male youths were not employed. The factor that could contribute to this finding was that some of the respondents might still have been attending school or furthering their studies at the time of study. The remaining n=52 (26.7%) indicated that they were employed and earning a salary or an income. Unemployment as a contributory factor to risk behaviour was identified in this study findings as unsafe sex practices to obtain money for daily basic needs. Money is also needed to lead a healthy lifestyle. Mthobeni and Peu (2013:3) state: “A healthy life style in respect of HIV and AIDS-affected families would involve, amongst other things, the promotion of eating nutritious food, physical exercise, and avoiding activities that may lead to opportunistic infections and re-infection by HIV.”

Davis (2009:267) confirms that poverty and unemployment can lead to negative risk behaviours such as having multiple partners or unprotected sex that, in turn, can result in the youth being infected with STIs including HIV and AIDS. In Davis’ study it was revealed that individuals with a high poverty status were more likely to have sex more frequently with different partners. Davis (2009:280) further determined that 77% of new STI cases were youths between the ages of 20 and 24 years and who lived in poverty. Poverty is a negative contributory factor towards youths’ risk behaviours of practicing sex without condom use. It can be assumed that they either have no money to spend on condoms or that they are not knowledgeable about either practising safe sex or the fact that condoms are freely available at clinics. Galvez-Buccollini et al. (2009:1471) identify unemployment as a contributory factor to young females having multiple partners. Poverty drives them to practice unsafe sex with many male partners.

#### 4.2.7 Are you the sole bread winner?

In Table 4.7 below the responses of the youths on the question whether they were the main source of income (sole bread winner) in the family are summarised.

Table 4.7: Are you the sole bread winner? (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	39	20.0%
No	156	80.0%
<b>Total</b>	<b>195</b>	<b>100.0%</b>

By far the majority n=156 (80%) was not the main breadwinner which left n=39 (20%) stating they were, in fact, the sole provider for their families.

Poverty is one “of the major contributors to poor health through food insecurity, which in turn is linked to HIV and TB acquisition and poor treatment adherence” (NSP, 2012 – 2016:37). Chizororo (2010:711) found from a study conducted in Zimbabwe about growing up without parents that youths in some families are left alone by their parents at an early age due to HIV and AIDS related diseases and they become heads of the family; they become the breadwinners and is then their responsibility to provide food and care for their young brothers and sisters. According to Statistics South Africa (2010:8), the estimated number of AIDS orphans by mid-year 2010 would have been 1.99 million in the country.

#### 4.2.8 Dependents

The table below will illustrate responses regarding dependents. All respondents answered this question.

Table 4.8: Dependants (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	126	64.6%
No	69	35.4%
<b>Total</b>	<b>195</b>	<b>100.0%</b>

The majority of respondents n=126 (64.6%) indicated they had dependants while the remaining n=69 (35.4%) respondents had none. This means more than half of the 195 respondent youths in this study had the responsibility of taking care of someone in the family. Table 4.10 shows n=97 (61%) of the respondents had to take care of their own children with n=143 (73.3%) (Table 4.6) not earning a monthly salary. As indicated in table 4.1, by far the majority n=165 (84.6%) were females. It is noted by Kotwal and Prabhakar

(2009:197), who conducted a study on the problems faced by single mothers, that they experience great difficulties in caring properly for their children due to financial constraints. It leads to poverty resulting in poor eating habits for both mother and child that often result in repeated consultations for medical assistance. Porras, Sabido, Fernandez-Davila, Fernandez, Batres and Casabona (2008:529) included poverty as one of the factors that diminish females' ability to negotiate condom use as such they are at risk of acquiring an STI or HIV infection.

#### 4.9 Number of dependents

In Table 4.9 below the number of dependants is presented in frequencies and percentages. Only 114 respondents answered this question.

Table 4.9: Distribution of the number of dependants (N=114)

DEPENDANTS	FREQUENCY	PERCENTAGE
1	73	37.4%
2	26	13.3%
3	9	4.6%
4	2	1.0%
5	3	1.5%
6	1	0.5%
<b>Total</b>	<b>114</b>	<b>58.46%</b>

A total of 126 respondents had dependants, amounting to n=126 (64.6%) of the total of 195 respondents as seen in table 4.8. In table 4.9, which represents the results of the follow-up question to table 4.8, (if the respondents did have dependents they had to indicate the number of dependants) showed an inconsistency with table 4.8. In table 4.9 a total of n=73 (37.1%) respondents indicated they had one dependant; n=26 (13.3%) had 2 dependants; n=3 (4.6%) were responsible for three dependants with 1% and 1.5% having four and five dependants respectively. Only n=1 (0.5%) of the respondents had six dependants which brings the total percentage of youths who responded to this question to only n=114 (58.46%). Therefore, when the results of these two questions (Questions 4.8 and 4.9) are compared, it indicates that they either did not understand Question 4.9 or were not prepared to provide information.



#### 4.2.10 Types of dependants

In Table 4.10 the distribution of the types of dependants are presented.

Table 4.10: Types of dependants (N=159)

DEPENDANTS	NUMBER	PERCENTAGE
Parents	35	22.0%
Siblings	18	11.3%
Relatives	9	5.7%
Own children	97	61.0%
<b>Total</b>	<b>159</b>	<b>81.53%</b>

The question regarding the number of dependants for the respondents based on categories like parents, siblings, relatives, and their own children was answered by n=159; (81.53%) meaning 36 did not answer this question. According to the results in table 4.10, those who cared for their own children counted n=97 (61.0%). The other noteworthy results are that parental care constituted n=35 (22%) and siblings n=18 (11.3%). These results, when compared to tables 4.3 and 4.6 where all the respondents n=195 (100%) gave feedback and n=142 (72.8%) indicated they were single parents (Table 4.3) but n=143 (73.3%) (Table 4.6) did not have a monthly income, raises the question of what economic means the respondents had of supporting their dependants. Also, it leaves one to ponder what other means of income were received if, as indicated in table 4.7, a high n=156 (80%) respondents were not the sole provider.

Single parents, according to Kotwal and Prabhakar (2009:197), experience financial problems. Consequently, they experience major stress that can lead to chronic illnesses. In the current study, the results revealed the high prevalence of house-headed youths as approximately n=39 (20%) (Sole bread winner) who provided care to other family members who were not their own children. Households headed by youths, as stated by Evans (2010:2), are deprived of socialisation with parents; it can be argued that these youths may have been deprived of having been taught a value system as they had no parent to instil it or lead by example. Caring of siblings includes the responsibility to taking the former to the clinics for immunisations and follow-up treatment if it was needed (Evans, 2010:5). Also, the responsibility of having dependants might have negatively influenced their education

because there was little time for studying. Yet, this seems not applicable to the youths in this study as the majority had quite a high educational level Grade 12 was n=69 (35.4%); a post-matric certificate n=24 (12.3%), and a diploma or degree n=23 (11.8%) as shown in table 4.5.

Evans, (2010:5) did a study about the experiences and priorities of young people who care for their siblings in Tanzania and Uganda. Evans (2010:5) determined that youths become responsible for their siblings as the result of deaths of family members (parents, siblings with children) caused by HIV related diseases. Children being left orphaned are one of the dire consequences of the HIV and AIDS epidemic. According to the NSP (2012-2016:36) the “number of orphaned and children made vulnerable by HIV has increased over the years”. UNAIDS (2010d:114) reports that in six sub-Saharan countries (including South Africa) over 9 million between 0-17y ears-old have been orphaned due to AIDS.

### **4.3 ANALYSIS OF SECTION B: THE USE OF THE HEALTH BELIEF MODEL IN IDENTIFYING AND DESCRIBING THE PERCEPTIONS AND RISK BEHAVIOURS OF YOUTHS REGARDING SUSCEPTIBILITY, BARRIERS, SEVERITY, AND PERCEIVED SELF-EFFICACY**

The aim of this section was to identify and describe the risk behaviours of youths using the identified four components of the Health Belief Model (HBM) to understand the youth’s perception on sexually related questions regarding the prevention of STIs including HIV and AIDS. The HBM components that were included were:

4.3.1 Perceived susceptibility to contract STIs including HIV and AIDS

4.3.2 Perceived barriers to prevent STIs including HIV and AIDS

4.3.3 Perceived severity of signs and symptoms of STIs including HIV and AIDS

4.3.4 Perceived self-efficacy to prevent STIs including HIV and AIDS

#### **4.3.1. Perceived susceptibility to contract STIs including HIV and AIDS**

This component included issues around sexual practices that may be risky among respondents such as early sexual debut, sexual history and being sexual active including the use of condom. Findings and discussions about the responses from the 195 respondents on their perceptions and risk behaviours regarding susceptibility, barriers, severity, and perceived self-efficacy are presented next.

#### 4.3.1.1 *The distribution of the number of youths who are sexually active*

All 195 respondents answered the question.

Table 4.11: Number of youths who were sexually active (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	162	83.1%
No	33	16.9%
<b>Total</b>	<b>195</b>	<b>100.0%</b>

This question was asked to determine the youths' risk to contract STIs including HIV and AIDS. The results show that of the youths between 18 and 24 years old, the vast majority n=162 (83.1%) were sexually active. The combined factor that n=162 (83.1%) (table 4.11) were sexually active, n=142 (72.8%) were single (table 4.3) and n=97 (61%) (table 4.10) already had children indicates that high risk exists for youths to contract STIs including HIV and AIDS. Having a child means one was involved in unprotected sex, no condom was used; STIs, HIV and AIDS transmission to and from one or both partners is then possible.

Factors such as insufficient income and values and norms of the group to choose either to use a condom as the preventive measure against STIs including HIV and AIDS exposes sexually active youths to other risks such as unintended pregnancy (Krishnan, Megan, Dunbar, Minnis, Medlin, Gerdtts et al. 2008:101). An unintended pregnancy can also lead to an unsafe abortion which can lead to the death of the mother. An unsafe abortion is "due largely to unmet need for family planning, contraceptive failure, lack of information on contraception" (WHO, 2014:par. 2).

South Africa Health Review [SAHR] (2010:36) reports that despite a marked increase in the rates of condom use (a reported 87% of males between 15 and 24 and 73% of females between 15 and 24), other drivers of STIs, HIV and AIDS that need to be urgently addressed are early sexual debut, gender based violence and gender inequality, multiple concurrent sex partners and a lack of knowledge about HIV and HIV status. According to the UNAIDS Global Report of 2010, those especially in support of knowledge and support are females because just more than half of all people living with HIV are women and girls. "In sub-Saharan Africa, young women aged 15-24 years are as much as eight times more likely than men to be HIV positive. Protecting women and girls from HIV means protecting them against gender based violence and "promoting economic independence from older men."(UNAIDS Global Report, 2010a:10).

#### 4.3.1.2 At what age did you first have sexual intercourse?

Of the 195, only 181 responded to the age of their sexual debut. Fourteen (14) did not respond.

Table 4.12: Youths' first sexual intercourse (N=181)

AGE	FREQUENCY	PERCENTAGE
13	1	5%
14	11	5.6%
15	13	6.7%
16	25	12.8%
17	31	15.9%
18	50	25.6%
19	20	10.3%
20	18	9.2%
21	6	3.1%
22	2	1.0%
23	3	1.5%
24	1	0.5%
<b>Total</b>	<b>181</b>	<b>92.82%</b>

N=1 (5%) respondent's sexual debut was at 13 year. The percentages increased with every age and the highest sexual debut was at 18 years from n=50 (25.6%) and n=20 (10.3%) at 19 years of the respondents. The most had their first sexual intercourse between 18 years n=50 (25.6%) and n=18 (9.2%) 20 years-old. On the one hand, it is quite positive and in line with the findings in the SAHR (SAHR) (2010:38) that making available information through formal and informal education and mass media programmes has impacted significantly on young people "knowledge levels and behaviours in relation to condom usage and HIV testing". But, having multiple partners and knowing the risks of contracting STIs including HIV and AIDS still seem to be a problem in the country (SAHR, 2010: 38). In their Global Report, UNAIDS (2010b:30) states sex work (paid sex) is still a significant factor in many of the HIV epidemics in sub-Saharan Africa; it further states that available "evidence suggests that in sub-Saharan Africa, as elsewhere in the world, the majority of men who have sex with men also have sex with women".

Table 4.10 shows the overall majority of n=97 (61.0%) respondents reflected they had their own children. It therefore seems as if additional factors influenced the youths' sexual risk behaviours. It may include pressures like living in an unsafe neighbourhood where a crime like rape can occur or alcohol and drugs are available, peer group pressure (Lohman & Billings, 2008:724). Cultural beliefs that the female is the submissive partner and not allowed to negotiate for safe sex and domestic violence can be other contributory factors. In table 4.4 the results show most of the respondents lived in the town n=80 (41.0%) and in the township n=65 (33.3%). A township is usually situated close to the town for easy transport and work opportunities. However, considering that two PHCs staffed with professional nurses were available and accessible for reproductive healthcare, the results on sexual debut is troublesome.

#### **4.3.1.3 Sexual intercourse over the past six months**

Whether respondents were sexually active in the last six and 12 month may indicate that they were possibly in the window period, especially if they did not use the condom. The table below indicates the distribution of the results about the sexual activity of the respondents in the past six months. One did not answer the question.

Table 4.13: Sexual intercourse in the past six months (N=194)

<b>RESPONSES</b>	<b>FREQUENCY</b>	<b>PERCENTAGE</b>
Yes	128	65.6%
No	66	33.8%
<b>Total</b>	<b>194</b>	<b>99.48%</b>

The respondents were asked whether they had engaged in sexual activity in the six months before this study was conducted. An overall majority n=128 (65.6%) confirmed they had and n=66 (33.8) they hadn't. The aim of this question was to identify the respondents' vulnerability to contract STIs. This question was followed by questions to determine the abstinence rate for 12 months among the respondents (table 4.14) and condom use (table 4.15) for those who did not abstain from sex.

#### **4.3.1.4 Sexual intercourse over the past 12 months**

Of the 195 respondents, only four did not answer this question. There are two possible ways to interpret this data. Firstly, by not answering can indicate that these four youths assumed that the researcher would know they did not have sexual intercourse if they did not answer it. Secondly, they might not have read or understood the question. The last possibility,

however, seems unlikely because it was a straightforward question. As for the first explanation, it leaves scope for discussion.

Table 4.14: Sexual intercourse in the past 12 months (N=191)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	143	73.3%
No	48	24.6%
<b>Total</b>	<b>191</b>	<b>97.94%</b>

A high majority n=143 (73.3 %) responded in the affirmative while n=48 (24.6%) responded that they were not involved in sexual activities. The risks to contract STIs including HIV and AIDS were further determined by asking the respondents if they had used a condom with the last sexual contact in the next question. The responses of the four who did not answer this question were not included in determining the results.

#### **4.3.1.5 When having sexual intercourse do you use a condom?**

The respondents were youths between the ages of 18 and 24 years therefore they were expected to have the sexual knowledge to make an informed decision about the necessity of using a condom to protect them from contracting or transmitting STIs including HIV and AIDS. The results are reflected in table 4.15. As can also be seen, there was a low response as only 186 youths responded to this question. This must be borne in mind when interpreting the results from table 4.15.

Table 4.15: Condom use when having sexual intercourse (N=186)

RESPONSES	FREQUENCY	PERCENTAGE
Never	41	21.0%
Seldom	4	2.1%
Sometimes	70	35.9%
Usually	15	7.7%
Always	56	28.7%
<b>Total</b>	<b>186</b>	<b>95.38%</b>

Table 4.15 shows a disappointing result: n=70 (35.9%) sometimes used a condom and n=41 (21%) never used one. Those who always practised safe sex constituted only n=56 (28.7%).

It is a concern and these results clearly report the youth in Mpumalanga are not knowledgeable about sexual risk behaviours including having unprotected sex and they are therefore at risk to contract STIs including HIV and AIDS.

Relating to the period before the study was conducted, the percentage results in table 4.13 show that  $n=128$  (65.6%) of the youths had been sexually active for the previous six months,  $n=143$  (73.3%) had been sexually active in the past 12 months (table 4.14). The combination percentages  $n=130$  (66.7%) that never used a condom, seldomly used one and sometimes or usually indicated there was a high risk of youths between 18 and 24 of becoming infected or transmitting the diseases. Shovelled, Johnson, Rosenberg, Greaves, Patrick, Oliffe et al. (2009:397) conducted a study about the youths' experience with STIs in Canada and found that although they may have knowledge about STIs including HIV and AIDS; the application of that knowledge may be negatively affected by other forces like gender inequality, the place where the youths reside, culture, and physical space. Youths are still ignoring condom use as a protection measure against STIs including HIV and AIDS. The current study results confirm the statement by Godia, Olenja, Lavussa, Quinney, Hofmanan, and Van den Broek, (2013:17) that, the youths are not adhering to the advice given that condom use is a measure to be used for dual protection purposes (condom is used for the prevention of STIs including HIV and AIDS and unwanted pregnancies).

In addition, about  $n=130$  (66.7%) the combination of responses, never used a condom, sometimes and usually, of the respondents in this study may be in HIV window period and they needed to be sought out and be educated on the importance of knowing their HIV status, the window period, the stages of HIV, and the importance of safe sex (WHO Fact Sheet, 2009:2). In the study of Botma et al. (2007:53) some learners said there was enough information in the media on safe sex, STIs and HIV and AIDS and they also received lots of information from visiting health workers in schools, but "it is just ignored by many young people". These same young participants all agreed that a prominent factor in the spreading of STIs, HIV and AIDS was prostitution (which they ascribed to poverty) and some said there were still misconceptions among the youth that condoms have holes or can burst (Botma et al., 2007:55). All the learners agreed that abstinence was the best way of protection against STIs including HIV and AIDS (Botma et al., 2007:55).

According to UNAIDS (2010a:12), among young people aged 15–24 years ("who are frequently at the highest risk of infection") knowledge and how to prevent HIV infection is on the increase: "Six countries have achieved greater than 80% condom use at last higher-risk sex among males, and two countries have achieved this high level of condom use among

females.” But, as UNAIDS (2010a:12) states further, “young people still lack knowledge and, importantly, often lack the tools they need to practice HIV risk-reduction strategies”.

### 4.3.2 Perceived severity of STIs including HIV and AIDS

Perceived severity entails the individual’s beliefs about the severity of the illness (Allender & Spradley, 2005:292). The individual may know about the illness but foster the belief that it will not cause any complications. This component covers the study questions like knowledge about the youths’ own and their partners’ HIV status, history of treatment, and other infections like syphilis, gonorrhoea, herpes, hepatitis B, chlamydia, HIV and AIDS.

#### 4.3.2.1 When last did you test for HIV?

The responses from the respondents about their last HIV test are tabled below. Of the 195 respondents 193 answered this question two did not respond to this question.

Table 4.16: When last did you test for HIV? (N=193)

RESPONSES	FREQUENCY	PERCENTAGE
Never	20	10.3%
Last month	55	28.2%
In last 6 months	61	31.3%
Last year	38	19.5%
2 years ago	11	5.6%
Cannot remember	8	4.1%
<b>Total</b>	<b>193</b>	<b>98.97%</b>

The responses indicated that n=20 (10.3%) had never tested; n=55 (28.2%) had been the previous month; n=61 (31.3%) indicated in the previous six months; n=38 (19.5%) the previous year and n=11 (5.6%) responded they got tested 2 years ago. Eight (4.1%) could not remember when last they had been tested for HIV. The results in table 4.16 are discussed in combination with the results of tables 4.17 and 4.18 as it will identify and describe the ability of the youth to realise their susceptibility in contracting STIs including HIV and AIDS from their sexual partners.



#### 4.3.2.2 Do you know the HIV status of your partner?

The table below illustrates the knowledge of youth regarding the HIV status of their sexual partner, of the 195 respondents one did not respond on this question.

Table 4.17: Youths knowing the HIV status of their partner(s) (N=194)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	138	70.8%
No	56	28.7%
<b>Total</b>	<b>194</b>	<b>99,48%</b>

One hundred-and-thirty-eight (70.8%) indicated they did know and n=56 (28.7%) did not know the HIV status of their partners.

#### 4.3.2.3 When last did your partner test for HIV?

Four respondents did not answer this question.

Table 4.18: When last did your partner test for HIV? (N=191)

RESPONSES	FREQUENCY	PERCENTAGE
Never	20	10.3%
Last month	40	20.5%
In last 6 months	47	24.1%
Last year	30	15.4%
2 years ago	10	5.1%
Cannot remember	44	22.6%
<b>Total</b>	<b>191</b>	<b>97.94%</b>

The results from table 4.18 show the responses as follows: n=20 (10.3%) responded that their partners had never tested; the partners of n=40 (20.5%) had tested in the previous month; in the previous six months n=47 (24.1%) partners had tested; n=30 (15.4%) of the partners had tested a year ago; and n=10 (5.1%) partners had tested for HIV two years before the study was conducted. Forty-four (22.6%) could not remember when last their partners had been tested for HIV, meaning that either they had not discussed their own as well as their partner's HIV status.

Tables 4.13 and table 4.14, respectively indicates that in the 6 to 12 months' period before the study respondents had been engaged in sexual activities. Table 4.11 also show that the majority of respondents n=162 (83.1%) agreed they were living sexually active lives. Therefore, not knowing their own or their partners' HIV status is worrying because it confirms that the youth in the study setting was either ignorant on how to practice safe sex; they did not care about the consequences; or they did not communicate about safe sexual practices with their partners. Neither they nor their partners were thus protected from STIs, HIV and AIDS infections. Again, the combination of percentages pertaining to the usual, sometimes, never and seldom use of condoms in table 4.15, table 4.16, table 4.17 and table 4.18 indicates that 60% of the respondents have the knowledge about STIs but (51%) did not know their partners status therefore this study reported that respondents did not take STIs including HIV and AIDS infections as a serious life-threatening illness.

Ignorance and a lack of knowledge is not acceptable because youths must know their HIV status so that they can seek for medical help early to live longer and have a better life (AVERT, 2008:1).The NAFCI, being a programme that focuses on adolescents and youths to inform them about available information on the reproductive system and safe sex practices, agree that youths remain ignorant and inconsistent to test and collect condoms to protect STIs including HIV and AIDS (NAFCI, 2011:1353).It is extremely necessary that the youth have comprehensive and correct knowledge about STIs, HIV and AIDS. South African Health Review [SAHR] (2010:36) reports that despite a marked increase in condom rates (a reported 87% of males between 15 and 24 and females between the same ages rated 73%) of the other drivers of STIs, HIV and AIDS that need to be urgently addressed are a lack of knowledge about HIV and HIV status and having multiple concurrent partners (SAHR, 2010:38).

#### ***4.3.2.4 Number of sexual partners over the last 12 months***

Sexual behaviour that leads youths to being unable to make informed decisions to prevent STIs including HIV and AIDS included the number of sexual partners as it related also to the perceived severity that could lead to failure to negotiate for the use of a condom. Fourteen respondents did not respond to this question.

Table 4.19: Number of sexual partners in the past 12 months (N=182)

NUMBER OF PARTNERS	FREQUENCY	PERCENTAGE
1 partner	159	81.5%
2 partners	14	7.2%
3-5 partners	7	3.6%
6-10 partners	1	0.5%
More than 10 partners	1	0.5%
<b>Total</b>	<b>182</b>	<b>93.33%</b>

Although the responses to this question may look positive because the majority=159 (81.4%) had only one partner, n=14 (7.2%) had 2 partners, n=7 (3.6) had 3-5 partners. The incidence of multiple sexual relationships (between 3 to 5 partners) is a concern because it means that youths with multiple partners may fail to negotiate for the use of a condom which can led to many others becoming infected with STIs including HIV and AIDS who, in turn, can transmit it to more thereby spreading the diseases.

In spite of AIDS campaigns and voluntary counselling (VCT) which are done in the Steve Tshwete Municipality as part of the reproductive health service, youths remained ignorant to find out about their status or were just not concerned to find out what it was and take treatment consistently and continuously. This is confirmed by a study done by Godia et al. (2013:18) in which it was found that youths ignored even collecting their HIV treatment. The reasons they gave were that, although they knew it was important for them to take it on a daily basis, it just slipped their minds that they were supposed to collect it. Mthobeni and Peu (2013:4) also found that there was an attitude problem among younger people – they were ignorant yet resisted taking advice from PHC staff and lacked motivation to change their sexual risk behaviours. The UNAIDS Global Report (2010b:130) notes that “traditional roles and societal values related to masculinity might encourage boys and men to adopt risky behaviours, including excessive alcohol use and concurrent sexual relationships, so increasing their risk of acquiring and transmitting HIV”.

UNAIDS (2010c:68) states in countries like the Uganda, the Democratic Republic of the Congo, Botswana and South Africa males and females still have sex with more than one partner. Also, it seems as if males are more prone than females to having more than one sexual partner (UNAIDS, 2010c:70).

### 4.3.3 Perceived barriers to take action to prevent STIs including HIV and AIDS

The issues around social practices may contribute to risk behaviours of respondents regarding sexual responsibilities. This component covers social issues like alcohol consumption and drug use for the respondent and the partner as well as the need to belong. Alcohol as a barrier to decision making regarding behaviour that will prevent the youth from becoming infected with STIs including HIV and AIDS are illustrated in tables 4.20 and 4.21. The respondents' use of drugs is reflected in tables 4.22 and 4.23.

#### 4.3.3.1 Do you use alcohol?

Only one respondent out of 195 did not answer to this question.

Table 4.20: Alcohol-using behaviour among the youths (N=194)

RESPONSES	FREQUENCY	PERCENTAGE
Never	113	57.9%
Every day	1	.5%
Weekly or on weekends	14	7.2%
At a party	52	26.7%
Only month end	14	7.2%
<b>Total</b>	<b>194</b>	<b>99.48%</b>

One respondent did not answer this question. The responses on alcohol intake was that n=113 (57.9%) said they never use alcohol; n=1 (0.5%) drank on a daily basis; n=14 (7.2%) drank weekly or over weekends; n=52 (26.7%) used alcohol at a party and n=14 (7.2%) only at the end of the month.

#### 4.3.3.2 Does your partner use alcohol?

In the second question pertaining to alcohol use the researcher wanted to know if the respondent's partner was drinking alcohol, two respondents did not respond to the question.

Table 4.21: Alcohol use by partner (N=193)

RESPONSES	FREQUENCY	PERCENTAGE
Never	87	44.6%
Every day	5	2.6%
Weekly or on weekends	29	14.9%
At a party	48	24.6%
Only at month end	24	12.3%
<b>Total</b>	<b>193</b>	<b>98.97%</b>

The responses were that n=87 (44.6%) had never taken alcohol, n=5 (2.6%) used it on a daily basis, n=29 (14.9%) drank weekly or over weekends, n=48 (24.6%) drank only at parties and n=24 (12.3%) only at the end of the month.

#### 4.3.3.3 Do you use drugs?

The youths' responses about drug use are shown in table 4.22. The aim of this question was to identify the integration of drugs and risk behaviours. All the youths responded to this question.

Table 4.22: Drug-taking behaviour of youths (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Never	186	95.4%
Every day	4	2.1%
Occasionally when stressed	2	1.0%
Only when socialising with friends	3	1.5%
<b>Total</b>	<b>195</b>	<b>100%</b>

The responses on drugs were that n=186 (95.4%) never took drugs; n=4 (2.1%) used drugs on a daily basis; n=2 (1%) occasionally when they were stressed and n=3 (1.5%) when they were socialising with friends.

#### 4.3.3.4: Does your partner take drugs?

Responses on the question whether their partners used drugs are presented in table 4.23. One participant did not respond to this question.

Table 4.23: Partner's drug-taking behaviour (N=194)

RESPONSES	FREQUENCY	PERCENTAGE
Never	184	94.35%
Every day	5	2.6%
Occasionally when stressed	3	1.5%
Only when socialising with friends	2	1.0%
<b>Total</b>	<b>194</b>	<b>99.45%</b>

The responses show that n=184 (94.35%) never used drugs; n=5 (2.6%) partners used drugs every day and n=3 (1.5%) used drugs occasionally when they were stressed. Two (1%) of the respondents' partners used drugs when socialising with friends. The results in tables 4.20, 4.21, 4.22 and 4.23 reflect that some youths used alcohol and/or drugs mainly when they were in the company of friends, this means that youths may not be able to take informed decision that may result to unprotected sex leading to be infected with STIs including HIV and AIDS and unwanted pregnancies.

Bellis et al. (2007:430) state youths escape from work and schools to socialise in a care free environment where higher alcohol consumption and drugs occur. Being intoxicated or in a drug-induced state affect a youth's responsibility to take an informed decision to protect themselves and their sexual partner (permanent partner or another partner) from contracting STIs including HIV and AIDS. As shown in Table 4.10 of the youth respondents n=97 (61%) had their own children. According to Sawyer et al. (2012:1634), the youth is now making up the majority of injectable drug users, alcohol abuse and practicing unsafe sex that increases the spread of STIs including HIV and AIDS.

A national youth and adult survey conducted in Ethiopia reported that occasional drinking of alcohol among males was not only more common in rural (11%) than urban (4%) areas, but also that alcohol use increased with age: 31% of males between 15 and 17 years drank occasionally or regularly while 46% of boys aged 21 to 24 drank occasionally or regularly.

Also, the youths in Ethiopia with no education used alcohol to a greater extent than those with a higher level of education (UNFPA, 2010:33).

In table 4.2 of this study the results show that by far the majority of youths were between 22 and 24 years old and thus, according to the UNFPA report, at the age where alcohol consumption and drug use were barriers to making informed decision about safe sex practices.

On the other hand, as shown in Table 4.1 the majority of respondents were females  $n=165$  (84.6%) while males represented  $n=30$  (15.4%). In addition, the demographics in table 4.5 indicate that the highest educational level of the respondents were Grade 12  $n=69$  (35.4%). Also, the combined majority lived in town or the townships close to the town where the study was conducted  $n=145$  (74.3%) in table 4.4. It can be argued that the respondents in this study had been exposed to the compulsory Life Orientation subject in schools that includes sexual and reproductive health as part of their formal education. More had access to alcohol and drugs because they lived in town or close by in the townships.

The “traditional roles and societal values related to masculinity might encourage boys and men to adopt risky behaviours, including excessive alcohol use and concurrent sexual relationships, so increasing their risk of acquiring and transmitting HIV” (UNAIDS, 2010e:130). Injecting drug use, according to UNAIDS (2010a:31), is a phenomenon that is slowly surfacing in Kenya, Mauritius, South Africa, and the United Republic of Tanzania. An estimated 12% of the population in South Africa use injectable drugs. Although both males and females who inject drugs experience a significant burden of HIV disease, females who inject drugs face even greater risks. Studies indicate that females who inject drugs are more likely to face violence and greater levels of stigma and are more likely to die earlier (UNAIDS, 2010c:72-73).

The reality of these results is that barriers to healthy behaviours identified some youths in Mpumalanga are involved in risk behaviours of drug abuse and alcohol consumption which means that respondents are at the risk of unprotected sex that can lead to contract and transmit STIs including HIV and AIDS. Alcohol and drug abuse are barriers in promoting healthy sexual behaviours such as the use of condom to prevent unwanted pregnancy and the spread of these infections.

The professionals, especially the mental health teams, need to fast track drugs and alcohol awareness to empower the youth and to give support through counselling and arranging

other activities for them such as sports to wean the youth gradually from the alcohol and drug usage.

#### 4.3.4 Perceived self-efficacy to prevent STIs including HIV and AIDS

Self-efficacy is realised when the individual is able to take safe decision in life. Therefore, in this study the need to belong was included as a question to the respondents which would give an indication of how the youth can conform and demonstrate self-efficacy to be more aware of how dangerous it is to continue with sexual risk behaviours.

##### 4.3.4.1 *Is your behaviour influenced by the need to belong?*

The need to belong was included as a question to the respondents which would give an indication of how the youth can conform and demonstrate self-efficacy to be more aware of how dangerous it is to continue with sexual risk behaviours. It was important to determine whether peer pressure when attending social events played a role in their risk behaviours and to determine their knowledge on STIs including HIV and AIDS. Two respondents did not respond to this question.

Table 4:24: Sexual risk behaviour influenced by the need to belong (N=193)

RESPONSES	FREQUENCY	PERCENTAGE
Peer group	67	34.4%
Social clubs	53	27.2%
Youth club	73	37.4%
<b>Total</b>	<b>193</b>	<b>98.97%</b>

The respondents were asked whether their behaviour was influenced by a need to belong. table 4.24 shows n=67 (34.4%) were influenced by peer groups, n=53 (27.2%) and n=73 (37.4%) said they attended social clubs and youth clubs where one can assume alcohol, drugs and non-regular partners are available and accessible.

National Strategic Plan (NSP) (2012-2016:35-36) states policies and programmes should be developed to address alcohol and substance abuse better. One way is better promotion of how being friends with groups of peers in schools and tertiary institutions who use alcohol and drugs can have a negative influence on one's risk behaviours. Gender norms that "equate alcohol consumption with masculinity" also need urgent intervention. The NSP, (2012-2016) note that children who attend school are not as likely to those who are not at school, do not work, have no goals for the future and are more at risk of living a harmful



lifestyle. Their lifestyle increases the possibility of HIV infection through unsafe sex practices when under the influence of alcohol or drugs (NSP, 2012-2016:36).

#### **4.3.4.2 Which of the following infections are you aware of?**

Responses regarding knowledge about different types of STIs are on the table and graph below. The total number of 513 on the table below resulted from responses per type of infection.

Table 4.25: Youths' awareness of STIs (N=195)

<b>RESPONSES</b>	<b>FREQUENCY</b>	<b>PERCENTAGE</b>
Syphilis	46	9.0%
Gonorrhoea	71	13.8%
Hepatitis B or C	32	6.2%
Herpes	37	7.2%
Chlamydia	46	9.0%
HIV	148	28.8%
AIDS	133	25.9%
<b>Total</b>	<b>513</b>	<b>100.0%</b>

Table 4.25 shows n=46 (9%) of the youths were aware of syphilis; n=71 (13.8%) of gonorrhoea; n=32 (6.2%) of hepatitis B or C and only n=37 (7.2%) knew about herpes. Chlamydia was known by n=46 (9%); n=148 (28.8%) knew about HIV and n=133 (25.9%) knew about AIDS.

The respondents had some knowledge about STIs including HIV and AIDS. The youth can take precautions to prevent these diseases, but the results indicated that a number of factors such as alcohol and drug use (tables 4.20 to 4.24), unprotected sex (table 4.15) and not knowing their own or their partner's HIV status (table 4.17 and table 4.18) placed the youths of Mpumalanga at risk to practice sexual behaviours that expose them to contract STIs including HIV and AIDS. This is a concern because irrespective of the knowledge they already have, all the youths who participated were able to read (they had high education levels as shown in table 4.5) the information found in the health centres about STIs including HIV and AIDS. It seems as if in spite of having had formal as well as informal education on risk behaviours, some youths did not take heed any warnings that STIs, HIV and AIDS are dangerous and life-threatening diseases caused by unsafe sex practices. According to the

WHO (2006:7), knowledge helps the individual to make positive decisions in terms of sexual relationships. Gender inequality, religious beliefs, and culture also play a major role in decision-making on practising safe or unsafe sex—but the wrong decision can result in a future where one's life is dictated by a debilitating and life-threatening disease. It is clear from the percentages in table 4.24 n=67 (34.4% wanted to fit in with a peer group, n=53 (27.2%) attended social clubs and n=73 (37.4%) youth clubs that the youths' sense of belonging somewhere was strong. The groups that youth associate themselves with affects the decisions that they make. If they are self-sufficient enough, they will be able to make decisions that will help prevent them from being infected by STIS such as syphilis and gonorrhoea as well as unwanted pregnancy; it will also increase their awareness of these diseases as well as HIV and AIDS infection. Hong, Espelage, and Kral (2011:885) say the need to belong may influence the youth to conform to a group because they need and rely more on emotional support from their peers than on that of their parents and caregivers.

The results of the current study are supported by the WHO (2006:11) that social and environmental factors contribute to an individual's risk behaviours. The NSP (2012-2016:24) states syphilis has decreased since 2002, but the "herpes simplex virus (HSV), which is a co-factor in the acquisition of HIV, is still high". In young women early infection with this virus can eventually lead to cancer of the cervix. The NSP (2012-2016:23) emphasises the importance of focusing on people's perceptions of personal risk-taking sexual behaviours. Their recommendations for action from the Government and NGOs include that males and females who have younger or older partners must also be targeted because the age discrepancy allows for the older partner to have more power in decision-making about condom use, they often have multiple partners, pay poor youths for sex thus promoting prostitution, and have money to buy alcohol and drugs.

#### ***4.3.4.3 Have you ever been treated for the following infections?***

This component will cover past treatment of STIs for both the partner and the participating youths. There are no variables for this table as some youths responded they had been treated for more than one of the diseases previously. And out of the 195 respondents only 73 respondents responded.

Table 4.26: Previous treatments for STIs, HIV and AIDS (N=73)

Responses	Frequency	Percentage
Syphilis	5	6.8%
Gonorrhoea	17	23.3%
Hepatitis B or C	2	2.7%
Herpes	5	6.8%
Chlamydia	7	9.6%
HIV	20	27.4%
AIDS	17	23.3%
<b>Total</b>	<b>73</b>	<b>37.43%</b>

Table 4.26 shows gonorrhoea n=23 (23.3%), HIV n=20 (27.4%) and AIDS n=17 (2.3%) treatments had the highest percentages. Hepatitis B or C shows the lowest percentage n=2 (2.7%). Syphilis and herpes both indicate a percentage of n=5 (6.8%) for each. It is a huge concern that n=20 (27.4%) of the total 195 respondents are already HIV positive, n=17 (23.3%) are living with AIDS and that most had been treated for different STIs. It is clear that the prevalence of risk behaviours among the youth prevailed in the town in Mpumalanga where this study was conducted.

#### ***4.3.4.4 Do you discuss the prevention of STIs including HIV and AIDS with the following people listed below?***

Responses about discussing the prevention of STIs including HIV and AIDS with various people are illustrated in the table 4.27. Once again, some discussed this issue with more than one of the groups indicated on the questionnaire list.

Table 4.27: People youths discuss STIs including HIV and AIDS with (n=195)

RESPONSES	FREQUENCY	PERCENTAGE
Parents	51	26.15%
Partner	107	54.87%
Friends	37	18.97%
<b>Total</b>	<b>195</b>	<b>100%</b>

The study results reported that n=51 (26.15%) discussed the prevention of STIs with parents, with partners n=107 (54.87%), and n=37 (18.97%) discuss with friends. The majority

of respondents were more comfortable to discuss sexual issues with friends and partners than with parents. Open communication between parents and the youths is quite acceptable at n=51 (26.15%), but the most positive result is that by far the majority n=107 (54.87%) also discussed STIs, HIV and AIDS with their partners. Sarkar (2008:114) states due to cultural beliefs and religious factors communication about sexual relationships with parents can become a barrier a youths may not be allowed to discuss sexual issues with their parents. It can lead the youths succumbing to negative peer pressures which will expose them more to becoming infected with these diseases. Growing into adulthood (the period 18 to 24 years) is a “difficult and complex process” and these youths need resources such as “community connections and a stable family that can provide guidance and financial assistance” as well as access to education and experiences that provide a foundation for learning, life skills, and credentials” (Jekielek & Brown, 2005:par.1).

#### 4.3.4.5 Would you in future use condoms?

Responses regarding condom use are shown in Table 4.28.

Table 4.28: Future condom use by the youths (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	155	79.5%
No	40	20.5%
<b>Total</b>	<b>195</b>	<b>100%</b>

The youths responded with a significant majority=155 (79.5%) that they would use condoms as a preventive measure against STIs and HIV infection in future. Unfortunately, n=40 (20.5%) said they would not insist upon the use of condoms. This means that both males and females (who made up the larger part of the respondents) would not negotiate for condom use.

#### 4.3.4.6 In case of more than one partner will you consider fewer partners?

The aim of this question was to identify and describe self-efficacy of the respondents, one did not respond to the question.

Table 4.29: Considering fewer partners (N=194)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	166	85.1%
No	28	14.4%
<b>Total</b>	<b>194</b>	<b>99.48%</b>

There was a positive response from the respondents in that n=166 (85.1%) would consider having fewer sexual partners while n=28 (14.4%) reported that they would not consider having less sexual partners. Of those who would not consider fewer partners, it might be a possibility that it included youths who were paid for sex by multiple partners. It is important to read this as a possibility and not as a fact. To get a clearer understanding of the rationale for this assumption, some relevant findings are listed for better reading purposes:

- Table 4.1 shows the majority were females (84.6%)
- Table 4.3 shows the majority were single (72.8%)
- Table 4.6 shows the majority earned no salary (73.3%)
- Table 4.8 shows the majority had dependents (64.6%)
- Table 4.13 shows the majority had sexual intercourse the last six months (65.6%)
- Table 4.14 shows the majority had sexual intercourse over the last 12 months (73.3%).

It could therefore be postulated that some of the single female youths, who earned no salary but had dependents, had had intercourse over a period of a year with multiple male partners for financial gain. Having more than one partner and not having the authority to insist on using a condom is a risk behaviour that shows a lack of self-efficacy, it will lead to the youth becoming infected with and spreading STIs including HIV and AIDS.

#### ***4.3.4.7 In future will you have your HIV status checked?***

The responses indicate that most respondents showed self-efficacy and could take responsibility for their own sexual health behaviours.

Table 4.30: In future will you have your HIV status checked? (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	186	95.4%
No	9	4.6%
<b>Total</b>	<b>195</b>	<b>100%</b>

Of all the 195 respondents, n=186 (95.4%) indicated they would have their HIV status checked regularly; only n=9 (4.6%) said they would not.

#### 4.3.4.8 *Would you in future ask your partner about his/her HIV status?*

Table 4.31: Asking about the partner's HIV status in the future (N=195)

RESPONSES	FREQUENCY	PERCENTAGE
Yes	186	95.4%
No	9	4.6%
<b>Total</b>	<b>195</b>	<b>100.0%</b>

Of the 195 respondents it was significant that n=186 (95.4 %) reported that they would ask their partners about their HIV status in future n=9 (4.6%) said they would not. It is fortunate that the majority of the respondents showed self-efficacy as it will assist them to decide on protected sex to protect themselves and also reduce the spreading of STIs including HIV and AIDS. The results indicate that many youths are confident to face their partners and ask them about their HIV status. This is supported by Li et al. (2010: 538) who note that if the individual is able to take a decision to negotiate about sexual issues, it must be viewed as a positive move towards practising safe and healthy sexual behaviours.

The study results from tables 4.26 – 4.31 identified the risk behaviours of the respondents. Of the total of 195 youth respondents, n=20 (27.4%) was already HIV positive, table 4.15 n=70 (35.9%) was at risk of practising unprotected sex and table 19 n=23 (11%) having more than one partner. The majority were treated for different STIs thus the results show the prevalence of risk behaviours among the youths in the study setting. This was in fact the concern she had that drove the researcher to investigate this phenomenon as mentioned in the research problem (Chapter 1, Section 1.3). She was worried about the fact that despite health education in schools, health education provided by professional nurses and the distribution of free condoms to youths during their visits to the two PHC clinics, incidences of STIs remained a burden in the Steve Tshwete municipality. The study results also confirm

that some youths are unfortunately already on antiretroviral treatment (ART) indicating that these youths lived and worked in an unhealthy society and had an uncertain future.

These results are confirmed by the WHO Fact Sheet (2011:1-2) in that STIs are a significant source of morbidity among youths. It is estimated by the WHO (2011:1-2) that 448 million new cases of STIs occur annually among youths. Sexually transmitted infections and their complications rank among the top five disabling diseases in the world. For example, 40% of women with untreated chlamydial infection develop symptomatic pelvic inflammatory disease which at later stage complicates to ectopic pregnancies (WHO Fact Sheet, 2011:1-2). The youth in the Steve Tshwete municipality area are at risk of reflecting an increased mobility and mortality due to the complications which are brought about by STIs including HIV and AIDS. Although 54.87% of the youth respondents discussed STIs with their partners, 4.6% of the youth respondents participated in sexual risk activities demonstrated by their risk-taking behaviours. For example, many did not think it necessary to ask their partners' HIV status; had multiple partners; would not consider reducing their partners or negotiate for safe sex. These actions are associated with decreased perceived severity and self-efficacy. Li et al. (2010:538) maintain that if an individual perceives the situation to be a threat, action will be taken to avoid it.

#### **4.4 SUMMARY**

This chapter covered the collection, interpretation and the analysis of the data. It was done continuously until the researcher reached the desired objective. The pilot study, which was done before the entire study, was to refine questions to align them with the objective of the study. In the analysis of data, the efficacy of the instrument and findings were achieved. The next chapter covers the recommendations based on the results and also reflects on the limitations of the study.

## CHAPTER 5

# CONCLUSIONS, RECOMMENDATIONS AND LIMITATIONS

### 5.1 INTRODUCTION

The previous chapter presented the analysis and discussion of the data collected from youths between the ages of 18-24 regarding risk behaviour that can expose them to contract STIs including HIV and AIDS. The recommendations are based on the scientific evidence obtained from the study results regarding risk factors that were identified influencing the youth to be infected with STIs including HIV and AIDS.

### 5.2 CONCLUSION

The collection and presentation of data was a continuous process starting with the pilot study which was done by the researcher to refine the feasibility of the questionnaire and its significance and relevance in accordance with the research topic. It is on the basis of the relevance of the questionnaire that the objective of this research was achieved. The questionnaire was self-administered to 200 youths who were sampled using a volunteer convenient method to participate in the study. Out of 200 respondents only 195 (98%) respondents completed the questionnaire. Data collected were analysed and discussed by means of descriptive statistics.

#### 5.2.1 Purpose of the study

The purpose of the study was to identify, determine and describe the risk behaviours of youths utilising the selected PHC clinics in Mpumalanga that expose them to contracting STIs, HIV and AIDS using four HBM components which are: perceived susceptibility, perceived barriers, perceived severity, and perceived self-efficacy.

#### 5.2.2 Research questions

The research questions that guided the study were only four of the six HBM components which were as follows:

- *“What is the perceived susceptibility of the youth with regards to the sexual risk behaviour that exposes them to contracting STIs and HIV and AIDS?”*
- *“What are the barriers of adopting healthy behaviours by the youth in order to prevent the risk of contracting STIs and HIV and AIDS?”*



- *“What are the perceived severities of contracting STIs and HIV and AIDS among the youth?”*
- *“What is the perceived self-efficacy of the youth who are at risk of contracting STIs and HIV and AIDS?”*

These questions were answered as the researcher was able to identify and describe risk behaviours that youths are involved in that can make them contract STIs including HIV and AIDS.

### **5.2.3 Study objectives**

The objectives of the study referring to specific 4 components of HBM were to:

- determine and describe the perceived susceptibility of the youth with regard to the sexual risk behaviours that expose them to contracting STIs, HIV and AIDS
- determine and describe the barriers preventing the youth from adopting healthy sexual behaviours that will protect them from contracting STIs, HIV and AIDS.
- determine and describe the perceived severity of STIs, HIV and AIDS among the youth.
- determine and describe the perceived self-efficacy of the youth who are at risk of contracting STIs, HIV and AIDS.

The objectives were met. The results showed that youths between 18 and 24 years are practicing risk behaviours that can lead them to contract STIs including HIV and AIDS. The objective of the study was attained and discussed as the results of the study and was based on the questionnaire as follows:

- Section A which was demographic data
- Section B focused on the four components of the HBM which are: perceived susceptibility, perceived barriers, perceived severity, and perceived self-efficacy regarding the exposure to STIs including HIV and AIDS.

## **5.3 STUDY RESULTS**

The study results were presented with regard to the respondents' demographic data and their social status.

### **5.3.1 Demographic data**

The demographic data of the respondents for this study included gender, age, marital status, residential address, level of education, employment status, family support and number of dependents.

The study required the inclusion of both female and male respondents' participation. The majority of respondents were females  $n=165$  (84.6%) as opposed to their male counterparts who made up  $n=30$  (15.4 %).

The age group who participated was from 18 to 24 years old as it was indicated in the proposal for the inclusion criteria. The majority of the respondents were single. The single individuals amounted to  $n=142$  (72.8%), those who were married constituted  $n=37$  (19 %),  $n=14$  (7.2%) were living together and  $n=2$  (1%) was separated. The respondents were from the surrounding farms, township and from suburbs that covered all the catchment areas of the two clinics in the Steve Tshwete municipality in Mpumalanga.

Literacy among the study population was found to be as follows: the majority had completed Grade 11 and Grade 12 (35.6%). Eleven point nine per cent (11.9%) held a degree or diploma, 12.4% had a certificate. One per cent (1%) held a post-graduate degree. The majority were not employed  $n=143$  (73.3%) and had dependents to take care of. The results indicated that the youths were involved in risk behaviours and therefore there is a need for reinforcing the youths' knowledge and skills about the importance of choosing a healthy life style. This can be attained through education up to tertiary level; education and knowledge is the key for better employment and achieving a better life style.

### **5.3.2 THE FOUR COMPONENTS OF THE HBM APPLIED TO THIS STUDY**

#### **5.3.2.1 PERCEIVED SUSCEPTIBILITY**

##### **5.3.2.1.1 Sexual activity**

The study reported that of the respondents between the ages of 18 to 24 years who had participated in this study 83.1% were sexually active and 16.9% reported they were not sexually active.

The results showed that 17.1% engaged in sexual activities at the age of 17 years; regarding condom use, only 28.7% always used condom, 7.7% usually used a condom and 21% never used a condom; therefore, the youth is susceptible to be infected with STIs. The results

indicated that the youth was exposed to contracting STIs including HIV and AIDS due to their risk behaviours.

#### **5.3.2.1.1(a) At what age did you first have sexual intercourse?**

The respondents who engaged in sexual intercourse at the age of 13 years was n=1 (5%) at 14 years old, n=11 (5.6%) at 15 years, n=13 (6.7%) at 16 years old, n=25 (12.8%) at 17 years, n=31 (17.1%) at 18 years, n=50 (25.6%) at 19 years, n=20 (10.3%) 20 years, n=18 (9.2%) at 21 years, n=6 (3.1%) at 22 years, n=2 (1%) at 23 years, n=3 (1.5%) and at 24 n=1 (5%). The majority of youths started having sexual intercourse at the age of 18 years. The lowest percentage of 0.5% started at the age of 13 years indicating risk behaviour therefore there is a need for reinforcement of the importance of safe sex to youth from primary level by the health promoters. This study results reported that youths are at the risk to contract STI including HIV and AIDS if safe sex is not practiced taking into consideration of a high percentage that, n=41 (21%) of youths respondents indicated that they never used a condom during sex.

#### **5.3.2.1.1(b) Have you had sexual intercourse in the past 6 months?**

The majority of the respondents reported that they had had sex in the past six months, n=128 (66%). The aim of this question was to identify the vulnerability of respondents in contracting STIs including HIV and AIDS and these results show that respondents are sexually active, and they were vulnerable to become infected.

#### **5.3.2.1.1(c) Have you had sexual intercourse in the past 12 months?**

The respondents had engaged in sexual activity the previous 12 months, n=143 (74.9 %) did have sexual intercourse and n=48 (25.1%) did not. As indicated in these results (5.3.2.1.1(b) and 5.3.2.1.1(c) the majority of the youth were sexually active, indicating that the youth was at the risk of becoming infected with and transmitting STIs as well as HIV and AIDS.

#### **5.3.2.1.1(d) When having sexual intercourse do you use a condom?**

Responses about condoms use during sex indicated that about, n=45 (24%) never and seldomly uses a condom, n=70 (37%) sometimes, n=15 (8.1%) used one usually and n=56 (30.1%), reported they always used a condom for safe sex. Never or just occasionally or sometimes practising safe is not acceptable because youths do not only place themselves at risk of contracting these diseases, but their partners as well. Not using a condom is also an extremely dangerous way of spreading STIs, HIV and AIDS as many other youths can

become infected during future sexual activities. Unplanned pregnancies are also a risk with the additional danger of mother-to-child transmission of HIV.

**5.3.2.1.1(e) If yes to Question 3 and Question 3.1 how many sexual partners have you had in the past 12 months?**

Responses were that, n=159 (87.4 %) respondents had 1 partner and 12.9%, responded that they had between 2 and 10 partners. This indicates the youth were participating in risk sexual activities. A total n=9 (16%) had between 3 and more than 10 partners.

**5.3.2.1.1(f) When last did you test for HIV?**

Respondents responded that, n=20 (10.4 %) had never tested, n=55 (28.5 %) answered that it was the previous month, n=61 (31.6%) had tested in the previous six months and n=38 (19.7%) had last tested a year ago. Further responses included n=11 (5.7 %) testing 2 years ago while n=8 (4.1 %) did not remember when last they were tested. From the results that 83.1% of the respondents were sexually active but that 4.1% could not remember when they last tested for HIV, it was deduced that ignorance and a non-caring attitude accompanied the some youths' risk behaviours and their susceptibility to contract and transmit STIs including HIV and AIDS.

**5.3.2.1.1(g) When last did your partner test for HIV?**

The results had shown responses as follows, n=20 (10.5%) responded that they had never tested, n=40 (20.9%) last month, n=47 (24.6 %) in last six months, n=30 (15.7%) a year ago n=10 (5.2%) 2 years ago and a further n=44 (23%) did not remember when last they were tested. The results reported that youths are susceptible to contract STIs including HIV and AIDS. Ignorance and lack of self-efficacy was prevalent according to the study results hence 23% of respondent cannot remember if their partners were tested for HIV.

**5.3.2.1.1(h) Do you know the HIV status of your sexual partners?**

The respondents were asked if they knew the HIV status of their partners and n=138 (71.1%) indicated that they did with, n=56 (28.9 %) reporting they did not know. Although 28.9% was the minority, the youth were at the risk to contract STIs including HIV and AIDS.

### **5.3.2.2 PERCEIVED BARRIERS**

#### ***5.3.2.2.1 Do you use alcohol?***

Responses on alcohol intake were: n=113 (58.2%) never, n=1 (0.5%) on a daily basis, n=14 (7.2%) drank weekly on weekends, n=52 (26.8%) drank only at parties and n=14 (7.2%) only at the end of the month. The results showed that the youths did socialise by taking alcohol which can be a barrier to negotiate for safe sex resulting to the risk behaviour of unprotected sex which can lead the youth to contract STIs including HIV and AIDS.

#### ***5.3.2.2.2 Does your partner use alcohol?***

The responses were that, n=87 (45.1 %) never took alcohol, n=5 (2.6 %) took it on a daily basis, n=29 (15%) drank weekly on weekends, n=48 (24.9%) used alcohol only at parties and n=24 (12.4%) drank only at the end of the month. The prevalence of alcohol among both females and males is reported as indicative in literature that alcohol influences the youth to practice unsafe sex and engage in illegal activities like having sex with an unwilling victim (rape or gang rape) without condom use which in turn increases the spread of STIs including HIV and AIDS.

#### ***5.3.2.2.3 Do you use any drugs?***

The responses on drugs reported that, n=186 (95.4%) had never taken drugs, n=4 (2.1%) took drugs on a daily basis, n=2 (1 %) used it occasionally when they were stressed and n=3 (1.5%) when socialising with friends. The study results showed that although the percentage of drug users was low, it was found in literature sources reviewed for this study that using drugs and sexual risk behaviours (like having more than one partner and practicing unprotected sex) to be as the major vehicle of spreading STIs including HIV and AIDS

#### ***5.3.2.2.4 Does your partner use any drugs?***

The respondents reported that, n=189 (97.4%) of their partner never took drugs, n=3 (1.5%) took drugs occasionally when they were stressed and n=2 (1%) when socialising with friends. Although the minority of youths took drugs occasionally when stressed, this may lead to addiction. The results reported that respondents were indeed involved in the risk behaviours of drug abuse and alcohol consumption that leads to contracting and

transmitting STIs including HIV and AIDS if sexual activities are participated in without a condom.

#### **5.3.2.2.5 *Is your behaviour as youth influenced by the need to belong?***

The study results confirmed that youths were influenced by the people they socialised with. Peer group influence was, n=67 (34.7%) social clubs indicated, n=53 (27.5%) and n=73 (37.8%) were influenced by youth clubs. The study reported that youths are influenced by having a need to belong somewhere. However, unfortunately choosing to be part of groups who practice unsafe sex can lead to the youths themselves taking risky decisions and behaving in a dangerous way sexually like having multiple partners.

#### **5.3.2.2.6 *Which of the infections are you aware of?***

The respondents reported that, n=46 (9%) were aware of syphilis, n=71 (13.8%) of gonorrhoea, n=32 (6.2%) of hepatitis B or C, n=37 (7.2%) of herpes, n=46 (9%) of Chlamydia, n=148 (28.8%) of HIV and n=133 (25.9%) were aware of AIDS. The respondents did have knowledge about STIs including HIV and AIDS.

### **5.3.2.3 PERCEIVED SEVERITY**

#### **5.3.2.3.1 *Have you ever been treated for any of the following infections?***

Of the youth who responded to this question, n=5 (6.8%) had been treated for syphilis, n=17 (23.3%) for gonorrhoea, n=2 (2.7%) for hepatitis B or C, n=5 (6.8%) for herpes, n=7 (9.6%) for Chlamydia, n=20 (27.4%) for HIV and n=17 (23.3%) for AIDS. Finding that some of the youths had been treated for HIV and AIDS confirmed they were taking risks when engaging in sexual activities.

These results confirmed that the provincial hospital was receiving clients from the two clinics who had a high percentage being infected with STIs including HIV and AIDS. Therefore, the identified risk behaviours in the aforementioned paragraphs indicated that the youth in the selected settings were practicing unsafe sex which resulted in them contracting STIs including HIV and AIDS.

### **5.3.2.4 PERCEIVED SELF-EFFICACY**

#### ***5.3.2.4.1 Do you discuss the prevention of STIs including HIV and AIDS with ...?***

The respondents were asked who they discussed the prevention of HIV and AIDS with and, n=107 (54.87 %) answered that they discussed it with their partners while n=95 (48.71 %) talked about it with their friends and n=51 (26.15%) with their parents. Openness to one another as partners is the key to prevent STIs including HIV and AIDS. The results show that parents were not involved enough with their children to discuss sexual relationships. The low percentages of youths who discussed the prevention of STIs with parents might be ascribed to the influence of the cultural differences as stated in the literature review that culture and religious factors may hamper good communication among youths and their parents.

#### ***5.3.2.4.2 When having sexual intercourse would you in future insist on using a condom?***

Asked whether they would insist on the use of condoms in the future, n=155 (79.5 %) of the respondents said they would while n=40 (20.5%) said that they would not insist on the use of condoms. This is evidence of the risk behaviour to practice unsafe sex. It indicates that the youths did not demonstrate the self-efficacy to consistently using a condom or have to negotiating power to insist on safe sex practices. The youths were obviously exposed to STIs including HIV and AIDS as evidenced in this result.

#### ***5.3.2.4.3 In case you have more than one partner would you consider having fewer sexual partners?***

There was a slightly positive behaviour in that, n=165 (85.6 %) would consider having fewer sexual partners while n=28 (14.4 %) reported that they would not consider having fewer sexual partners. The prevalence of multiple sex partners is a serious risk behaviour that can lead to being infected with STIs including HIV and AIDS. The fact that 14.4% would not consider having fewer partners is extremely disturbing.

#### ***5.3.2.4.3 In future will you have your status checked every 6 months?***

Asked whether they would in future have their HIV status checked every 6 months 95.4% reported that they would while 4.6% reported that they would not. The majority responded positively which is a hopeful sign if they remain committed to have their HIV status checked as they indicated.

#### **5.3.2.4.4 Would you in future ask your sexual partner about his/her HIV status?**

The respondents were asked whether they would ask their sexual partners about their HIV status from the time of the study and in the future. By far the majority, n=186 (95.4%) answered that they would, while n=9 (4.6 %) said they would not. The study results showed that the majority most of the youths had the self-efficacy to protect themselves against STIs including HIV and AIDS.

### **5.4 RECOMMENDATIONS**

Recommendations and remarks on the current study on risk behaviours of youths which expose them to contracting sexually transmitted infections including HIV and AIDS in the selected primary PHCs in Mpumalanga follow.

#### **5.4.1 Recommendations for demographic data.**

- Communities such as those in farming areas and informal settlements do not receive adequate services like the communities situated in the urban areas. The farming community should be reminded that STIs including HIV and AIDS is the responsibility of all people in the country to reduce the spread of these diseases among the youth. By paying more attention to be aware of and understand that health education on the prevention of these infections is provided and made available by health professionals. Parents who are culturally not inclined to talk about sexual matters can encourage youths to obtain such information from these health professionals like nurses. The more inquisitive the youth becomes, the more they will want to know and parents should encourage them to visit the clinics to receive relevant and correct information on reproductive health. The youth must know that the public clinics services are free and are there for them to be utilised as needed.
- Regarding illiteracy, there is challenge regarding the youths' educational level. Out of the 195 respondents, only 1% held a degree. Although Mpumalanga offers different bursaries for different courses, the challenge is that there is no university in this province. Therefore, it is recommended that this matter should be attended to urgently by the Department of Education to allow youths to further their education. To register at any university or tertiary institution in SA involves expenses (travelling, accommodation) that the parents and older youths cannot afford. However, the positive aspect regarding this issue is that a new university



has been established in Nelspruit, Mpumalanga in 2014. It offers a variety of learning programmes and will hopefully improve the academic status of other populations in the province. However, the youth needs to be encouraged by parents, teachers, employers, and partners to obtain a higher level of education.

- The majority of youths who participated in this study were not employed. The Government and NGOs should assist and initiate opportunities for youths to start their own small businesses. It would not only empower the youth, but may improve the status of employment in this area. A current example is that the catering and recreation hall which was established by one of the community women for youths in Mpumalanga—is ideally situated in the Steve Tshwete municipality and the majority of youths utilise it for positive and pro-active activities.
- The number of dependents to single parents in combination with unemployment of youths contributes to the psychosocial burden which can induce risk behaviours such as having multiple sexual partners in exchange for money (sex work) to meet the most basic needs such as food and shelter. The Government and NGOs should consider designing and implementing learner ship programmes which will empower youths with the skills to help them find employment and so earn money to take care of dependents whether it be parents, siblings or own children.
- Youths from the farms, town and township and informal settlements around Steve Tshwete municipality need to be empowered about the importance of parenting after marriage. The study reported that the majority of youths are still single but have children to look after. There are disadvantages to single parenthood which can affect youths psychologically; for example, regarding education, youths do not reach highest academic levels on time or at all. Programmes and initiatives to constantly remind the youth of the importance of practising safe sex, knowing about the reproductive system and how it works, and how to prevent a pregnancy need to be scaled up and be recognised as critical by community members, healthcare personnel and in schools. The importance of on-going education on practising safe sex of youths is not only the responsibility of the Government or healthcare workers, but of all adults, educators, parents and families.
- The issue of social grants was a good initiative from the Government to alleviate poverty, but it was not utilised by the community correctly. These grants affect the

youths' perceptions as regards the financial and economic problems one can encounter as a single, unmarried young parent. Health professionals should join hands to ensure that single-parent youths are assisted with health related information like prevention of teenage pregnancy, STIs and HIV and AIDS from every practice where youths visit – even for other health problems.

#### **5.4.2 Recommendations for the prevention of STIs including HIV and AIDS**

- Youths programmes like Love Life should be continuously facilitated in schools as well as during community gatherings where the youths attendance is in the majority. Schools need to focus on an in-depth teaching of positive reproductive health, particularly in high school, in Life Orientation and life sciences subjects. School health nurses should be able, capable and know how to work within a youth-friendly manner with adolescents. It is imperative for school health nurses and health professionals to explain the importance of reproductive health to youths of both genders. The youths should know that, if they seek clarity or want more information, health professionals are there to advise them. This may build the youths' confidence and their self-esteem, enhance their self-efficacy. Male youths might be empowered to embrace attitudinal changes through talks about gender equality.
- Mental health programmes should be aligned to specifically address the issue of alcohol and drug use among youths between the ages of 18 and 24 years. It was found in this study that alcohol and drug abuse were significant risk behaviours.
- Health professionals should partner more with the community including church leaders and traditional leaders to educate youths on safe sex. They should all emphasise the importance of early diagnosis and treatment of STIs including HIV and AIDS.
- Voluntary counselling and testing programmes need to be strengthened by programme managers. Making the youth aware of the importance of knowing one's status might empower youths to have them and their regular partners regularly tested for HIV. Although it emerged in this study that the youths are aware of STI and HIV infections, preventive measures still seemed a problem. There was no consistency or compliance with regular testing and condom use. Youths still need more support and encouragement to prevent getting infected with STIs and HIV infections and transmitting it. Managers at all health facilities

need to be made aware of the attitude of the staff. All professional healthcare staff needs to be trained or attend workshops where they can be made aware how to approach youths where reproductive health, sexual health problems and sexual risk behaviours are concerned.

- Moral regeneration is another key issue to address single parenting. An effort should be made to go back to the roots of supporting youths with health education by keeping on making them aware of the availability of contraceptives in the clinics, including condoms, as a preventive measure for STIs including HIV and AIDS. The Government should also ensure that all PHC service providers have sufficient male condoms at all times to provide to the youth.
- Gender inequality was found to be prevalent; therefore it is highly recommended that mother and child coordinators and moral regeneration members address and debate on the improvement of gender inequality during the 'makgotla' (mass meetings). Although this may be a time-consuming factor, if gender inequality can be dispersed of and there is a more respectful attitude towards each other's gender among males and females, it may lead to a decline in the male youths' sexually dominant behaviour.

## **5.5 LIMITATIONS OF THE STUDY**

A limitation of this study was that only youths between the ages of 18 to 24 in one study setting, namely the Steve Tshwete municipality in Mpumalanga were studied. The results cannot therefore be generalised to other municipal areas in other provinces. This study was conducted in one area in Mpumalanga and cannot be generalised to areas or municipalities in the country.

## **5.6 SUMMARY**

The study identified and described risk behaviours that could lead youths between 18 and 24 years to contract STIs including HIV and AIDS at two selected clinics in Mpumalanga. The four objectives of the study were achieved.

The results reported that among youths there are many practice risk behaviours that could lead them to contract STIs including HIV and AIDS. It seemed as if ignorance, financial constraints and gender imbalances play a role in decision-making among youthful partners on practising safe sex. The other major problems which emerged were having more than one partner, not using condoms and alcohol and drug abuse among some youths. However,

it was a significant finding that many of the youths seemed to take practising safe sex seriously as evidenced by the result that they knew their HIV status and would continue to go for testing. The reduction of agreeing to reduce the number of sexual partners and insisting on condom use is a major step towards the youths taking responsibility to lead healthier, more productive lives and to curb the prevalence of STIs, HIV and AIDS infection in the country.

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