

**FACTORS INFLUENCING THE CHOICE OF CONTRACEPTIVE METHODS
BY HIV POSITIVE WOMEN IN THE COFIMVABA AREA**

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DECLARATION

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O.K Oluwole

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ABSTRACT

The researcher has noticed certain unhealthy trends in the choices of contraceptive methods by PLHIV women in Cofimvaba. It is a significant concern that there appear to be a disjoint between the knowledge imparted on the women on healthy contraceptive choices and their practical choice of contraceptive methods. The researcher wants to identify the factors influencing the choice of contraceptive methods by PLHIV women in this area. The research data were collected with a questionnaire and descriptive quantitative analysis was done on data collected on the knowledge, attitude, perception and practice of the women regarding HIV and contraceptive methods.

The findings were that despite the high awareness (92%) amongst the PLHIV women about dual protection as the method of choice for them, only 4% are practising dual protection. The research also revealed that 40% of the women are still having unprotected sex. Only 36% of the women have the positive attitude to health professional counselling as a factor influencing their choice of contraceptive methods.

The major factors identified as influencing the choice of contraceptive methods in these women include: pregnancy desires and intentions; counselling by health professionals; the contraceptive methods available at the nearest PHC, the side effects of the contraceptives and the convenience and comfortability associated with the methods; the use or non-use of HAART, especially the presence of Nevirapine in the HAART regimen; and financial needs for child support grants.

OPSOMMING

Die navorser het opgemerk dat sekere ongesonde tendense bestaan in die keuse van kontraseptiewe metodes deur vroue wat leef met MIV/VIGS in Cofimvaba. Daar is groot kommer omdat dit blyk asof daar 'n onsamehangendheid bestaan tussen die kennis wat oorgedra is aan die vrou oor die gesonde kontraseptiewe keuses en hulle praktiese keuses van kontraseptiewe metodes. Die navorser wil die faktore wat die keuse van kontraseptiewe metodes deur die vrou in die gebied beïnvloed, identifiseer. Die data is ingesamel met die gebruik van 'n vraelys en 'n beskrywende kwantitatiewe ontleding is gedoen op die data wat ingesamel is op die kennis, houding, begrip en gebruik van vroue ten opsigte van MIV en kontraseptiewe metodes.

Die bevindinge was, ten spyte van die hoë bewustheid (92%) onder die vroue wat leef met MIV/VIGS oor dubbele beskerming as die metode van keuse vir hulle, slegs 4% dubbele beskerming beoefen. Die navorsing het ook getoon dat 40% van die vroue nog onbeskermd seks beoefen. Slegs 36% van die vroue het 'n positiewe houding teenoor professionele gesondheidsberading as 'n faktor wat hul keuse van kontraseptiewe metodes beïnvloed.

Die belangrikste faktore wat geïdentifiseer is wat die keuse van kontraseptiewe metodes in hierdie vroue beïnvloed sluit die volgende in: begeertes en bedoelings van die swangerskap, berading deur professionele gesondheidswerkers, die kontraseptiewe metodes wat beskikbaar is by die naaste kliniek, die newe-effekte van voorbehoedmiddels en die gerief en gemaklikheid wat gepaard gaan met die metodes, die gebruik of nie-gebruik van HAART, veral die teenwoordigheid van Nevirapine in die HAART leefwyse en finansiële behoeftes vir kindertoelaes.

ACRONYMS

AIDS- Acquired Immune Deficiency Syndrome

ARVS- Antiretroviral Drugs

CDC- Centre for Disease Control, USA.

CSG- Child Support Grant

DoH- National Department of Health, South Africa.

DSDSA- National Department of Social Development, South Africa.

HAART- Highly Active Antiretroviral Therapy

HIV- Human Immunodeficiency Virus

HSRC- Human Sciences research Council

IUCDs- Intrauterine Contraceptive Devices

MCH- Maternal and Child Health

OCP- Oral Contraceptive Pills

PPASA- Planned Parenthood Association of South Africa

PHC- Primary Health Clinics

PLHIV- People Living with HIV/AIDS

PMTCT- Prevention of Mother-To-Child Transmission

SPSS- Statistical Package for Social Sciences

SRH- Sexual and Reproductive

STDs/STIs- Sexually Transmitted Diseases/Infections

UNAIDS- Joint United Nations Programme on HIV/AIDS

UNDP- The United Nations Development Programme

UNFPA- United Nations Population Fund

UNGASS- United Nations General Assembly Special Session

WHO- World Health Organisation

DEFINITION OF KEY TERMS

CD4 Count- CD4 cells or T-helper cells are a type of white blood cell that fights infection and their **count** indicates the stage of HIV or AIDS in a patient.

Contraception- The deliberate use of artificial methods or other techniques to prevent pregnancy as a consequence of sexual intercourse.

Contraceptives- refer to a technique, methods, device or drugs capable of preventing pregnancy.

HAART- refers to combination of two or three ARVs prescribed for PLHIV for life-long use to reduce the amount of HIV in their blood and improve their CD4 count.

Injectables- These are hormonal contraceptives given as intramuscular injections at certain intervals. There are two popular types: Nuristerat, given every 8 weeks and Depo-Provera given every 12weeks.

PMTCT- This is combination of treatment regimen given to pregnant PLHIV women to prevent them from vertically transmitting HIV infection to their child during pregnancy, labour and breastfeeding period.

Teenage Pregnancy- Pregnancy occurring in woman after puberty and up to 19 years of age.

Viral Load- The **viral load** refers to the actual number of HIV viruses in the blood in a PLHIV.

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CHAPTER 1

OVERVIEW AND RATIONALE OF THE STUDY

1.1. INTRODUCTION

It is the prerogative of HIV positive women to plan for pregnancy, plan their family, or avoid pregnancy just like any other women. Most contraceptive methods have been considered to be safe and effective for HIV positive women (WHO, 2004). Dual protection is defined as any strategy that prevents both unwanted pregnancy and sexually transmitted infections (STIs), including HIV (Woodsong, 1999). Dual Protection has been advocated as strategy for the reducing the risks of unplanned pregnancy, horizontal transmission of HIV to a non-infected partner, transmission of resistant virus to a partner with HIV infection, and the risk of acquisition of other STIs like Human Papilloma virus and Hepatitis B&C. It includes different combinations of pregnancy and STI prevention, such as the consistent use of condoms with hormonal contraceptives. It also involves other risk reduction behaviours such as non-penetrative sex or abstinence. In South Africa, the predominance of hormonal contraceptives, particularly injectables, means that the simplest approach to dual protection is through the combination of a barrier method, most commonly the consistent use of male condom , with a non-barrier (primarily hormonal) contraceptive (Myer et al, 2002). South Africa's reproductive health policies promote dual method use as an important means of preventing both unwanted conceptions and transmission of HIV and other STIs (DoH, 1999)

Health professionals have a duty to ensure that PLHIV women in the reproductive age group make proper reproductive choices by counselling patients and offering appropriate contraception at the time of HIV diagnosis, HAART initiation and during follow up. However, it is still the prerogative of the patient to make their choices by taking into consideration various factors and issues at the back of their mind that could influence their choices of contraceptive methods.

1.2. BACKGROUND TO THE STUDY

South Africa is one of the many Sub-Saharan African nations grappling with the public health menace called HIV/AIDS. The South African Department of Health National Antenatal clinic survey in 2009 showed that about 29.4% of pregnant women are HIV positive (DoH ,2010). The South African National Household HIV Survey of 2008 put national prevalence at 10.9%

for all South African aged two years and above (HSRC, 2008). The National Household survey also revealed a national prevalence rate of 16.9% for all adults between 15-49 years who are most sexually active age group range in the population. The relative vulnerability of women to HIV infection is evident from these statistics because the prevalence rates amongst women are much higher than men for all age 5-year age group divisions between 15 and 49 years in the National survey, likewise pregnant women have higher infection rates than the general adult.

The province of the Eastern Cape is one of the worst affected provinces in South Africa. An estimated 28% of antenatal clinic attendees were HIV positive in 2008 in this province (DoH, 2009). The researcher works in the Cofimvaba District Hospital which the only hospital is serving about 190,000 people of the Intsika Yethu Municipality in the Chris Hani District of Eastern Cape. The hospital is 146-bedded and sub-serves 40 primary health clinics (PHC) as a referral centre. Majority of the people make use of these public health facilities for varieties of clinical services including family planning, obstetrics and clinical management of HIV/AIDS and Tuberculosis because about 73% of the people are poor while unemployment rate is at 68%. The HIV infection rates in this community average 30% by extrapolation from the district infection rates (McCann, 2005).

The researcher has been directly involved in the management of PLHIV women at the ARV clinics and maternity section of the hospital in the areas of initiation of both pregnant and non-pregnant women on antiretroviral medications, prevention of mother-to-child transmission (PMTCT) of HIV, counselling of HIV positive women on ART adherence, healthy contraceptive choices, and general strategy for general wellness even while PLHIV are on dual therapy or HAART. These services are delivered in line with the objectives South African Antiretroviral Treatment Guidelines in 2010. The objectives the programme were to: - Integrate services for HIV, TB, Maternal and Child Health (MCH), Sexual and Reproductive Health (SRH) and wellness; Early Diagnosis of HIV infections; Prevention of HIV disease progression; Aversion of AIDS-related deaths, Retention of patients on lifelong therapy (HAART); Prevent new HIV infections among children, adolescents, and adults; and Mitigation of the impact of HIV & AIDS in the populace (DoH, 2010). A closer examination of these objectives demands that appropriate sexual and reproductive health for PLHIV women hinged upon healthy contraceptive choices is of fundamental importance to the successful achievement of these set objectives.

1.3. RATIONALE FOR THE STUDY

The researcher noticed certain trends in the contraceptive choices made by PLHIV women in this public health facility which does not seem to favour condom use despite appropriate counselling on importance of consistent condom use either as the only method or in combination with other methods. Abstinence appeared to be favoured as a means of contraception by a number of PLHIV women but a number of them report back in the hospital with pregnancy few months after initiation on HAART and ready to carry the baby to term. Others make the choice of hormonal contraception only (commonly Injectables) and make the choice of Nevirapine-based HAART regimen which have less teratogenic effect compared to Efavirenz-based regimen which is suitable for women who don't have pregnancy plans in the near future. A sizeable number in this category still get pregnant some months after starting ARVs. Apparently, there are some insincerities and inconsistencies in the contraceptive choices made by some of these women in the researcher's hospital.

Against this backdrop, we are faced with a situation whereby PLHIV women in this area could form a steady pool for continued vertical and horizontal transmission of HIV. This situation may ultimately negate the objectives of the National Antiretroviral treatment programme. There appear to be certain factors that inform the choices of contraceptive methods adopted by the PLHIV women in this locality and it is a challenge that is worthy of investigation. The rationale for this study, therefore, is to attempt to dig deeper and find out the factors that influence the choices of contraceptive methods that PLHIV women clients of this hospital.

1.4. RESEARCH PROBLEM

The current approach to the management of PLHIV women in the reproductive age group (16-40 years for the purpose of this study) in my workplace is such that we do counselling on family planning at the level of diagnosis with HIV, perinatal visits or at initiation of patients on antiretroviral drugs. Very frequently, we do re-counsel PLHIV who may have been counselled at the level of PHC on appropriate contraceptive methods during follow-up visits and at initiation on ARVs in the hospital. The counselling is often done by taking into consideration each individual peculiar medical and psychosocial situation.

However, we cannot say whether there is a disjoint between the knowledge we try to impart

on the clients and the choices that they make in the final analysis. We do not know whether the counselling done seems to send a wrong message to clients that their HIV positive status forbids them from having children. Whatever choices that the PLHIV women make on contraception, subsequent service delivery end point is mainly at the PHC clinics level.

So we do not know whether certain elements in the approach of the health professionals to counselling of PLHIV women on contraception make that influence contraceptive choices made by PLHIV women. Or, we do not know whether the choices made by each individual are down to certain factors, circumstances surrounding each individual and their perceptions of risks of HIV infection or transmission. The problem or challenge here is that we do not what are the underlying factors that influence the choice of contraceptive methods amongst PLHIV women in the Cofimvaba community area.

1.5. RESEARCH QUESTION

What are the factors influencing the choice of contraceptive methods amongst PLHIV women in the Cofimvaba Community area?

1.6. SIGNIFICANCE OF THE STUDY

Contraception has been identified as one of the cornerstones of prevention of mother to child transmission of HIV. For women who are HIV positive and who wish to stop childbearing or space children or have children, healthy choices of contraceptive methods is very important in overall management of the patient. The importance of this study is to be able to identify the factors influencing the choice of contraceptive methods by PLHIV women in the Cofimvaba community area. Identification of these factors could help the health professionals working at this facility to have insight into a more holistic approach to management of PLHIV women and their family planning needs. The study may reveal certain factors at the level of integration of family planning services and antiretroviral treatment by the health professionals from the clients' point of view. The study also has a potential to reveal certain underlying factors that are due to circumstances surrounding each PLHIV women but which may be recurrent in many other cases.

Finally, identification of these factors will help in better approach to HIV prevention and family planning services, reduce the risk of PLHIV women infecting to both knowing and unknowing sero-discordant sexual partners, and reduce the risk of vertical transmission of

HIV to children, reduce infant mortality rates from HIV/AIDS, and in the long term reduce the incidence and prevalence of HIV in this area.

1.7 AIM OF THE STUDY

The aim of this study is to identify the various underlying factors that influence the choice of contraceptive methods by PLHIV women in the Cofimvaba community area.

1.8 OBJECTIVES OF THE STUDY

- To determine the knowledge, attitude, perception and practice of PLHIV women regarding contraception methods.
- To identify the factors that influences the choice of contraceptive methods.
- To identify any gaps between their knowledge and practice as described above.
- To identify possible ways in which the knowledge of the PLHIV women can be aligned with their practical choice of contraceptive methods.

CHAPTER 2

LITERATURE REVIEW

2.1. EPIDEMIOLOGY OF HIV/AIDS IN WOMEN

In 2009, UNAIDS estimates that 33.2 million people are living with HIV/AIDS worldwide and more than 50% of all adults with HIV infection are women. Nearly 40% of the world's HIV-infected women live in Southern Africa, where heterosexual intercourse is the primary mode of HIV transmission. Women living with HIV make up 59% of all adults living with HIV in sub-Saharan Africa (UNAIDS, 2010). Each year, these women experience over 1.4 million pregnancies (WHO, 2009). It is estimated that between 50% and 84% of the pregnancies is unintended (Laher et al, 2009; Rochat et al 2006; Desgrees-Du-Lou et al, 2002). Annual incidence of HIV infection in infants via mother to child transmission is about 350,000 (UNAIDS, 2010). The South African epidemic is highly feminized as women account for 60% of all infected adults and among 15–24 year olds, women account for 90% of incident HIV infections (Rehle et al, 2007)

2.2. CONTRACEPTION: A VITAL STRATEGY FOR PMTCT

Among women living with HIV infection, the provision of contraceptive services to prevent unintended pregnancy is a vital but largely neglected strategy to prevent mother-to-child-transmission (PMTCT) of the virus. The risk of mother-to-child transmission occurs during pregnancy, delivery, and breastfeeding. During pregnancy and labour the risk of transmission is 15% to 30%. Breastfeeding through 18 to 24 months increases the overall risk to 30% to 45% (De Cock et al., 2000). A recent cost-effectiveness study showed that a PMTCT strategy focused on increasing contraception use among PLHIV women could avert 30% more HIV-positive births than prophylactic nevirapine alone, at the same level of expenditure (Reynolds et al, 2006).

Another study found that even moderate reductions in the number of pregnancies to HIV positive women ranging from 6% to 35% could avert HIV positive births at the same rate as the use of ARVs for PMTCT (Sweat et al, 2004). Another study also revealed that the combination of family planning with PMTCT services could prevent nearly as double the number of HIV positive births as the use of ARVs-based prophylaxis in countries with high

HIV prevalence rates (Stover et al, 2003). Recent levels of contraceptive use in Sub-Saharan African countries are already preventing 173,000 HIV positive births annually, though contraception is not widely available in this region. An additional 160,000 HIV positive births can be prevented in Sub-Sahara Africa if all women have access to contraceptive services (Reynolds et al, 2005). A similar analysis which focused on PEPFAR countries found that contraception prevents a wide range of HIV positive births from as low as 178 in Guyana to as much as 120, 256 in South Africa (Reynolds et al, 2005).

2.3. SEXUALITY, FERTILITY AND CONTRACEPTION IN HIV POSITIVE WOMEN

As more than 80% of all women living with HIV and their partners are in their reproductive years (Siegel, 2001), many will continue to want children after learning their positive status, whether to start a family or to have more children. Others may wish to regulate their fertility, so that they can decide whether to try for a pregnancy and when (Delvaux, 2007). In studies of women with HIV infection approximately 70% are sexually active, effective contraception use is variable, and unplanned pregnancy frequently reported (Magalhaes et al, 2002; Hankins et al, 1998; Wilson et al, 1999).

HIV in South Africa is transmitted predominantly through heterosexual sex, with mother-to-child transmission being the other main infection route. The national transmission rate of HIV from mother to child is approximately 11% (UNGASS, 2010). In South Africa, almost 20% of pregnancies are unwanted and an additional 36% are unintended at the time of conception (DoH, 2001), highlighting problems in access to and effective use of contraception (Morronni, 2006). Each year an estimated 220,000 women living with HIV in South Africa become pregnant. Although coverage of prophylactic antiretroviral therapy to prevent MTCT increased from 15% to 73% between 2004 and 2008 (WHO, 2009), recent estimates report that over 64,000 infants are infected with HIV via MTCT each year (Barker, 2007). Combination antiretroviral therapy became available in South Africa's public sector clinics in 2004 and by the end of 2008 an estimated 700 000 adults were receiving HAART, an antiretroviral therapy coverage of just 31% (WHO, 2009).

2.4. THE CHOICES OF CONTRACEPTIVE METHODS FOR HIV POSITIVE WOMEN

HIV positive women have the rights to make informed choices relating to their reproductive

lives which should be devoid of coercion or restriction from child bearing when desired and appropriate contraceptive use for family planning (UNFPA, 2004). Women with HIV infection, like other women, may wish to plan pregnancy, limit their family, or avoid pregnancy. Health professionals should enable these reproductive choices by giving them proper counselling and providing appropriate contraception at the time of HIV diagnosis and during follow up (Mitchell, 2004).

In South Africa, varieties of contraceptive methods are available in public health facilities for use by PLHIV women. These include hormonal contraception which comes in forms of oral contraceptive pills, Hormonal Injectables and Combined hormonal transdermal patches. Both the oral contraceptive pills and injectables come in forms of combined oestrogen/progesterone preparations and progesterone-only preparations. All these are effective methods of contraception available to PLHIV women (Kaida, 2010). A WHO publication indicated that there are no restrictions on the use of hormonal contraception by HIV positive women, whether pills, Injectables, implants, patches or rings. Women on antiretroviral treatment can use them as well (WHO, 2004).

However, the drug rifampicine, which is used for tuberculosis treatment, may reduce the effectiveness of oral contraceptives (Dickinson, 2001), and the limited data available suggest that several antiretroviral drugs may either enhance or reduce the bioavailability of steroid hormones in hormonal contraceptives (Chu Jet al, 2005). Other methods available include intrauterine contraceptive devices (IUCDs) and the use of both male and female condoms (WHO, 2004). Amongst all the methods listed, only the condoms are effective in protecting against unwanted pregnancy, STIs and HIV as well (Alfonsi, 2005). Latex condoms, if used consistently and correctly, are highly effective in preventing heterosexual sexual transmission of HIV, the causative agent of AIDS (CDC, 2011). A meta-analysis of epidemiologic studies of condom effectiveness revealed that the consistent use of latex condoms provides a high degree of protection against heterosexual transmission of HIV (Weller, 2004). Therefore, the consistent use of condoms is a well recommended public health strategy, not only for preventing HIV transmission, but also for preventing unintended pregnancies (Alan E et al, 2008).

Recent studies done in South Africa highlighted the preferences of South African women for each the contraceptive methods. A study (Phaweni, 2010) done in rural Mpumalanga among

HIV positive women show that family planning methods used were Injectables (54.8%), Male Condoms (33.9%), Pills (22%) and while the female condom is at 14.6%. Another study done amongst Xhosa speaking women in rural Western Cape showed that 77.6% of them are involved in inconsistent condom use with their male partners (Land, 2007). However, dual method use is featured in South Africa's new reproductive health policies as an important means of family planning as well as of prevention of infection with HIV and other sexually transmitted infections (STIs) especially for HIV positive people (Myer et al 2002). Dual protection, defined as any strategy that prevents both unwanted pregnancy and sexually transmitted infections (STIs), including HIV, is emerging as an important preventive approach in reproductive health (Woodson, 1999). It may include various combinations of pregnancy and STI prevention, such as the use of condoms with hormonal contraceptives, or it may consist of other risk reduction behaviours such as nonpenetrative sex or abstinence.

In South Africa, the predominance of hormonal contraceptives, particularly Injectables, means that the simplest approach to dual protection is through the combination of a barrier method, most commonly the male condom, with a nonbarrier (primarily hormonal) contraceptive (Myer, 2002). South African reproductive health policies promote dual method use as an important means of preventing both unwanted conceptions and transmission of HIV and other STIs (DoH, 1999). A study done in the Western Cape revealed that the frequency of dual-method use is low among sexually active women attending public health facilities in the Western Cape, with 33% of women reporting having ever used dual methods during sexual intercourse and 10% currently using dual methods (Morrisoni et al, 2006).

2.5. FACTORS INFLUENCING THE CHOICE OF CONTRACEPTIVE METHODS IN HIV POSITIVE WOMEN

Contraception use and compliance is dependent on the range of methods available, patient choice, prevalent health and religious beliefs, perceptions of method effectiveness, and side effects. For example, some women may be less tolerant of heavy and prolonged vaginal bleeding than amenorrhoea which will make them prefer the amenorrhoeic side effects of Injectables (Bongaarts, 2000; Playle, 2000; Imbuiki et al 2010). Correct use of most user dependent methods like OCP and condoms requires a basic knowledge of reproduction and literary know-how to follow written instructions (Gazmararian et al 2002). In many countries (South Africa inclusive) women are unable to make autonomous decisions about their sexual and reproductive health because economic dependence, and established cultural or religious

attitudes to women's rights (UNAIDS 1999). The French SEROCO study on the impact of HIV diagnosis on sexual and contraceptive behaviour found that of the sexually active women, 20% were using no contraception, 24% became pregnant, and 63% of pregnancies ended in abortion (De Vicenzi et al, 1997). In the African DITRAME Project, 39% of PLHIV women used contraceptives; factors significantly related to contraceptive use were marital status and level of education (Desgrees-Du-Lou et al, 2002)

There are different factors that have been listed as influencing choice of contraceptive methods in HIV positive women. Accessibility to healthcare services, availability of contraceptive methods and their cost are important factors especially for rural women in resource poor settings ((Harries et al., 2007). The religious, cultural, and personal beliefs of the women are also important factors influencing choice of contraceptive methods. The biological and cultural role of women in society is such that women are expected to procreate irrespective of their HIV status (Cooper et al, 2005). Certain religious beliefs abhor the use of condoms while some other religions forbid contraception of any kind.

Another factor is the acceptability of the method to the partner of the woman. This is more in the case of condom use whereby most times women are not able to negotiate condom use as they may be perceived as being promiscuous. In some cases many men are unwilling to use condom because it is perceived is reducing sexual pleasure and somewhat cumbersome (UNDP/UNFPA/WHO/World Bank, 2002; Imbuiki et al., 2010). The effects of contraceptive method on menstruation is also another factor that can influence choice of contraceptive method (Imbuiki et al., 2010).

The HIV status of a woman including the CD4 count, viral load, and general physical wellbeing can influence the choice of contraceptive method (Stanwood, Cohn, Heiser & Pugliese, 2007, Imbuiki et al, 2010). The level of knowledge received about healthy choice of contraception at family planning counselling may also influence the choice. PMTCT knowledge of the HIV positive woman may also influence the choice of contraceptive method. Another important factor is whether the woman has disclosed her status to the partner or not (Peltzer, Chao and Dana, 2008; Kaida et al, 2010). The HIV status of the partner of the woman may also have an influence on contraceptive choices. This is dependent on whether the partner's status is known or not and also on whether it is concordant or discordant (Myer et al., 2002).

Reproductive health guidelines that are available are ambiguous on whether or not pregnancy among HIV positive couples is advisable. They rely heavily on the counselling services that allow clients to make autonomous decisions. This uncertainty creates grey areas which allow health care providers to impose their own ideals, values and attitudes about what are right for clients (London, Orner and Myer, 2008). According to London et al. (2008), these provider's values and attitudes may significant impact on the effectiveness of non-prescriptive guidelines, especially where social norms and stereotypes about childbearing are powerful. Health providers could be torn between divided loyalty pressures with negative effect on the rights of clients and eventually the decisions they will make on the choice of contraceptive method.

There are few studies (Cooper et al., 2005; Cooper et al., 2007; Laher et al, 2009; Peltzer, Chao and Dana, 2008, Imbuiki et al., 2010) that highlighted the pregnancy desires or fertility intentions of the women or their partners as a factor influencing the choice of contraceptive methods used by PLHIV women. A study (Peltzer, Chao and Dana, 2008) conducted in the Eastern Cape of South Africa investigated family planning needs, knowledge of HIV transmission and HIV disclosure among 116 HIV-positive women and 642 HIV-negative women. Although, all women had received counselling on safe sex during pregnancy, only 65.8% of the HIV positive women practiced safe sex. During the postnatal period almost all women received counselling on family planning, yet the use of contraceptives and condoms were low. Among HIV-positive women, PMTCT knowledge and the younger age of the mother were linked with pregnancy desire. Studies within and outside South Africa has suggested that many PLHIV women continuously desire pregnancy despite their awareness of their HIV status (Delvaux, 2007; Phaweni, 2010; Farlane, 2010). Another study done on HIV positive women (HAART-users and HAART-naive) and HIV negative women between ages of 18-44years in Gauteng revealed that about 45% of them have desires to be pregnant. HAART users were more likely to use dual protection (68%) compared to 58% in HAART naive women (Kaida et al., 2010). In this study, contraceptive use was associated with younger age, having two or more living children, and expressing an intention not to have (more) children also remained significantly associated with contraceptive use. In a study (Phaweni, 2010) done in Mpumalanga amongst non-pregnant HIV positive women, bivariate analyses of data revealed that; lower age, no child or fewer number of children, had resumed sexual relations, knowledge of PMTCT, had discussed family planning at postnatal care visit,

had received information on future fertility, had shared HIV test results with the mother, current partner was aware of HIV status, and knowing the HIV status of their baby were associated with pregnancy desire.

Multivariate analyses of the data in this study by Phaweni in 2010 also showed that; no child or fewer number of children, had discussed family planning at postnatal care visit, current partner was aware of HIV status, and knowing the HIV status of their baby were associated with pregnancy desire. And all these could play important role in the decision to use contraception and the choice of the method to be utilized for family planning. One other factor the researcher will seek to explore is whether the Child Support grants (CSG) could be influencing the choice of contraceptive methods by PLHIV women especially in one of the poorest provinces in the country. There have been no studies done locally in this direction but a study was done on the influence of CSG on teenage fertility rates in South Africa (Makiwane et al., 2006). A school of thought developed in South Africa which claimed that the CSG has some perverse incentives, one of which is to encourage women to have more children, especially teenagers (PPASA, 2003; Hashim, 2005). When the SA government increased the age of the CSG beneficiaries from 7 years to 14 years in 2004, the number of beneficiaries from the scheme increased.

During that period the teenage fertility rate increased relative to other age groups, with the highest teenage pregnancy rate reported in Eastern Cape and Limpopo provinces (Statistics SA, 2005). The analysis of the study (Makiwane et al., 2006) concluded that there was no relationship between age specific teenage fertility rate and increased amount of child support grants through quantitative analysis of some data. A study (Panday et al, 2009) done in the Eastern Cape, showed the HIV prevalence is higher among school aged youth than adults and that the province has the highest teenage pregnancy rate (68.81 pregnant pupils per 1000 registered) in the country . This showed that there might be a link between teenage pregnancy rate, contraceptive choices and HIV prevalence rates in the Eastern Cape. However, the researcher will try to find out if the child support grant has strong link and influence on the choice of contraception and the teenage pregnant rates.

Other factors that can influence the choice of contraceptive methods amongst PLHIV women are clinical factors. They will not be the focus of this study. However, the researcher will like to make mention of them. These factors are: Menstrual, Sexual, and Reproductive history

such as menorrhagia, dysfunctional uterine bleeding dysmenorrhoea, past pelvic infection, past ectopic pregnancy; Medical history such as abnormal liver function, past history of venous thromboembolic disease, hypertension, hyperlipidaemia, current drug abuse; and Medications like Enzyme inducers, antibiotics, and teratogenic agents.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1. INTRODUCTION

The purpose of this study is to identify the factors that influence the choice of contraceptive methods amongst PLHIV women in the Cofimvaba area. These factors are currently not completely understood. In view of this, a quantitative research approach will be adopted for the purpose of this study to collect some type of numerical data in order to answer the research question.

3.2. RESEARCH DESIGN

The design is a descriptive type of research in which the goal is to attempt to identify variables that exist in a given situation or attempt to identify causal relationships. It is a type of research technique frequently used to determine knowledge, attitude, beliefs, perception, and practices for the purpose of a particular decision making (Christensen, 2004). In this study, the decision making is the choice of contraceptive methods by PLHIV women. The researcher sought to determine the factors influencing their decisions regarding choice of contraceptive methods by exploring their knowledge, attitude, practices, beliefs and practices about HIV transmission and family planning.

3.3. DATA SOURCES

Data were obtained from the hospital files, maternity case records and responses of consenting participants to the questionnaire designed for this study. Pertinent data obtained from participants records were to confirm the current type of contraceptive method adopted by individual participants and also to obtain the HAART regimen of participants who are currently using life-long ARVs.

3.4. DATA COLLECTION

The survey was conducted using a questionnaire which consists of certain number of closed-ended questions (about 29) and opened ended questions (about 7), apart from the first section that obtained basic information on the bio-data of the participants. Participants were made to answer Yes or No to the closed ended questions and also to take the option 'Don't Know' where they don't know or they are not sure. The questionnaires were

self-administered or via interpretation by a delegated trustworthy Xhosa-speaking nurse in the ARV unit because the researcher is not fluent in Xhosa language. The themes that were covered will be demographic characteristics of the respondents, general knowledge about HIV transmission and family planning; attitudes towards contraceptive methods and disclosure of HIV status, fertility intentions and HIV transmission to child and partners; perceptions about contraceptive methods, family planning counselling and methods; and beliefs and practices around HIV transmission and contraceptive methods. The questionnaire was piloted and the findings put into consideration in the administration of the questionnaire while conducting the research proper.

3.5. POPULATION AND SAMPLING

The population sampled by the researcher for the purpose of this study are non-pregnant PLHIV women between 16 and 40 years of age attending Cofimvaba Hospital. A stratified sampling method was used to select a sample size of about 60 respondents but ensuring there is an even or near even distribution of numbers between a set of 5-year age ranges. This age ranges will have 12 respondents selected for ages 16-20, 21-25, 26-30, 31-35, and 36-40 years. However, only 50 questionnaires were satisfactorily returned for the purpose of data analysis.

3.6. DATA ANALYSIS

This research is quantitative. For the purpose of analysis, conversion of the responses obtained to numerical values was instituted. The data were captured and coded in Excel spread sheet and further analyses of data were done using the statistical functions available on Microsoft Excel.

3.7. ETHICAL ASPECTS

A written and documented permission was obtained from the hospital management for the purpose of conducting this study. Ethical clearance was sought and obtained from the Research Ethics Committee of Stellenbosch University. The research was given a protocol number HS 725/2011 on approval. Participation was voluntary. Each participant was made to sign a consent form obtained and modified from the university website. The process of data collection ensured no psychological damage was done to participants and that the researcher emphasised the study is not meant to be judgemental of any participant. Participants were informed they are allowed to withdraw if they so which. However, participants were assured

of all confidentiality of the information obtained from them and their hospital records. The names of participants were neither written on the questionnaires nor the consent form in order to maintain anonymity of the participants. Instead, each participant was allotted study identification number. Data collected was kept secret and safe all the time by the researcher.

CHAPTER 4

FINDINGS AND DISCUSSIONS

The data collated from the demographics of a quantitative research survey is of fundamental importance to finding some association between certain variables and factors in a study because there may be interlinks between certain demographic parameters and certain set of knowledge, attitude or practical behaviour in relation to certain life issues. We shall begin our findings from the demographic data obtained from this study.

The majority (72%) of the PLHIV women were never married while 75% of those are age 30 years or below (Figure A.2). There is high unemployment rate (66%) amongst the PLHIV women, coupled with the fact that 8% of those aged above 20 years have never worked. The unemployment rate could be said to be about 74% (Figure A.3) amongst the PLHIV women. This is not far from the unemployment rate (68%) in the general population in the study by McCann, 2005. The financial means of living by those unemployed or who have never worked are majorly through social grants. At least 82% of them are dependent on one form of social grant or the other. Figure A.4 showed that 52% and 15% of them are dependent on child support grants only and disability grants only, respectively. McCann (2005) had revealed that poverty rate in this district is at 73%. This is also corroborated by the population in this study. At least 78% of the study population have an average household monthly income of R1000 or less (Figure A.5).

The essence of this study to investigate choices of contraceptive methods in PLHIV women is recognition of the sexuality of the HIV positive woman. Therefore, it was necessary to know how sexually active our subjects could be. In this study, 98% of the subjects have at least one sexual partner within the last one year while 16% of them have at least 2 sexual partners within the last one year (Figure A.6). No doubt, PLHIV women in this area are sexually active as exemplified in other studies (Magalhaes et al, 2002; Hankins et al, 1998; Wilson et al, 1999). The use of HAART and having two or more children has been associated with contraceptive use (Kaida et al, 2010). It is imperative to know the demographics along these parameters. In this study, 88% of participants are currently using HAART (Figure A.7a) but only 44% (Figure A.8a) have two or more children. In the build-up to the research problem of this study, the researcher expressed concerns that the frequent presence of the drug- Nevirapine in

the HAART regimen of the HAART-using PLHIV women in this area has not been consistent with their contraceptive choices. The Nevirapine is made available usually for women who have future pregnancy desires and as such will engage in unprotected sex. This antiretroviral drug has lesser tendencies to cause deformities in the developing baby, especially in the first trimester of pregnancy.

The goal of using nevirapine, therefore, is to give rest of mind to the woman that if she does get pregnant there will be no fear of the baby having deformity as opposed to using Efavirenz (common substitute for Nevirapine) which is commonly used by men and by women with no future pregnancy desires. However, this study revealed that 61% of the participants are currently using Nevirapine-containing HAART regimen (Figure A.7b). We shall correlate this with their contraceptive choices and future plans for pregnancy in the later part of this discussion. The study sought to test the knowledge of the participants about HIV transmission, prevention of HIV infection, methods of contraception and established factors influencing choice of contraceptive methods as highlighted in Chapter 2. The knowledge of PLHIV women in this study about how HIV is transmitted is at an average 78% (Figure B.1). This is quite impressive. However, their knowledge score on vertical transmission of HIV from pregnant mother to the unborn child is a bit below par (56%) and is the least score of all the possible means of HIV transmission. This is a gap in the knowledge of the PLHIV women about HIV transmission because vertical transmission is the second most important means of HIV transmission in South Africa (UNGASS, 2010). As shown in Figure B.2, their knowledge about how HIV infection is excellent at an average score of 75%. What is worthy of note is that between 60-70% of them know that injectables and oral contraceptive pills do not prevent HIV transmission. The subjects were asked to mention every type of contraceptive method that they know. Figure B.3 revealed that the most frequently known contraceptive method is the injectables (76%), followed by Condom (66%) and then OCP (30%).

Interestingly, 10 % of them mentioned Abstinence as a method of contraception but in a population of women are 98% sexually active abstinence may not be a popular option for them. None of the participants directly mentioned hormonal skin implants and bilateral tubal ligation as methods of contraception. This did not come as a surprise because in a resource poor settings like where this study was done, those two methods are not frequently offered to clients. Only 4 % could mention the four most frequently available methods combined

together at once (Condom, OCP, injectable & IUCD). However, the IUCD mentioned by 8% of them, was only introduced in the second quarter of this year by the provincial government as part of the strategy to reduce teenage pregnancy rates in the area.

The condom as a contraceptive method for simultaneously preventing pregnancy, HIV and other STIs (Alfonsi, 2005) is known by 80% (Figure B.4). Only 74% of them (Figure B.5) know about dual protection as the preferred choice of contraceptive method (Myer et al 2002) despite the fact that 90% of the subjects (Figure B.8) acknowledge that they had received counselling from health professionals about dual protection as promoted by the government (DoH, 1999). Through re-infection, increased viral load and introduction of drug resistant strains of the HIV virus, 92% of the participants agreed that the health of the HIV positive woman could be worsened if she continues to have unprotected sex with infected partner(s) (Figure B.6).

In the last part of the knowledge test, the study sought to determine the level of knowledge of the participants about established and known factors that influence the choice of contraceptive methods as described in Chapter 2 of this project. However, the researcher decided to skew in a few other factors that PLHIV women in the area may be aware is existent in the area but which are not yet generally known. These factors include: fear of stigmatisation or discrimination by family or friends, fear of stigmatisation by health professionals and financial needs for CSG. The six most known factors influencing the choice of contraceptive methods are counselling by health professionals (84%), side effects of the contraceptive methods (78%), financial needs for child support grants (76%), access to or availability of the contraceptive method at the nearest clinic (74%), pregnancy desires or intentions (70%) and the use or non-use of HAART (70%).(Figure B.9). A considerable fraction of the women also responded positively that they know that fear of stigmatisation by health professionals (62%) and fear of stigmatisation by family of friends (56%) may influence the choice contraceptive methods by PLHIV women.

In the Section C, the attitude and perception of the PLHIV women were examined in relation to contraceptive methods and factors influencing choice of contraceptive methods. The respondents were asked which contraceptive method(s) do each of them think or feel is the most appropriate for her, by looking at their individual circumstances. The response was that only 8% of them are favourably disposed to the use of dual protection despite 90% of them

being counselled on dual protection. About one-third of the study population feel they are favourably disposed to using methods that amount to unprotected sex while 62% feel they could be okay using condoms only (Figure C.1).

Nevertheless, 48% of our study population feel that pregnancy desire and intentions may influence their choice of contraceptive method (Figure C.2) as highlighted in some studies (Cooper et al., 2005; Cooper et al., 2007; Laher et al, 2009; Peltzer, Chao and Dana, 2008, Imbuiki et al., 2010). In Figure C.3, 42% feel that the state of being sick or healthy may influence their choice of contraceptive method (Stanwood, Cohn, Heiser & Pugliese, 2007, Imbuiki et al, 2010). In Figure C.4, 40% of the PLHIV women feel or think that family, social or cultural pressures that a woman must bear children could influence their choice of contraception (Cooper et al, 2005).

In figure C.5, only 36% of the study population feels that health workers counselling may influence their choice of contraceptive method (Peltzer, Chao and Dana, 2008; Kaida et al, 2010) despite 84% of them knowing that health workers counselling is factor that can influence the choice of contraceptive method. This is of serious concern and it all boils down to the fact that not all appropriate knowledge and values impacted on individuals by health workers on how to handle their reproductive lives results in appropriate attitude towards that healthy contraceptive choices (London et al, 2008). Interesting as well, 36% of the women feels that health workers attitude and approach to counselling could influence their choice of contraceptive method (Figure C.6).

According to Harries et al, 2007, accessibility and availability of contraceptive methods in health care services centres is a considerable factor that can influence the choice of contraceptive methods especially in resource poor settings like where this study was conducted. In this study, 44% of the women (Figure C.7) feel that the contraceptive methods available at their nearest health centre or clinic may be able to influence their choice of contraceptive methods.

Another factor that may influence the choice of contraceptive method is the acceptability of the method to the woman's male sexual partner especially when it comes to the use of condom which is perceived by men as reducing sexual pleasure or could mean their women are promiscuous (Imbuiki et al., 2010). In this study (Figure C.8), 66% of the women feel that

their male partner may not influence their choice of contraceptive method. Likewise, 58% of the women feel that the fear of being stigmatised by their male partner may not influence their choice of contraceptive methods (Figure C.15). It will be encouraging that the larger percentage of the women may be able to stand up to their men on their choice of contraceptive especially if it has to do with the choice of condom. But does this attitude really translate to behaviour? We shall see later in this discussion.

Another important factor that may influence the choice of contraceptive method is whether the woman has disclosed her HIV positive status to the partner or not (Peltzer, Chao and Dana, 2008; Kaida et al, 2010). There are women (42%) in this study who feel whether or not disclosing their status to their sexual partner could influence their choice of contraceptive method (Figure C.9). Furthermore, 38% of the women agree with study by Myer et al in 2002 that they feel the HIV status of their sexual partner (either positive or negative) could affect their choice of contraceptive method (see Figure C.10). This will be dependent accordingly on whether the status of their partner is known and whether it is discordant or concordant.

The social and welfare burden created by HIV in our society is well known. The HIV positive woman could be a burden to her family or friends when she is sick and if she dies, the children she leaves behind could become secondary socio-welfare burden to her family. So the reproductive lives of HIV positive women will be of concern to their family or friends and she might get stigmatised if they found out she is making contraceptive choices that could mean more welfare 'burden' for them. In Figure C.11, 36% of our study population feel the fear of stigmatisation by family or friends could affect their choice of contraceptive methods. This factor will be dependent on how much support each individual gets from family and (or) friends on their reproductive lives.

According to London, Myer and Orner in 2008, there are uncertainties in reproductive health guidelines about pregnancy in the HIV positive woman and there is a tendency for health professionals to impose their own ideals, attitudes and values on their clients. Often, it may result in health professionals advising HIV positive woman not to get pregnant because they know that she can infect her partner and the baby in the process. In Figure C.12, 32% of the PLHIV women acknowledge that they have perceived things in the attitude of health workers during counselling that suggest HIV positive women should not bear children. This means that certain of health professionals in the area have found themselves in the same situation

described by London et al.

Moreover, respondents were made to mention the side effects they might have felt with any contraceptive methods they used. In Figure C.14, majority (58%) have felt no side effects before now. 50% of this group are currently using condoms only and 6.25% are currently using dual protection. The individuals who felt amenorrhoea or irregular menses are currently using injectables. These are common side effects of the Injectables. And it is no surprise that three-quarter of those who are currently using no contraceptives has had vaginal discharges. Vaginal discharge is a symptom of many sexually transmitted infections. In Figure C.13, 26 % of the women feel that the side effects of the contraceptive methods could affect their choice of contraceptive method while 66 % of them said no. However, in a study population where some have never felt a side effect with their contraceptive method or where the amenorrhea experienced commonly with the popular injectables is a desirable side-effect, a response of this nature is not far-fetched.

An average 36% of the respondents think or feels that the factors mentioned (in Section C, Questions 2-13 and 15) could influence their choice of contraceptive methods. This is shown in Table C.16 and Figure C.16. Their attitude and perception to these factors, on the average, appear to be the reverse compared to their knowledge on those factors. However, attitude and perception is an individual thing, each individual is not expected to feel that majority of the factors could influence her choice of contraceptive method. So it will be down to each individual circumstance and (or) situation. It must be emphasized that identification of the gap between their knowledge and attitude is not one of the objectives of this study; therefore, the researcher would not delve too much into that.

The final part of the findings and discussions will be on the practice and behaviour of our participants on issues around their contraceptive method of choice and their HIV status. The participants were asked which contraceptive methods they are using now. In Figure D.1, there are 56% using condoms only, 28% are using injectables only, 4% are using OCP only, 2% using IUCD, 4% are using condoms and injectable (dual protection) while 6% are using no contraceptives. Overall, only 60% of the participants in this study are having protected sex while 40% are still having unprotected sex despite the fact that 92% of them know that their health condition could get worse if they continue to have unprotected sex and 80% of them knowing that the use of condoms offers prevention of HIV infection, pregnancy and STIs.

This outcome is similar to the study done in the Eastern Cape in 2008 by Peltzer, Chao and

Dana where only 65% of the women practising safe sex. In this study, there are gaps between the knowledge (90%), attitude (70) % and behaviour 60% of the participants when it comes to practising safe sex. Similarly, only 4% of the participants are practising dual protection whereas 92% of them have received counselling on dual protection as a preferable contraceptive method of choice for HIV positive women and 8% of them having positive attitude to the use of dual protection. This level of use of dual protection amongst this mostly HAART using women is a far cry below the 65% in the study (Kaida, 2010) done in Gauteng.

The researcher sought further to find the reasons for their choice of contraceptive methods. There are three participants who are using no contraception. Two of them gave their reasons as intending to get pregnant and one said she has no sexual partner for now. The first two in this group emphasizes pregnancy desires or intentions as one of the factors influencing the choice of contraceptive methods (Cooper et al., 2005; Cooper et al., 2007; Laher et al, 2009; Peltzer, Chao and Dana, 2008, Imbuiki et al., 2010) Amongst the two that are using OCP, one of them gave her reason that she wants her menstruation to be regular again which could be a therapeutic effect OCP can offer either from the irregular menses occurring from side effects of using OCP or from primary dysfunctional uterine bleeding. The other OCP-only user gave her reasons as being “satisfied and comfortable” with the Pills. This is the same reasons given by three out of the fourteen injectables-only users. Similarly, another three of the fourteen injectables-only users gave their reasons as – “the 2-3 months interval is convenient and easy to remember”. Also, one condom-only user gave her reason for using condoms as “easy to use”.

From these foregoing, I can safely say that on the factors influencing the choice of contraceptive methods in PLHIV women in this study is the ease, convenience, comfortability and satisfaction with the method. Still amongst the injectables- only user, one of them gave her reason for using it as “to gain weight and look healthier”. The general state of health of this subject is influencing her choice of contraceptive method. Another gave her reason for using injectables as “don’t want to lose blood through menses” (prefers amenorrhoea). Weight gain and amenorrhoea are side effects of Injectables and this means they prefer the side effects of the injectables as corroborated in other studies (Bongaarts, 2000; Playle, 2000; Imbuiki et al 2010). The only IUCD-only user in this study gave her reason that the method “has no side effects and can stay for 5 years” and one of the condom

only users gave her reason as “no pains”. At this point, it is suffice to say that one of the factors influencing the choice of contraceptive methods in these women is the side effects of the contraceptive methods just as in other studies (Bongaarts, 2000; Playle, 2000; Imbuiki et al 2010).

Another interesting reason given by one of the injectable-only users and one of the condom plus injectable user is “don’t want to get pregnant in case of a rape. Apparently, the fear of rape and getting pregnant after a rape is a factor influencing their choice of contraceptive method. The injectable being “the method available at the nearest clinic” was given as a reason for her choice of the injectables by another injectables-only user. This is just as described as a factor influencing the choice of contraceptive methods by women in resource poor setting by Harries et al (2007). One other injectable-only user gave her reason as to “prevent pregnancy for now and have a baby later” while one of the condom-only users gave her reason as- “can decide to have a baby later”. These strengthens the fact that safe sex or not, pregnancy desires and intentions is a factor influencing the choice of contraceptive methods (Cooper et al., 2005; Cooper et al., 2007; Laher et al, 2009; Peltzer, Chao and Dana, 2008, Imbuiki et al., 2010) amongst PLHIV women in the Cofimvaba area.

There are, however, those who gave reasons which are in line with the knowledge acquired from counselling obtained from health professionals about healthy contraceptive choices. The “condom prevent STIs” were the reason given by the two dual protection users and 12/28 (43%) of the condom-only users. Another reason was to “prevent getting more HIV infection” was given by 8/28 (29%) of the condom-only users. “Do not want to infect my partner” as a reason by 8/28 (29%) of the condom-only users. Lastly, 15/28 (53%) of the condom-only users gave their reason as- “to prevent getting pregnant and having a baby born with HIV”. This is also the reason given by 4/14 of the injectables-only users (Figure D.2e). It must be borne in mind that some of the condom-only users gave more than one reasons (Figure D.2f).

The findings here are in line with other studies (Peltzer, Chao and Dana, 2008; Kaida et al, 2010) that the level of knowledge received about healthy choice of contraception at family planning counselling and PMTCT knowledge of the HIV positive woman can influence her choice of contraceptive method. Overall, 56% of the women in this study have the knowledge of PMTCT but only about 40% are actually practicing their contraception with a view to

reduce mother-to-child transmission of HIV. In this study as well, 92% of the women know that re-infection with HIV can increase viral load of the woman, cause infection with drug-resistant strains of HIV and worsen their health condition but only 16% of them were making their contraceptive choice with a view to prevent HIV re-infection. In summary, there are gaps between the knowledge of the women and their practice when it comes to vertical transmission of HIV and horizontal transmission of HIV.

Next up, is the question of how consistent the PLHIV women use their individual choice of contraception. Amongst the 28 condom-only users, only 2/28 (7%) reported not using the condom consistently. Likewise, 1/14 (7%) of the injectables-only users reported not using her method consistently. Other people use their methods consistently (Figure D.3). “No reason” was given as the reason for the inconsistency of the 3 women. Another behaviour which was examined was if the women have disclosed their HIV status to their partners, 84% have disclosed their status to their partners (Figure D 5-8). This might explain why the women were more likely (52%) to feel that the disclosure of their HIV status to their partners could not affect their choice of contraceptive method. Also, 78% of the women have made partner get tested for HIV (Figure D 5-8). Likewise, this may explain why the women were more likely (56%) to feel or think that the HIV status of their partner may not affect their choice contraceptive methods. In a similar vein, 88% of the women said that they can insist their partners should use condom (Figure D 5-8). This may also explain why the women were more likely (66%) to feel that pressure from their male partner could not affect their choice of contraceptive method. Though, there is a gap of 28% between those who can insist on condom use by their partner and those who are actually using condoms.

The researcher has mentioned in the literature review that studies within and outside South Africa has suggested that PLHIV women continue to desire to be pregnant despite knowing their status (Delvaux, 2007; Phaweni, 2010; Farlane, 2010). This study agrees with the aforementioned because the subjects were asked if they have plans to have more children. What came out was that 46% of the subjects have plans to have more children (Figure D5-8).

This reinforces other studies (Cooper et al., 2005; Cooper et al., 2007; Laher et al, 2009; Peltzer, Chao and Dana, 2008, Imbuiki et al., 2010) that highlighted pregnancy desires or fertility intentions of PLHIV women and their male partners as a strong factor that influence the choice of contraceptive methods by these women. Of those (23/50) who said that they

have plans for more children, 43% of them conceded that their fertility intentions influenced their choice of contraceptive method (Figure D.9). Further analysis of this group showed that 74% of those who have future pregnancy plans are aged 30 years and below (Figure D.8a).

At the same time the research revealed that 19/23 (82%) of those who have pregnancy desires have less than 2 children alive (Figure D.8b). These findings are in tandem with the study in Mpumalanga by Phaweni in 2010 that revealed that lower age and no child or fewer number of children were associated with pregnancy desires amongst PLHIV women. In Figure D.8c, the researcher sought to analyse the HAART regimen of those who have plans for more children and it showed that 65% of them are using nevirapine-based HAART regimen while 13% of them are yet to be on HAART at all. This showed a strong association between the use of Nevirapine-based HAART regimen and intention to be pregnant amongst the PLHIV women. It also means that the presence or absence of Nevirapine in the HAART regimen of PLHIV women is a factor influencing their choice of contraceptive methods. Lastly, the group of women were made to answer if the benefit of getting child support grants has a link to their future pregnancy plans. In Figure D.10, (12/23) 52% of them answered yes. Overall it means that 12/50 (24%) of the women in this study can be said to have the incentive of child support grants as reason for their fertility intentions and by extension CSG is a factor that influences their choice of contraceptive method. And this cannot be said to be out of place in study population that has 60% wholly or partially dependent on CSG for their financial needs.

CHAPTER FIVE

CONCLUSIONS AND RECOMMENDATIONS

5.1. CONCLUSIONS

The conclusions that will be made from this study will be to see how much the objectives of this study have been achieved. The first of the objectives was to determine the knowledge, attitude, perception and practice of the PLHIV women about contraception methods and the third objective was to determine the gap between their knowledge and practice. The knowledge displayed can be said to be outstanding. Their knowledge score on HIV prevention and transmission averages 78% and 75% respectively. The most commonly known methods of contraception were condoms (76%), injectables (66%) and OCP (30%). Abstinence was also given recognition as a contraceptive method (10%).

The IUCD was not well known (8%) and neither was mention made of hormonal transdermal implants nor bilateral tubal ligations (surgical contraception). It appears the reason for this scenario is because the participants made mention of those methods that are readily available at their PHC. The condom was also well known (80%) as the method that can prevent STI, HIV and pregnancy but only 70% have the right attitude to the use of condom while the practical use of condom is limited to 60% of the participants. About 90% of the women have received counselling on dual protection as the method of choice for sexually active, 75% know actually that dual protection is the preferred contraceptive method sexually active HIV positive women but only 8% of them have positive perception to the use of dual protection. In practice, only 4% of them are practising dual protection.

There is a big gap between their knowledge, attitude and practice on contraceptive methods. In study population that is 98% sexually active, it is worrisome that 40% are engaged in unprotected sex. And in a situation like this, there will be high tendency for increased incidence and prevalence of HIV infection through vertical and horizontal transmission of HIV by these PLHIV women in this community. The health professionals are not winning the fight to popularise dual protection at all. The method is as good as non-existent.

The major factors that have been identified as influencing the choice of contraceptive methods in these women include: pregnancy desires and intentions; counselling by health

professionals; the contraceptive methods available at the nearest PHC, the side effects of the contraceptives and the convenience and comfortability associated with the methods; the use or non-use of HAART, especially the presence of Nevirapine in the HAART regimen; and financial needs for child support grants. Other factors that featured prominently include: family, social, cultural pressures that a woman must have children; pressure and fear of stigmatisation by male partner; fear of stigmatisation by family or friends; attitude and approach of health professionals to family planning counselling; fear of stigmatisation by health professionals; general state of health of the PLHIV woman; disclosure and non-disclosure of HIV status to male partner; the HIV status of male partners and the fear of being raped.

5.2. RECOMMENDATIONS

- There is a need to for more integrated approach to the PMTCT programme by the HIV programme managers and PHC nurses. There seem to be too much focus on initiating more women on ARVS without paying too much attention to contraception as major factor for PMTCT. Focused counselling on family planning must go simultaneously with ARVs initiation counselling in the hospital and all the PHC.
- There is a need to revitalise the campaign to popularise dual protection as a method of choice for sexually active PLHIV women in these area. The attitude of the women to health professional counselling is still poor. Health professionals need change their attitude and approach to counselling from being dictatorial and imposing, to being more explanatory, educative and persuasive.
- There is a need to empower the women economically and the idea being mulled in certain quarters that the disability and child support grants given by the Department of Social development to be replaced by a substantial basic income grant to all PLHIV people needs to be reconsidered.

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APPENDIX

**RESEARCH ETHICS COMMITTEE: HUMAN RESEARCH (HUMANIORA)
ETHICS COMMITTEE APPLICATION FORM**

**Application to the University of Stellenbosch RESEARCH ETHICS COMMITTEE:
HUMAN RESEARCH (HUMANIORA) for clearance of new/revised research projects**

This application must be typed or written in capitals

Name: DR. O. K. OLUWOLE

Position/Professional Status: STUDENT/MEDICAL PRACTITIONER

Affiliation: Research Programme/Institution / Department: MPHIL HIV/AIDS
MANAGEMENT/MANAGEMENT SCIENCES FACULTY/ AFRICAN CENTRE FOR
HIV AND AIDS MANAGEMENT/ DEPARTMENT OF PSYCHOLOGY

Please indicate (√) if you are a registered student at SU?

YES	√
NO	

If yes, for which degree/programme are you registered?

MPHIL HIV/AIDS MANAGEMENT

Please specify the relevant Department at SU: AFRICAN CENTRE FOR HIV/AIDS
MANAGEMENT HUMAN PSYCHOLOGY

Who is your supervisor? DR. THOZAMILE QUBUDA

Telephone and extension no: Code: 047 no. 8748037

Fax: 0478740115 Code: 047 no. 8740115

Email: OLUWOLEOLADOTUN404@GMAIL.COM

Title of research project: FACTORS INFLUENCING THE CHOICE OF CONTRACEPTIVE METHODS AMONGST HIV POSITIVE WOMEN IN THE COFIMVABA AREA

Where will the research be carried out: COFIMVABA HOSPITAL, COFIMVABA.

1. **FUNDING OF THE RESEARCH:** THE RESEARCH WILL BE FUNDED BY THE RESEARCHER FROM HIS INCOME EARNINGS.
2. **PURPOSE OF THE RESEARCH:** THE PURPOSE OF THIS STUDY IS TO IDENTIFY THE VARIOUS UNDERLYING FACTORS THAT INFLUENCE THE CHOICE OF CONTRACEPTIVE METHODS BY PLHIV WOMEN IN THE COFIMVABA COMMUNITY AREA
3. **AIMS AND OBJECTIVES OF THE RESEARCH:**
 1. TO DETERMINE THE KNOWLEDGE, ATTITUDE, PERCEPTION AND PRACTICE OF HIV POSITIVE WOMEN REGARDING CONTRACEPTION METHODS
 2. TO IDENTIFY THE FACTORS THAT INFLUENCE THE CHOICE OF CONTRACEPTIVE METHODS
 3. TO IDENTIFY ANY GAPS BETWEEN THEIR KNOWLEDGE AND PRACTICE AS DESCRIBED ABOVE
 4. TO IDENTIFY POSSIBLE WAYS IN WHICH THE KNOWLEDGE OF THE HIV POSITIVE WOMEN CAN BE ALIGNED WITH THEIR PRACTICAL CHOICE OF CONTRACEPTIVE METHODS

SUMMARY OF THE RESEARCH: A QUANTITATIVE RESEARCH APPROACH WILL BE ADOPTED FOR THE PURPOSE OF THIS STUDY TO COLLECT SOME TYPE OF NUMERICAL DATA IN ORDER TO ANSWER THE RESEARCH QUESTION. IT IS A DESCRIPTIVE RESEARCH WHICH AIMS TO ESTABLISH VARIABLES THAT EXIST IN A GIVEN SITUATION OR IDENTIFY CAUSAL RELATIONSHIPS. DATA WILL BE OBTAINED FROM THE HOSPITAL FILES, MATERNITY CASE RECORDS AND RESPONSES OF CONSENTING PARTICIPANTS TO THE QUESTIONNAIRE DESIGNED FOR THIS STUDY. THE SURVEY WILL BE CONDUCTED USING A QUESTIONNAIRE WHICH CONSISTS OF CERTAIN NUMBER OF CLOSED-ENDED

QUESTIONS (ABOUT 25) AND OPENED ENDED QUESTIONS (ABOUT 5). THE SAMPLE POPULATION ARE NON-PREGNANT HIV POSITIVE WOMEN CLIENTS AGED 16-40 YEARS, ATTENDING COFIMVABA HOSPITAL. THE QUESTIONNAIRE WOULD BE PILOTED AND THE FINDINGS PUT INTO CONSIDERATION IN THE ADMINISTRATION OF THE QUESTIONNAIRE WHILE CONDUCTING THE RESEARCH PROPER. A STRATIFIED SAMPLING METHOD WILL BE USED TO SELECT A SAMPLE SIZE OF ABOUT 50 RESPONDENTS BUT ENSURING THERE IS AN EVEN DISTRIBUTION OF NUMBERS BETWEEN A SET OF 5-YEAR AGE RANGES (16-20, 21-25, 26-30, 31-35, AND 36-40 YEARS). DATA WILL BE ANALYSED BY CONVERTING RESPONSES TO NUMERICAL VALUES. THEN THE DATA VALUES ARE CAPTURED AND CODED IN EXCEL SPREAD SHEET WHICH WILL THEN BE ANALYSED USING STATISTICAL PACKAGE FOR SOCIAL SCIENCES. THE RESULTS FROM THE ANALYSIS WILL BE DISCUSSED WITH THE AIM TO ACHIEVE THE OBJECTIVES OF THE STUDY. COMPARISONS WITH LITERATURE REVIEW AROUND THE RESEARCH QUESTION WILL BE DONE. CONCLUSIONS WILL BE MADE AS WELL AS NECESSARY RECOMMENDATIONS WILL BE SUGGESTED.

5. NATURE AND REQUIREMENTS OF THE RESEARCH

5.1 How should the research be characterized (*Please tick ALL appropriate boxes*)

5.1.1 Personal and social information collected directly from participants/subjects √
5.1.2 Participants/subjects to undergo physical examination
5.1.3 Participants/subjects to undergo psychometric testing
5.1.4 Identifiable information to be collected about people from available records √
5.1.5 Anonymous information to be collected from available records
5.1.6 Literature, documents or archival material to be collected on individuals/groups

5.2 Participant/Subject Information Sheet attached? (for written and verbal consent)

YES	√
NO	

5.3 Informed Consent form attached? (for written consent)

YES	√
NO	

5.3.1. If informed consent is not necessary, please state why:

NB: If a questionnaire, interview schedule or observation schedule/framework for ethnographic study will be used in the research, it must be attached. The application cannot be considered if these documents are not included.

5.4 Will you be using any of the above mentioned measurement instruments in the research?

YES	√
NO	

6. PARTICIPANTS/SUBJECTS IN THE STUDY

6.1 If humans are being studied, state where they are selected:

THE PARTICIPANTS WILL BE SELECTED AMONGST NON-PREGNANT HIV
POSITIVE WOMEN CLIENTS ATTENDING COFIMVABA HOSPITAL

6.2 Please mark (✓) the appropriate boxes:

Participants/subjects will:	YES	NO
be asked to volunteer	✓	
be selected	✓	

6.2.1 THE PARTICIPANTS WILL BE SELECTED BY STRATIFIED RANDOM SAMPLING METHOD AND THEN BE ASKED TO VOLUNTEER TO RESPOND TO THE STUDY QUESTIONNAIRE.

6.2.2.

Participants/subjects are:	YES	NO
Will SU student, alumni of staff data be used in this research		✓
Will interviews be conducted with SU student, alumni of staff		✓
Will questionnaires be used and distributed on SU campuses		✓
Will electronic questionnaires be placed on the SU website?		✓

6.3 Are the participants/subjects subordinate to the person doing the recruiting?

YES	
NO	✓

6.3.1 If yes, justify the selection of subordinate participants / subjects:

6.4 Will control participants/subjects be used?

YES	
NO	√

6.4.1 If yes, explain how they will be selected:

6.5 FORMAL PERMISSION WILL BE OBTAINED FROM PARTICIPANTS OR THEIR LEGAL REPRESENTATIVES TO USE RECORDS FROM PARTICIPANTS' HOSPITAL FILES, CLINIC CARDS AND MATERNITY CASE RECORD BOOKS.

6.6 What is the age range of the participants/subjects in the study? 16-40 YEARS

6.6.1 Was consent from guardians/parents obtained for participants/subjects

17 years and younger?

YES	√
NO	

Appropriate form named "Informed Consent Form 2" is hereby attached.

6.6.2 If NO, please state why:

6.7 Will participation or non-participation disadvantage the participants/subjects in any way?

YES	
NO	√

6.7.1 If yes, explain in what way:

6.8 Will the research benefit the participants/subjects in any direct way?

YES	√
NO	

6.8.1 If yes, please explain in what way:

PARTICIPANTS MAY GET THE OPPORTUNITY OF BEING COUNSELLED ON HEALTHY CHOICE OF CONTRACEPTIVE METHODS WHICH COULD BE SUITED TO THEIR OVERALL WELL BEING AND IMPROVE THE WAY THEY MANAGE THEIR REPRODUCTIVE LIFE IN GOOD TANDEM WITH THEIR HIV POSITIVE STATUS.

7. PROCEDURES

7.1 Mark research procedure(s) that will be used:

Literature	
Documentary	
Personal records	√
Interviews	
Survey	√
Participant observation	
Other (please specify)	

<hr/> <hr/>	
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7.2 How will the data be stored to keep it safe and prevent unauthorized access? What happens to the data on completion of the research?

THE RESEARCHER INTENDS TO KEEP A SPECIAL SAFE BOX FOR THE DATA COLLECTED AND IN WHICH HE IS THE ONLY ONE WHO HAVE ACCESS TO IT. THE DATA WILL BE KEPT SAFE EVEN AFTER COMPLETION OF THE RESEARCH IN CASE VERIFICATION MAY BE REQUIRED BY THE UNVERSITY IN THE NEAR FUTURE.

7.3 If an interview form/schedule; questionnaire or observation schedule/framework will be used, is it attached?

YES	√
NO	

7.4 Risks of the procedure(s): Participants/subjects will/may suffer:

No risk	
Discomfort	√
Pain	
Possible complications	
Persecution	
Stigmatization	
Negative labeling	

7.4.1 If you have checked any of the above except “no risk”, please provide details:

THE DISCOMFORT WILL BE ADDRESSED BY REASSURING PARTICIPANTS THAT TH ESSENCE OF THE STUDY IS NOT TO BE JUDGEMENTAL BUT TO BRING OUT ISSUES THAT COULD BE USED AS VALUABLE INFORMATION TO HELP PARTICIPANTS AND OTHER PEOPLE IN SIMILAR SITUATION.

8. RESEARCH PERIOD

- (a) **When will the research commence:** AS SOON AS ETHICAL CLEARANCE IS OBTAINED FROM THE UNIVERSITY RESEARCH ETHICS COMMITTEE
- (b) **Over what approximate time period will the research be conducted:** TWO TO THREE WEEKS

9. GENERAL

9.1 Has permission of relevant authority been obtained?

YES	√
NO	

(PERMISSION LETTER ATTACHED TO APPLICATION)

9.1.1 If yes, state name of authority:

THE MANAGEMENT OF COFIMVABA HOSPITAL, COFIMVABA

9.2 Confidentiality: How will confidentiality be maintained to ensure that participants/subjects/patients/controls are not identifiable to persons not involved in the research: .THE NAMES OF PARTICIPANTS WILL NEITHER BE WRITTEN ON THE QUESTIONNAIRES NOR THE CONSENT FORM IN ORDER TO MAINTAIN ANONYMITY OF THE PARTICIPANTS. INSTEAD, EACH PARTICIPANT WILL BE ALLOTTED STUDY IDENTIFICATION NUMBER. DATA COLLECTED WILL BE KEPT SECRET AND SAFE ALL THE TIME.

9.3 Results: To whom will results be made available, and how will the findings be reported to the research participants? THE RESULTS WILL BE MADE AVAILABLE TO THE AFRICAN CENTRE FOR HIV/AIDS MANGEMENTS. THE RESEARCH PARTICIPANTS WILL BE ASKED TO CHECK FOR THE FINDINGS OF THE STUDY AT THE ANTIRETROVIRAL UNIT OF THE HOSPITAL FROM APRIL 2012

9.4 There will be financial costs to:

participant/subject	
institution	
Other (please specify) researcher_____	√

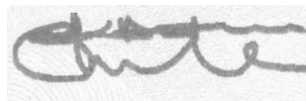
9.4.1 Explain any box marked YES:

THE RESEARCHER WILL BE FUNDDING THE RESEARCH FROM HIS INCOME EARNINGS.

9.5 Research proposal/protocol attached:

YES	√
NO	

9.6 Any other information which may be of value to the Committee should be provided here:



05/09/2011

Date:

Applicant`s signature

Who will supervise the project?

Name: DR. THOZAMILE QUBUDA

Programme/Institution/Department:

AFRICAN CENTRE FOR HIV/AIDS MANAGEMENT

-

Date: _____ **Signature:** _____

Director/Head/Research Coordinator of Department/Institute in which study is conducted:

I declare that this research proposal has been approved by the relevant Department or Faculty and that it complies with acceptable scientific research standards.

Name: _____

Date: _____ **Signature:** _____



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CONSENT TO PARTICIPATE IN RESEARCH

Title: Factors Influencing Choice of Contraceptive Methods amongst HIV Positive Women in the Cofimvaba Area

You are asked to participate in a research study conducted by *Dr. O.K Oluwole, M.B.CH.B (Ile-Ife) PDM (Stellenbosch)*, from the African Centre for HIV/AIDS Management at Stellenbosch University. The results of the study will be contributed to a research thesis for the Award of a Masters of Philosophy Degree in HIV/AIDS Management. You were selected as a possible participant in this study because you fall into the study population and could provide valuable information that may contribute to the achievement of the purpose and significance of the study.

1. PURPOSE OF THE STUDY

The aim of this study is to identify the various underlying factors that influence the choice of contraceptive methods by PLHIV women in the Cofimvaba community area.

2. PROCEDURES

You will be required to respond to a questionnaire which consists of certain number of closed-ended questions (about 35) and opened ended questions (about 5) written in English language. The questionnaire will be self-administered or via interpretation by a delegated trustworthy Xhosa-speaking nurse. It may take 30minutes of your time to complete the questionnaire. Your bio data may also be obtained from your hospital folder records, clinic card and (or) maternity case record where necessary.

3. POTENTIAL RISKS AND DISCOMFORTS

The risks for this study are minimal except that it may cause discomfort by provoking some emotional or psychological reaction depending on whether you have accepted your HIV

positive status or if the circumstances to be blamed for your status are related to any questions being asked in the questionnaire. We will like to deal with this minor discomfort by reassuring you that the essence of the study is not to be judgemental. Neither is it an attempt to probe unnecessarily into your privacy but to bring out issues that could be used as valuable information to help participants and other people in similar situation. We have put everything in place to ensure that such information is kept strictly confidential and only for the purpose of this study. You are welcomed to seek further counselling with the researcher if you encounter any discomfort.

4. POTENTIAL BENEFITS TO SUBJECTS AND/OR TO SOCIETY

The potential benefits of this study to you are that it may help you to adopt a better approach to the planning of your reproductive life and also help you make healthier choices in the management of your HIV condition. The benefits of this study to the society is that it may help in better approach to HIV prevention and family planning services by healthcare practitioners and HIV/AIDS programme managers, reduce the risk of HIV positive women getting re-infected with more viral load, reduce the risk of HIV positive women infecting to both knowing and unknowing sero-discordant sexual partners, and in the long term reduce the incidence and prevalence of HIV in this area

5. PAYMENT FOR PARTICIPATION

Participation in this study is voluntary. No payment will be made for participation in the study but refreshments may be provided for the inconveniences.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with you will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained in this way: The names of participants will neither be written on the questionnaires nor the consent to maintain anonymity of the participants. Instead, each participant will be allotted study identification number. Data collected will be kept secret and safe all the time with the researcher. The information might also be inspected by the University of Stellenbosch, Human Research Ethics Committee. The records will only be utilized by them in carrying out their obligations relating to this study.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether to be in this study or not. If you volunteer to be in this study, you may withdraw at any time without consequences of any kind. You may also refuse to answer any questions you don't want to answer and still remain in the study. The investigator may withdraw you from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, please feel free to contact: The researcher, Dr. O.K. Oluwole at Cofimvaba Hospital on 0835247047 OR my supervisor Dr. Thozì Qubuda at African Centre for HIV/AIDS Management on 021-8083002.

9. RIGHTS OF RESEARCH SUBJECTS

You may withdraw your consent at any time and discontinue participation without penalty. You are not waiving any legal claims, rights or remedies because of your participation in this research study. If you have questions regarding your rights as a research subject, contact Ms Maléne Fouché [mfouche@sun.ac.za; 021 808 4622] at the Division for Research Development.

SIGNATURE OF RESEARCH SUBJECT

The information above was described to me _____ by Oladotun Oluwole in English and I am in command of this language or it was satisfactorily translated to me in Xhosa Language by _____. I was given the opportunity to ask questions and these questions were answered to my satisfaction.

I hereby consent voluntarily in this study. I have been given a copy of this form.

Initials of Subject/Participant

Signature of Subject/Participant

Date

SIGNATURE OF INVESTIGATOR

I declare that I explained the information given in this document to _____
and/or her representative _____. She was encouraged and given ample
time to ask me any questions. This conversation was conducted in English and no translator
was used or this conversation was translated into Xhosa by _____.



Signature of Researcher

Date



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STELLENBOSCH UNIVERSITY

CONSENT TO PARTICIPATE IN RESEARCH (FOR LEGAL REPRESENTATIVE)

Title: Factors Influencing Choice of Contraceptive Methods amongst HIV Positive Women in the Cofimvaba Area

Your daughter/ward is being asked to participate in a research study conducted by *Dr. O.K Oluwole, M.B.CH.B (Ile-Ife) PDM (Stellenbosch)*, from the African Centre for HIV/AIDS Management at Stellenbosch University. The results of the study will be contributed to a research thesis for the Award of a Masters of Philosophy Degree in HIV/AIDS Management. She was selected as a possible participant in this study because she falls into the study population and could provide valuable information that may contribute to the achievement of the purpose and significance of the study.

1. PURPOSE OF THE STUDY

The aim of this study is to identify the various underlying factors that influence the choice of contraceptive methods by PLHIV women in the Cofimvaba area.

2. PROCEDURES

Your daughter or ward will be required to respond to a questionnaire which consists of certain number of closed-ended questions (about 35) and opened ended questions (about 5) written in English language. The questionnaire will be self-administered or via interpretation by a delegated trustworthy Xhosa-speaking nurse. It may take 30 minutes of her time to complete the questionnaire. Her bio data may also be obtained from her hospital folder records, clinic card and (or) maternity case record where necessary.

3. POTENTIAL RISKS AND DISCOMFORTS

The risks for this study are minimal except that it may cause discomfort by provoking some

emotional or psychological reaction depending on whether you have accepted your HIV positive status or if the circumstances to be blamed for your status are related to any questions being asked in the questionnaire. We will like to deal with this minor discomfort by reassuring you that the essence of the study is not to be judgemental. Neither is it an attempt to probe unnecessarily into your privacy but to bring out issues that could be used as valuable information to help participants and other people in similar situation. We have put everything in place to ensure that such information is kept strictly confidential and only for the purpose of this study. You are welcome to seek further counselling with the researcher if you encounter any discomfort.

4. POTENTIAL BENEFITS TO SUBJECTS AND/OR TO SOCIETY

The potential benefits of this study to your daughter/ward are that it may help her to plan her reproductive life better and also help her to address her overall health better. The benefits of the study to the society is that it will help in better approach to HIV prevention and family planning services, reduce the risk of HIV positive women getting re-infected with more viral load, reduce the risk of HIV positive women infecting to both knowing and unknowing sero-discordant sexual partners, and reduce the risk of vertical transmission of HIV to children, reduce infant mortality rates from HIV/AIDS, and in the long term reduce the incidence and prevalence of HIV in this area

5. PAYMENT FOR PARTICIPATION

Participation in this study is voluntary. No payment will be made for participation in the study but refreshments may be provided for the inconveniences.

6. CONFIDENTIALITY

Any information that is obtained in connection with this study and that can be identified with your daughter/ward will remain confidential and will be disclosed only with your permission or as required by law. Confidentiality will be maintained in this way: The names of participants will neither be written on the questionnaires nor the consent to maintain anonymity of the participants. Instead, each participant will be allotted study identification number. Data collected will be kept secret and safe all the time with the researcher.

The information might also be inspected by the University of Stellenbosch, Human Research Ethics Committee. The records will only be utilized by them in carrying out their obligations relating to this study.

7. PARTICIPATION AND WITHDRAWAL

You can choose whether your daughter/ward should be in this study or not. If you volunteer her to be in this study, you may withdraw her at any time without consequences of any kind. She may also refuse to answer any questions she does not want to answer and still remain in the study. The investigator may withdraw your daughter/ward from this research if circumstances arise which warrant doing so.

8. IDENTIFICATION OF INVESTIGATORS

If you have any questions or concerns about the research, please feel free to contact: The researcher, Dr. O.K. Oluwole at Cofimvaba Hospital on 0835247047 OR my supervisor Dr. Thozì Qubuda at African Centre for HIV/AIDS Management on 021-8083002.

9. RIGHTS OF RESEARCH SUBJECTS

You may withdraw your consent at any time and discontinue your ward's/daughter's participation without penalty. You are not waiving any legal claims, rights or remedies because of your ward or daughter's participation in this research study.

If you have questions regarding your rights as a research subject, contact Ms. Maléne Fouché [mfouche@sun.ac.za; 021 808 4622] at the Division for Research Development.

SIGNATURE OF RESEARCH SUBJECT'S LEGAL REPRESENTATIVE

The information above was described to my daughter/ward and me _____ by Oladotun Oluwole in English and I am in command of this language or it was satisfactorily translated to me in Xhosa Language by _____. I and my daughter/ward were given the opportunity to ask questions and these questions were answered to our satisfaction.

I hereby consent voluntarily that my daughter/ward (name of participant) _____ may participate in this study. I have been given a copy of this form.

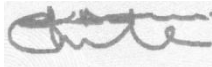
Name of legal representative

Signature of Legal representative

Date

SIGNATURE OF INVESTIGATOR

I declare that I explained the information given in this document to _____
and her representative _____. They were encouraged and given ample time
to ask me any questions. This conversation was conducted in English and no translator was
used or this conversation was translated into Xhosa by _____.



Signature of Researcher

Date



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AFRICAN CENTRE FOR HIV/AIDS MANAGEMENT

RESEARCH QUESTIONNAIRE

RESEARCH TITLE: FACTORS INFLUENCING THE CHOICE OF CONTRACEPTIVE METHODS AMONGST HIV POSITIVE WOMEN IN THE COFIMVABA AREA

RESEARCHER: DR. O.K OLUWOLE STUDENT NUMBER: 15933598

INSTRUCTIONS: Thank you for taking your time to consent and participate in the response to the questionnaire of this study. The questionnaire may take you about 30 minutes to complete. This questionnaire has four sections. The first section asks for your Bio data and General Information while the last three sections test your knowledge, attitude or perception and behaviour on choice of contraceptive methods. Majority of the questionnaires are closed ended questions where your responses are either Yes, No and Don't Know. Mark X or \surd in the boxes provided. You are expected to make your response to the open ended questions as simple as possible. Ask for any explanation from the researcher or the delegated interpreter on any of the questions.

SECTION A BIODATA AND GENERAL INFORMATION

(1) Age:

(2) Marital status:

Never married	
Married	
Divorced/Separated	
Widowed	

(3)Employment status:

Employed	
Unemployed	
Never Worked	
Schooling	

(4)If unemployed, what is your financial means of living?

(5)Average house hold monthly income

<R500	
R501-R1000	
R1001-R1500	
R1501-R2000	
>R2000	

(6)Number of sexual partners in the last 1 year: _____

(7) Are you using ARVs or HAART currently?

Yes	
No	

(8)Parity

a. Number of Living Children: _____

b. Number of Dead Children: _____

SECTION B TEST OF KNOWLEDGE

1. In what ways is HIV transmitted?

	Yes	No	Don't know
(a)Unprotected sex with infected person			
(b)Transfusion with infected blood			
(c)Pregnant mother to unborn child			
(d) Sharing sharp objects with infected person			
(e)Kissing infected person			
(f)Hugging or touching infected person			
(g)Using the same toilet with infected person			

2. How can HIV infection or transmission be prevented?

	Yes	No	Don't Know
(a)Abstinence from sex			
(b)Using condoms always			
(c)Using condom sometimes			
(d)Using oral contraceptive pills			
(e)Using family planning injection			
f)Being faithful to one sexual partner			
(g)Use of ARV's by pregnant mothers			

3. Mention every contraceptive or family planning methods that you know or aware of:

4. Which family planning methods can prevent pregnancy, HIV infection and other Sexually Transmitted Infections? _____

5. Which of the following is the preferred family planning method for sexually active HIV positive women?

	Yes	No	Don't Know
(a)Using condoms only			

(b)Using family planning injection only			
(c)Using IUCD's or loops only			
(d)Using family planning pills only			
(e) Tying or Cutting the fallopian tubes by surgical operation			
(f)Using Skin Implants only			
(g)Using condoms in combination with any other above			

6. Do you know that an HIV positive women health condition could get worse if she continues having unprotected sex with an infected partner?

Yes	No	Don't Know

7. Do you know that early beginning of the use ARVs and good compliance with the medications may greatly reduce the risk of a pregnant mother from infecting her unborn baby?

Yes	No	Don't Know

8. Have you ever been counselled by health professionals on dual protection (Condom combined with another method) as a method of choice for contraception for HIV positive women?

Yes	No	Don't Know

9. Which of the following factors do you know may influence or affect the choice of contraceptive method by HIV positive women?

	Yes	No	Don't Know
(a)Pregnancy desires or intentions?			
(b)Counselling by health professionals?			
(c)General states of health (feels sick or feel healthy?			
(d)Family, social and (or) cultural pressure			
(e) Pressure from male partner?			
(f)Disclosure or non-disclosure of HIV status to partner?			
(g) HIV status of partner (positive or negative?)			
(h) Use or non-use of HAART or ARV's pills			
(j)Fear of stigmatisation by health professionals?			
(i) Fear of stigmatisation by family or friends?			
(k)Side effects of the contraceptives method			
(l) Being employed or unemployed?			
(m)Financial needs for child support grant?			
(n)Access to or availability of the contraceptives methods at your nearest clinic /health centre?			

SECTION C TEST OF ATTITUDE AND PERCEPTION

1. Looking at the circumstances around you, which contraceptive method(s) do you feel is/are suited for you?

2. Do you think or feel that pregnancy desires or intentions may influence your choice of contraceptive method?

Yes	No	Don't Know

3. Do you think or feel your general state of health (being sick or healthy) could affect your choice of contraceptive method?

Yes	No	Don't Know

4. Do you think or feel that family; social or cultural pressure that a woman must have children would affect your choice of contraceptive method?

Yes	No	Don't Know

5. Do you think or feel that health workers counselling can influence your choice of contraceptive methods?

Yes	No	Don't Know

6. Do you think or feel that health workers attitudes and approach to family planning counselling can influence or affect your choice of contraceptive method?

Yes	No	Don't Know

7. Do you think the type of contraceptive methods available at your nearest clinics or health centres affects your choice of contraceptive method?

Yes	No	Don't Know

8. Do you think or feel your male partner may influence your choice of contraceptive method?

Yes	No	Don't Know

9. Do you think or feel whether or not disclosing your HIV status to your partner could affect your choice of contraceptive method?

Yes	No	Don't Know

10. Do you think the HIV status of your partner (either positive or negative) will affect your choice of contraceptive method?

Yes	No	Don't Know

11. Do you think the fear of stigmatisation or discrimination by family or friends could affect your choice of family planning method?

Yes	No	Don't Know

12. Have you ever perceived anything in health workers attitude during counselling that suggest HIV positive women must not bear children?

Yes	No	Don't Know

13. Do you think/ feel the side effects of contraceptive methods could affect your choice of family planning methods?

Yes	No	Don't Know

14. Mention any side effects you have felt with any contraceptive that might have used before _____

15. Do you think or feel the fear of being stigmatised by your partner may affect your demand for condom use?

Yes	No	Don't Know

SECTION D

TEST OF PRACTICE/BEHAVIOUR

1. What contraceptive method(s) are you using now?

2. What are the reasons for your choice? _____

3. Do you use the method consistently, or all the time?

Yes	No

4. If your response to 3 above is No, please tell us why?

5. Have you disclosed your status to your partner?

Yes	No

6. Have you made your partner to get tested for HIV?

Yes	No

7. Can you insist on condom use by your partner?

Yes	No

8. Do you have plans to have more children?

Yes	No

9. If yes is the response to last question, does this affect your choice of contraceptive method?

Yes	No

10. If yes is the response to question 8, does the benefit of getting a child support grant has anything to do with future pregnancy desires?

Yes	No

11. If the government decides to give tangible money as Basic Income Grant monthly for all unemployed people instead of child support grants, will it change your choice of contraceptive method?

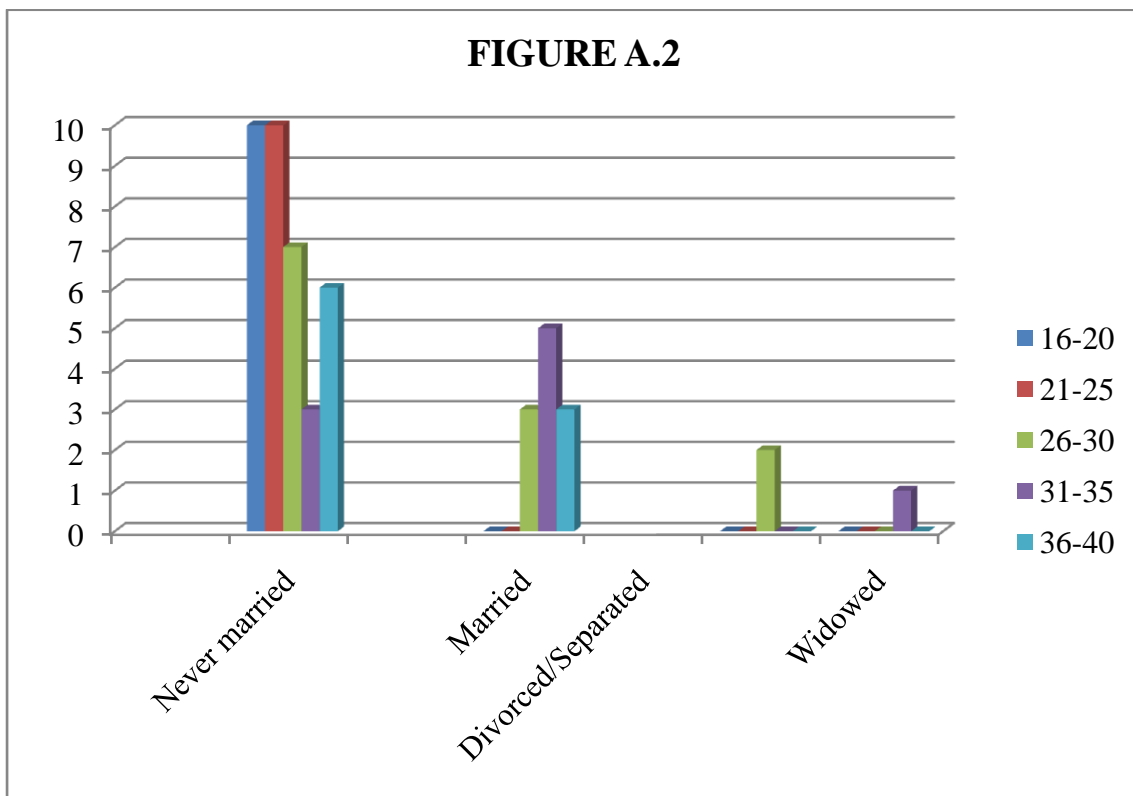
Yes	No	Don't Know

TABLES AND CHARTS

2. Marital Status

TABLE A.2

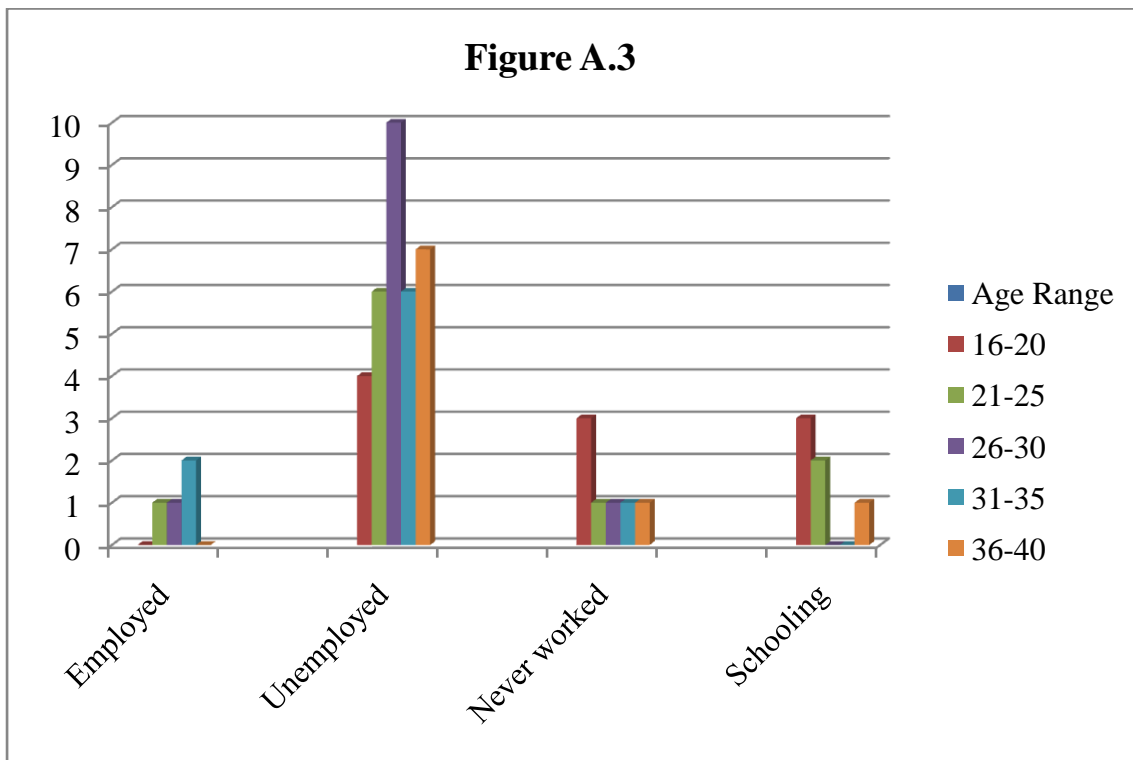
Age Range	Never married	Married	Divorced/Separate	Widowed	Total (n)
16-20	10	0	0	0	10
21-25	10	0	0	0	10
26-30	7	3	2	0	12
31-35	3	5	0	1	9
36-40	6	3	0	0	9
Total	36	11	2	1	50
%	72	22	4	2	100



3. Employment Status

Table A.3

		Employed	Unemployed	Never worked	Schooling	Total (n)
Age Range						
16-20		0	4	3	3	
21-25		1	6	1	2	
26-30		1	10	1	0	
31-35		2	6	1	0	
36-40		0	7	1	1	
	Total	4	33	7	6	50
	%	8	66	14	12	100

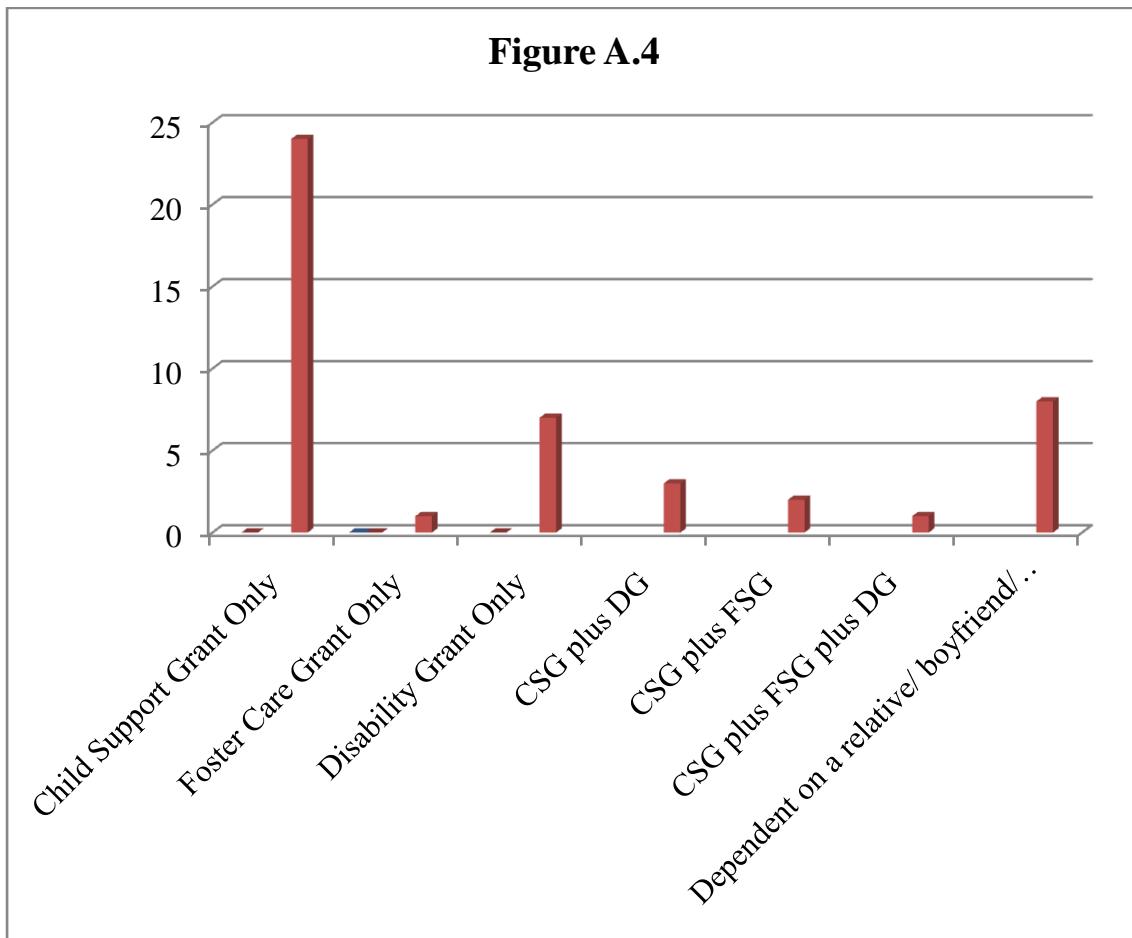


4. Financial means of living for the unemployed/ never worked/schooling

Table A.4

Group	Value (n)	Score(%)
Child Support Grant (CSG) only	24	52
Foster Care Grant (FSG)Only	1	2.2
Disability Grant Only (DG)	7	15.2
CSG plus DG	3	6.6
CSG plus FSG	2	4.4
CSG plus FSG plus DG	1	2.2
Dependent on a relative/ boyfriend/ husband	8	17.4
Total	46	100

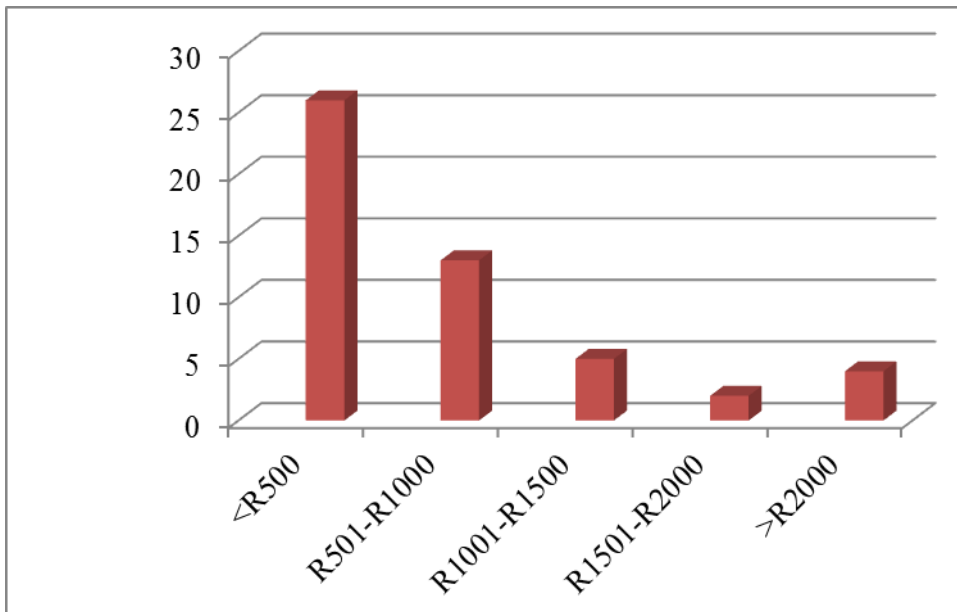
Figure A.4



No 5. Average household monthly income

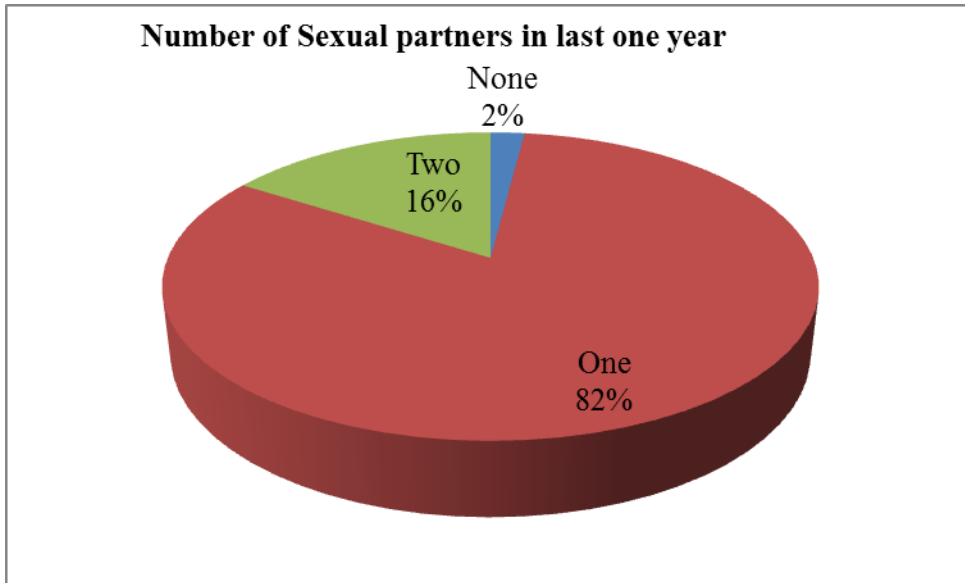
Table A.5			
Group		Value (n)	Score (%)
<R500		26	52
R501-R1000		13	26
R1001-R1500		5	10
R1501-R2000		2	4
>R2000		4	8
Total		50	100

Figure A.5



No. 6. Number of Sexual Partner(s) in last one year

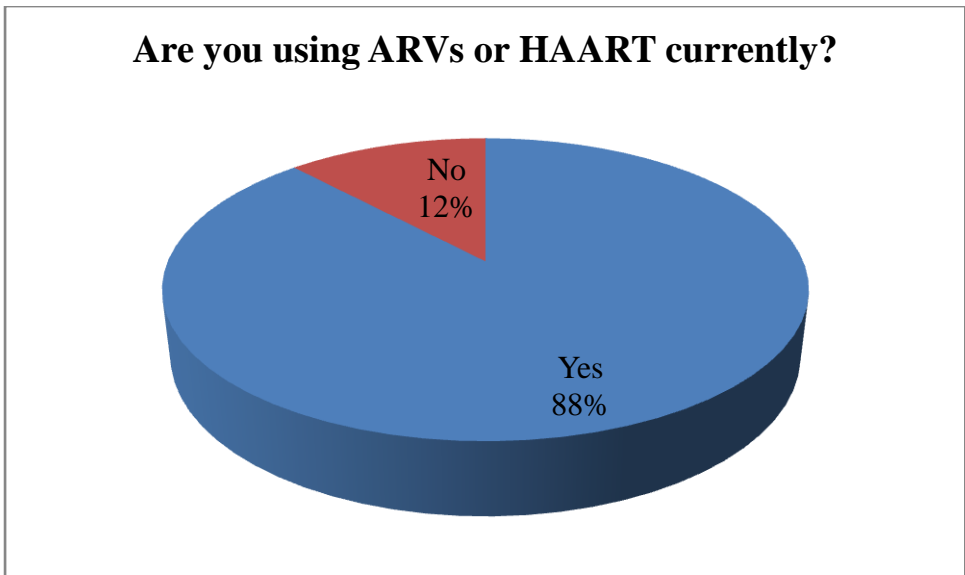
Table A.6			
Group		Value(n)	Score %
None		1	2
One		41	82
Two		8	16
Total		50	100



7a. Are you Using ARVs Or HAART currently?

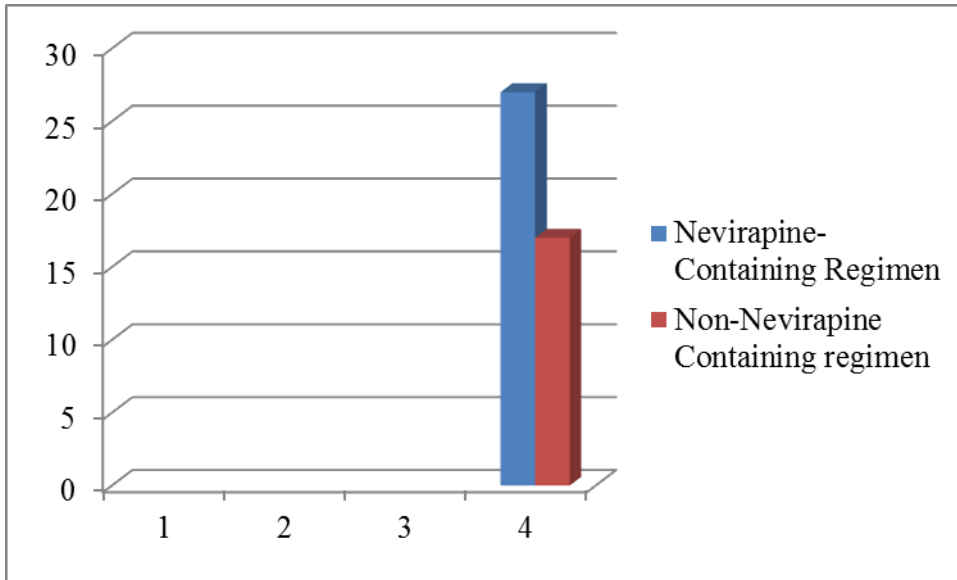
Table A.7a

Group	Value (n)	%
Yes	44	88
No	6	12
Total	50	100



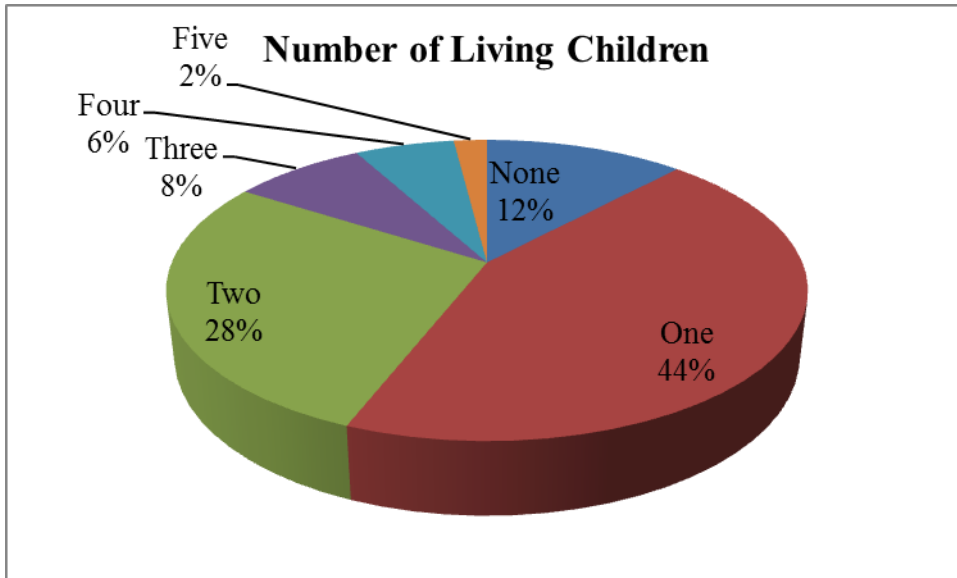
7b. Is Nevirapine Contained in respondent HAART Regimen?

Table A.7b		
Regimen	Value (n)	%
Nevirapine-Containing Regimen	27	61
Non-Nevirapine Containing regimen	17	39
Total	44	100



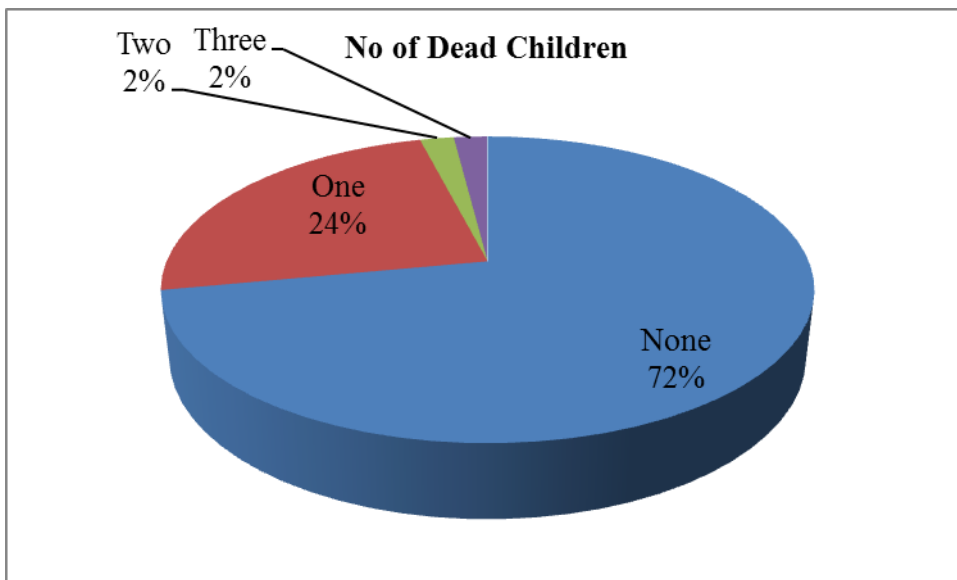
No 8a. Number of Living Children

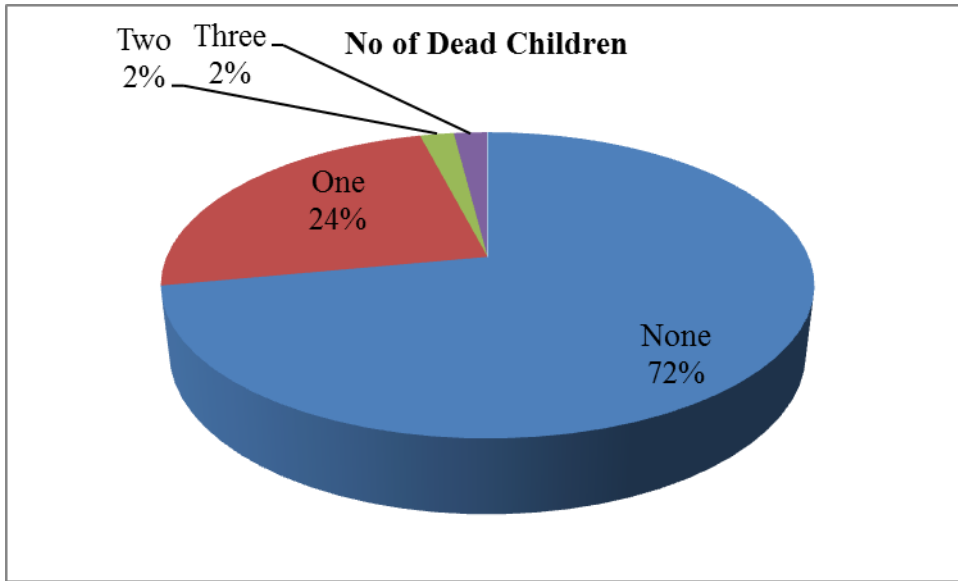
Figure A.8a		
Group	Value (n)	%
None	6	12
One	22	44
Two	14	28
Three	4	8
Four	3	6
Five	1	2
Total	50	100



No 8b. Number of dead children

Table A.8b		
Group	Value (n)	%
None	36	72
One	12	24
Two	1	2
Three	1	2
Total	50	100

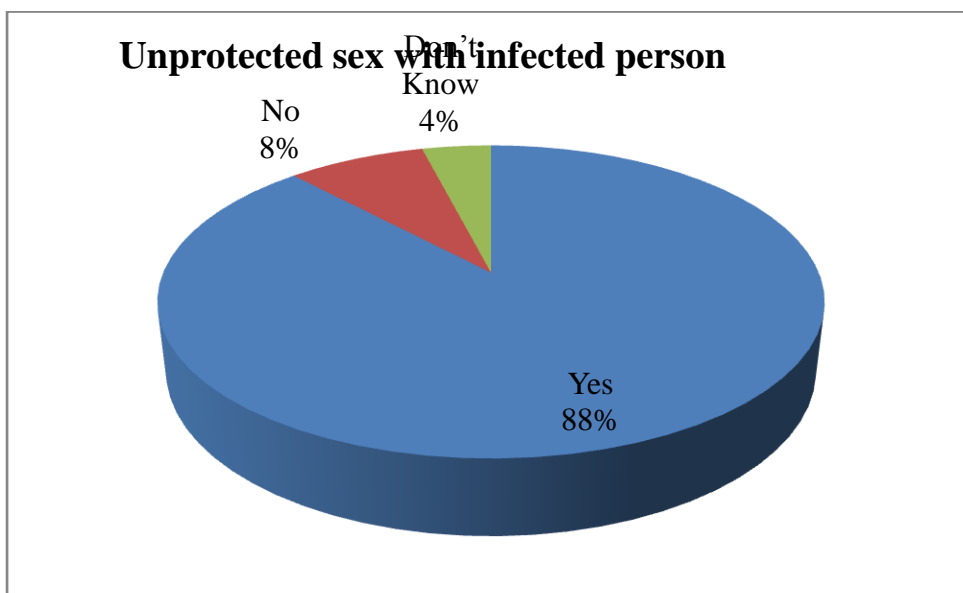
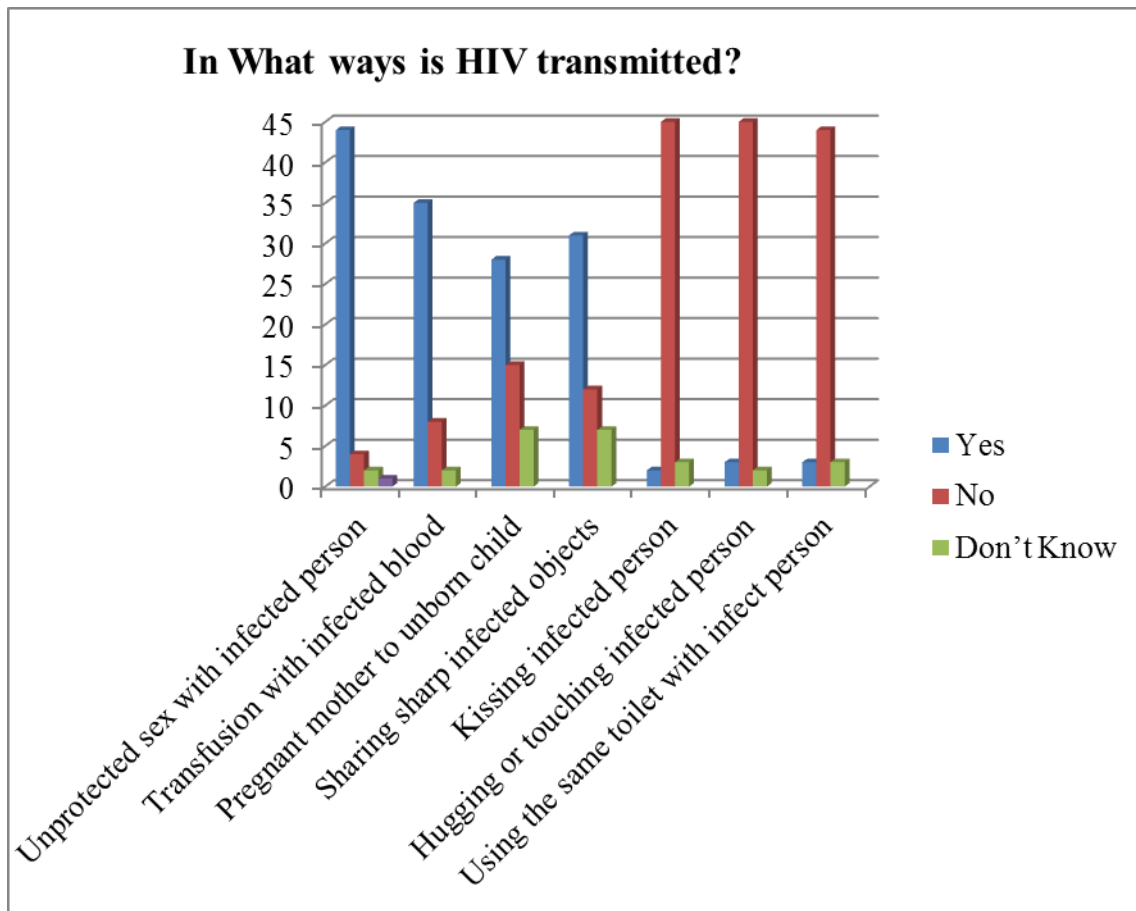


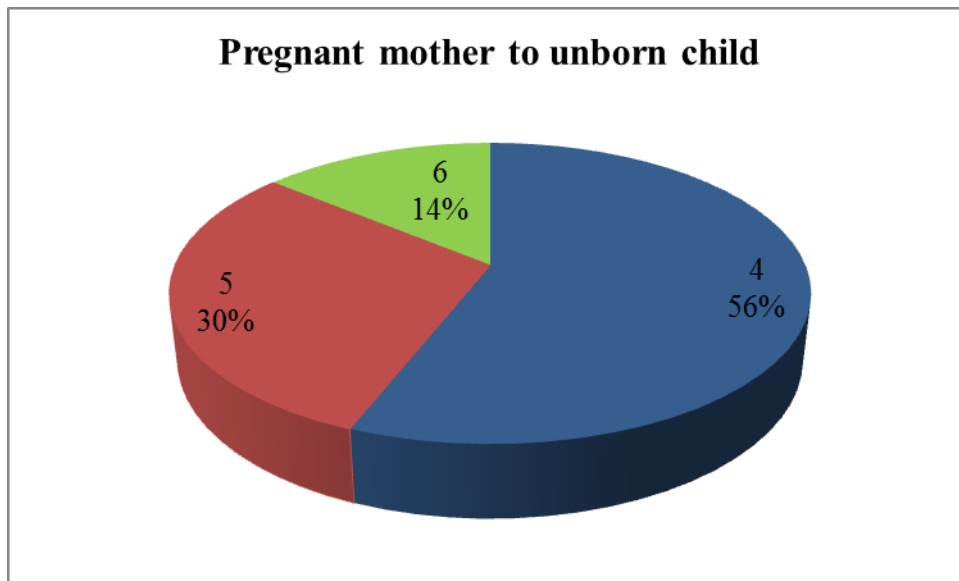


SECTION B DATA ANALYSIS

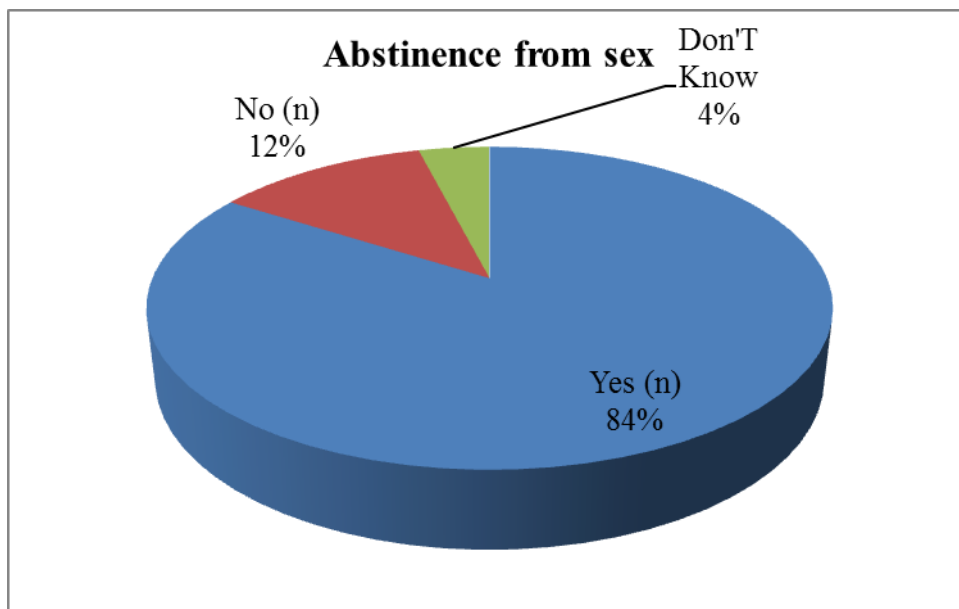
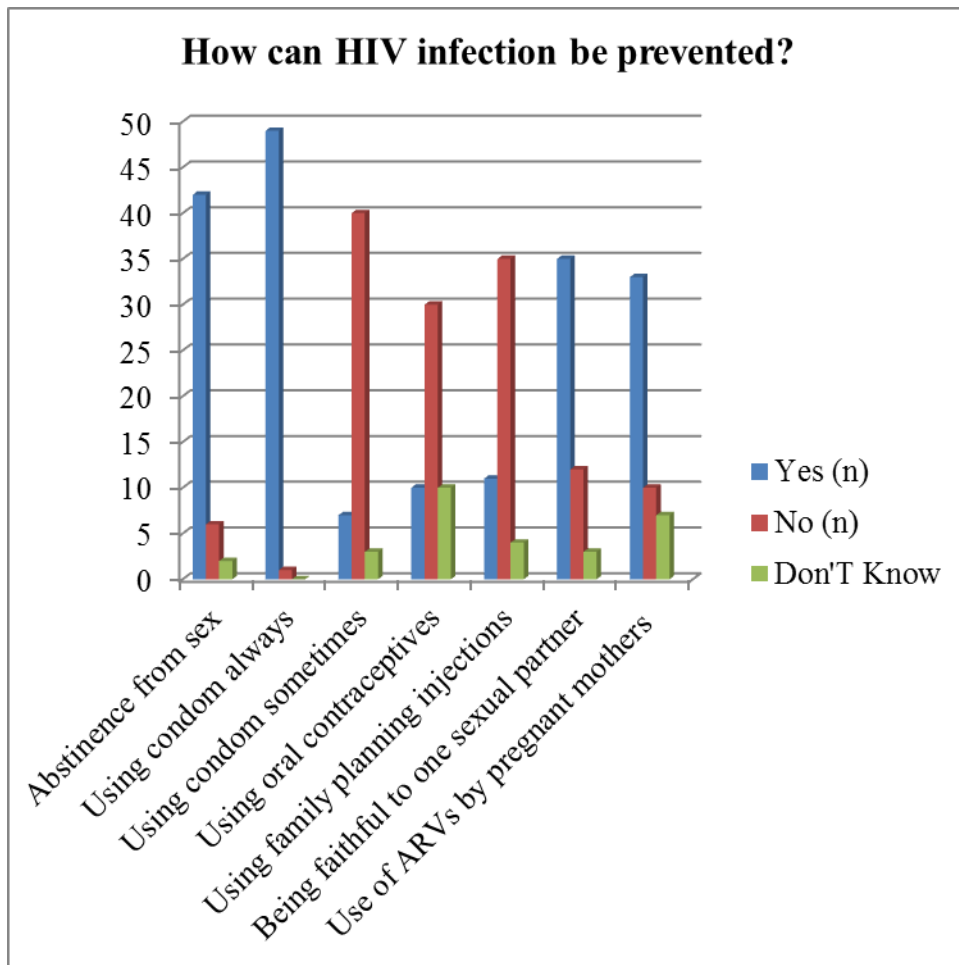
In what ways is HIV transmitted?
Table B.1

Group	Yes	No	Don't Know	%
Unprotected sex with infected person	44	4	2	88
Transfusion with infected blood	35	8	2	70
Pregnant mother to unborn child	28	15	7	56
Sharing sharp infected objects	31	12	7	62
Kissing infected person	2	45	3	90
Hugging or touching infected person	3	45	2	90
Using the same toilet with infect person	3	44	3	90
			Average	78

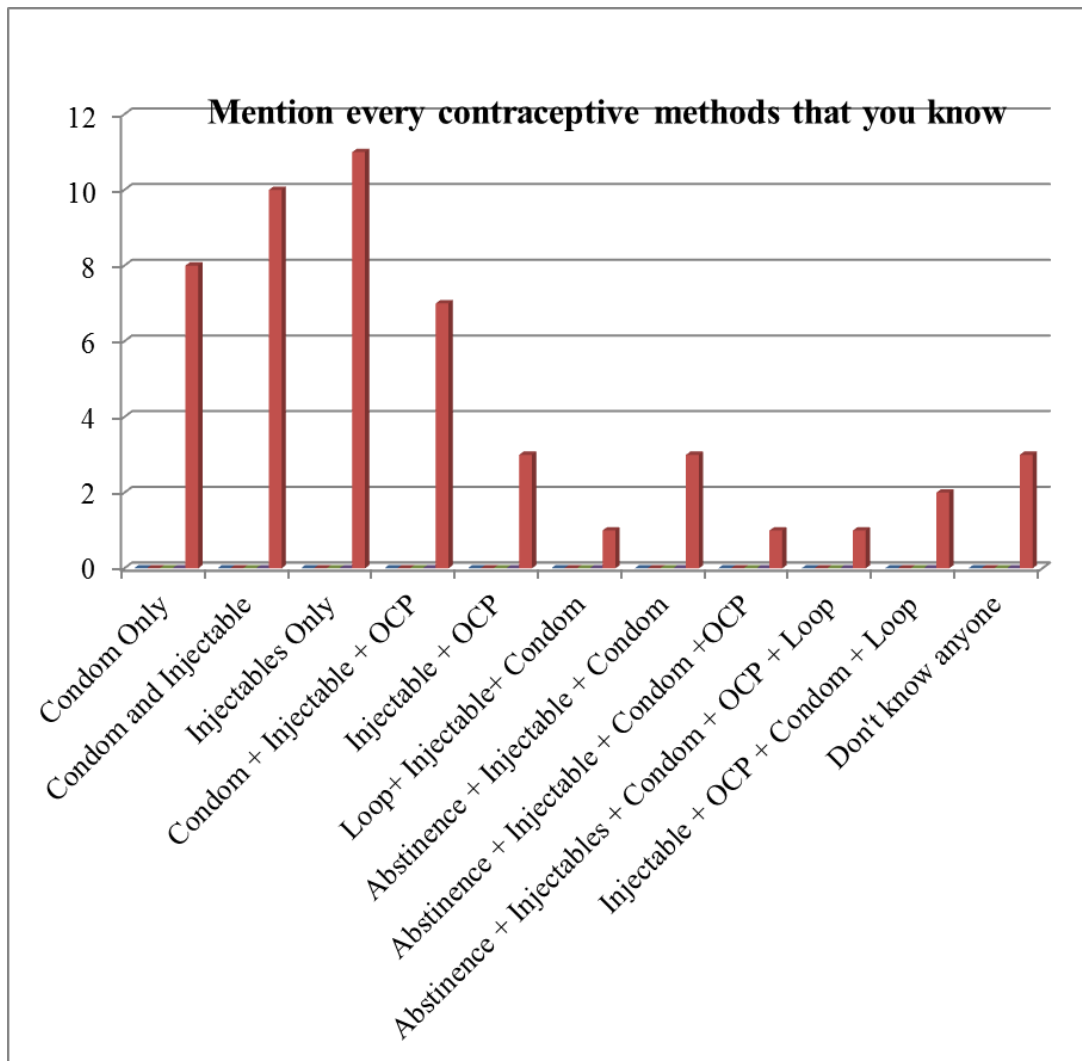




No 2. How can HIV infection be prevented?						
Table B.2						
	Yes (n)	No (n)	Don'T Know (n)	Knowledge score (%)		
Abstinence from sex	42	6	2	84		
Using condom always	49	1	0	98		
Using condom sometimes	7	40	3	80		
Using oral contraceptives	10	30	10	60		
Using family planning injections	11	35	4	70		
Being faithful to one sexual partner	35	12	3	70		
Use of ARVs by pregnant mothers	33	10	7	66		
			Average	75.4286		



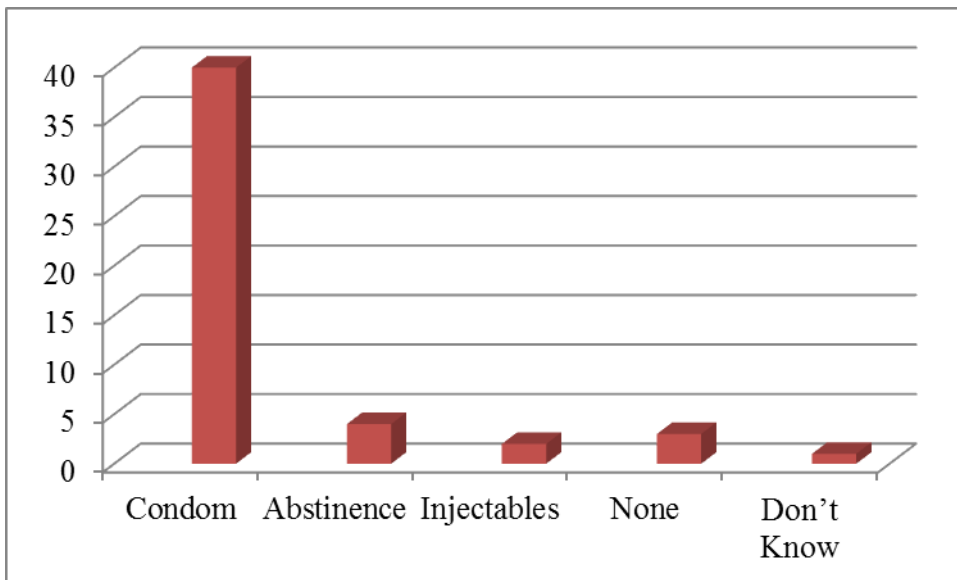
No 3. Mention every contraceptive methods that you know						
Table B.3						
Group					Value (n)	Score(%)
Condom Only					8	16
Condom and Injectable					10	20
Injectables Only					11	22
Condom + Injectable + OCP					7	14
Injectable + OCP					3	6
Loop+ Injectable+ Condom					1	2
Abstinence + Injectable + Condom					3	6
Abstinence + Injectable + Condom +OCP					1	2
Abstinence + Injectables + Condom + OCP + Loop					1	2
Injectable + OCP + Condom + Loop					2	4
Don't know anyone					3	6



Know at least about condom =	66%
Know at least about injectables =	76%
Know at least about OCP =	30%
Know at least about IUCD =	8%

No 4. Which family planning method can prevent pregnancy, HIV and sexually transmitted infections?

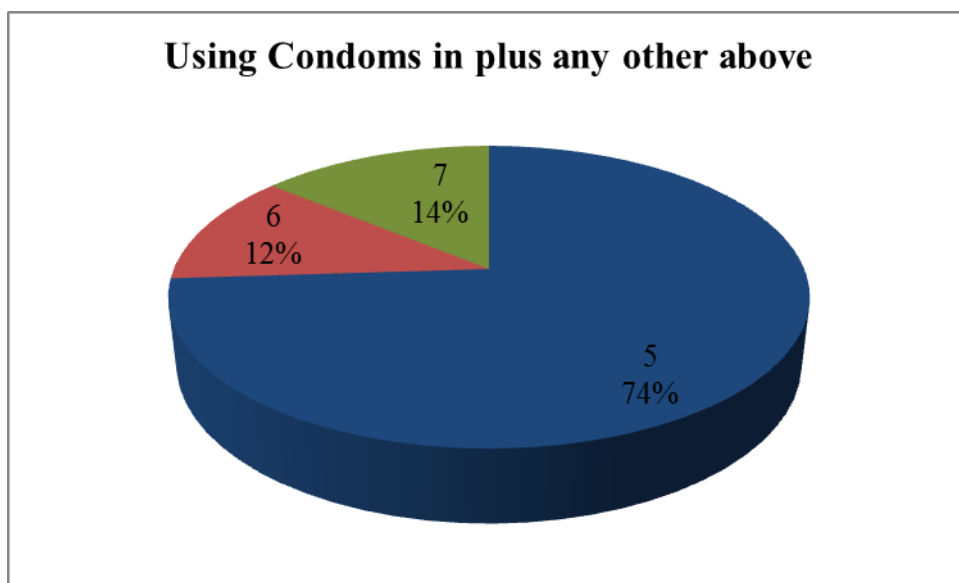
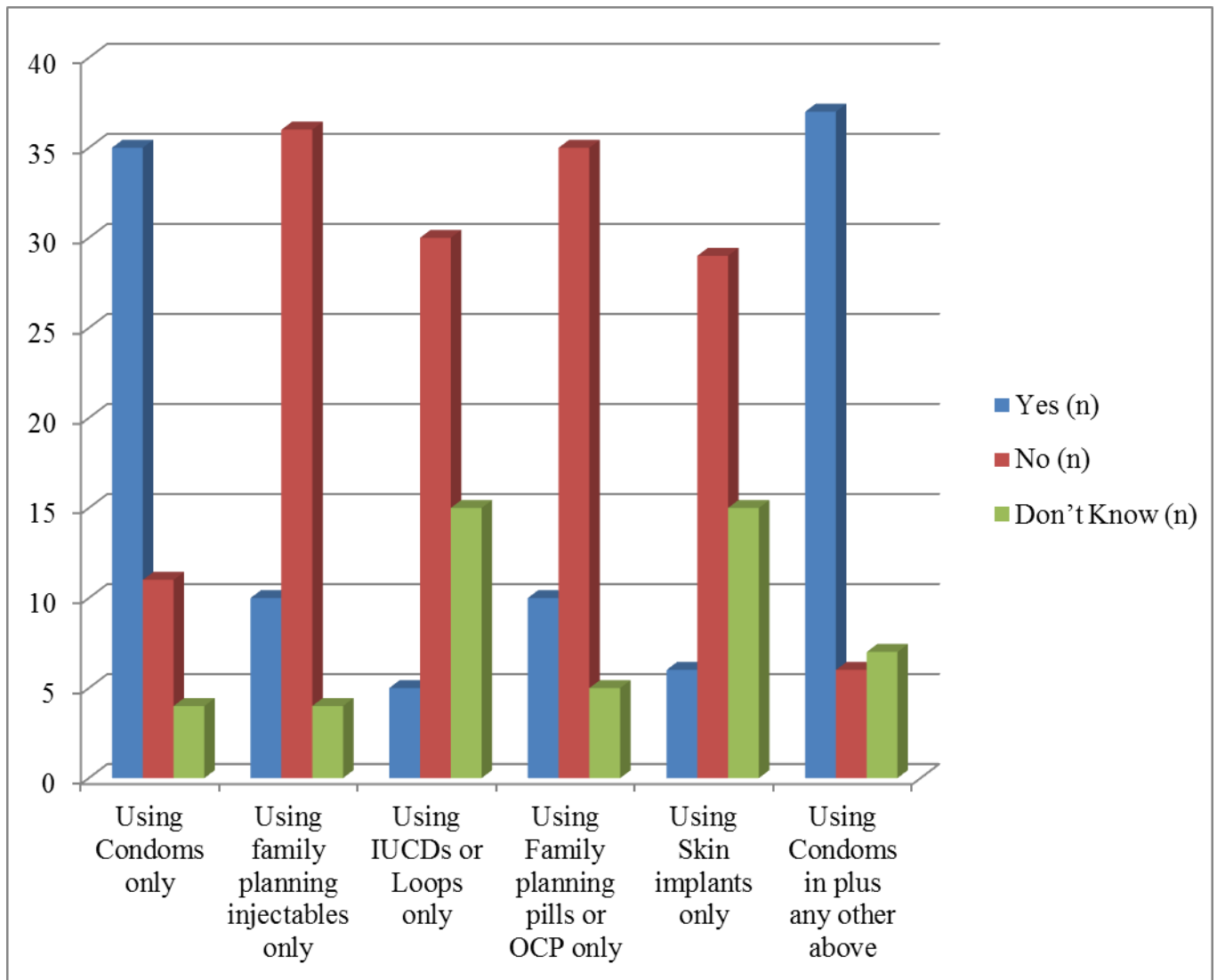
		Table B.4	
Group		Value (n)	%
Condom		40	80
Abstinence		4	8
Injectables		2	4
None		3	6
Don't Know		1	2
	Total	50	100



No 5. Which of the following is the preferred family planning method for sexually active HIV positive women?

				Figure B.5			
Group				Yes (n)	No (n)	Don't Know (n)	%
Using Condoms only				35	11	4	22
Using family planning injectables only				10	36	4	72
Using IUCDs or Loops only				5	30	15	60
Using Family planning pills or OCP only				10	35	5	70
Using Skin implants only				6	29	15	58
Using Condoms in plus any other above				37	6	7	74
						Average	59.3333

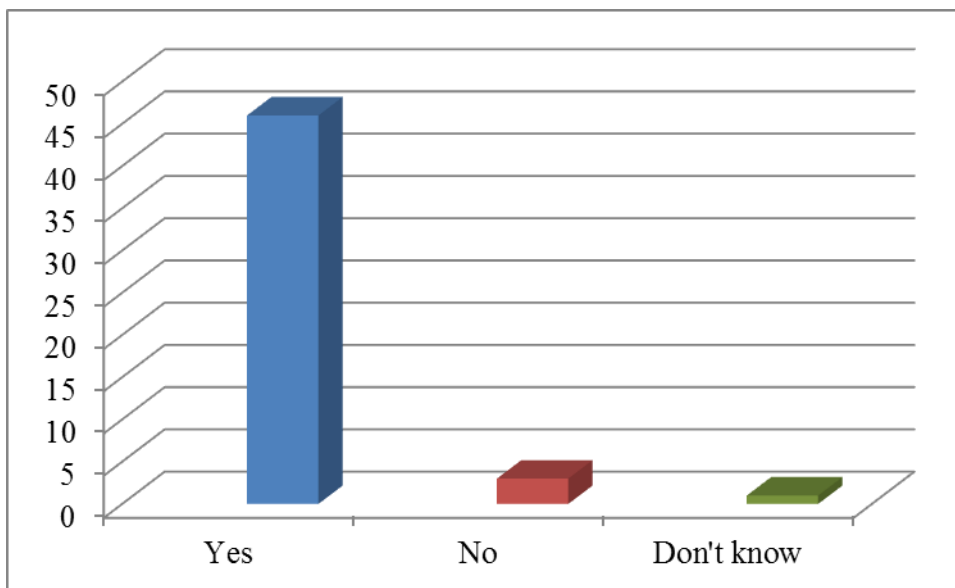
Figure B.5



No 6. Do you know that an HIV positive woman health condition could get worse if she continues having unprotected sex with an infected partner?

Table B.6			
Group	Value (n)	%	
Yes	46	92	Knowledge Score= 92%
No	3	6	
Don't know	1	2	
Total	50	100	

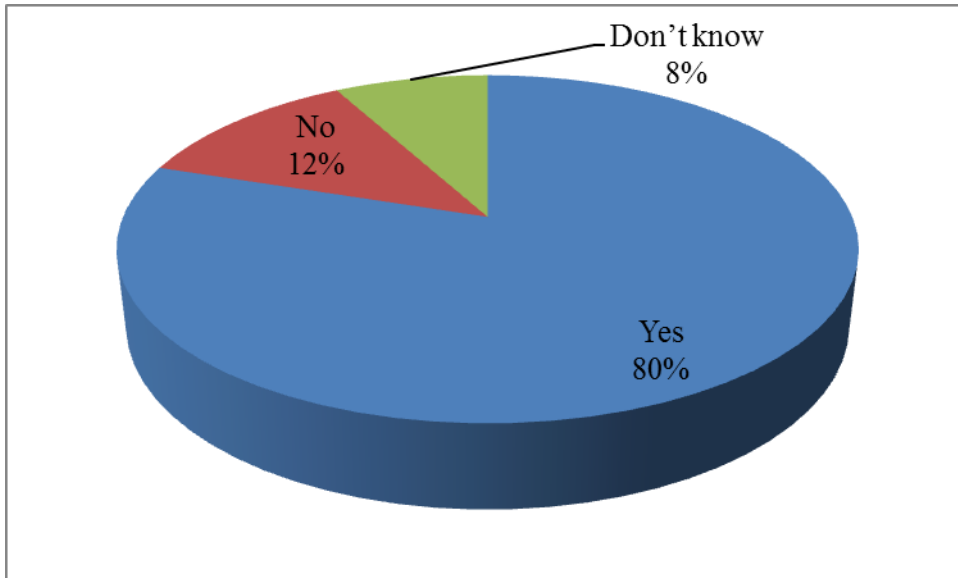
Figure B.6



No 7. Do you know that early beginning of the use of ARVs and good compliance with the medications may greatly reduce the risk of a pregnant mother from infecting her unborn baby with HIV?

Table B.7				
	Yes	No	Don't know	Total
Value (n)	40	6	4	50
%	80	12	8	100

Figure B.7

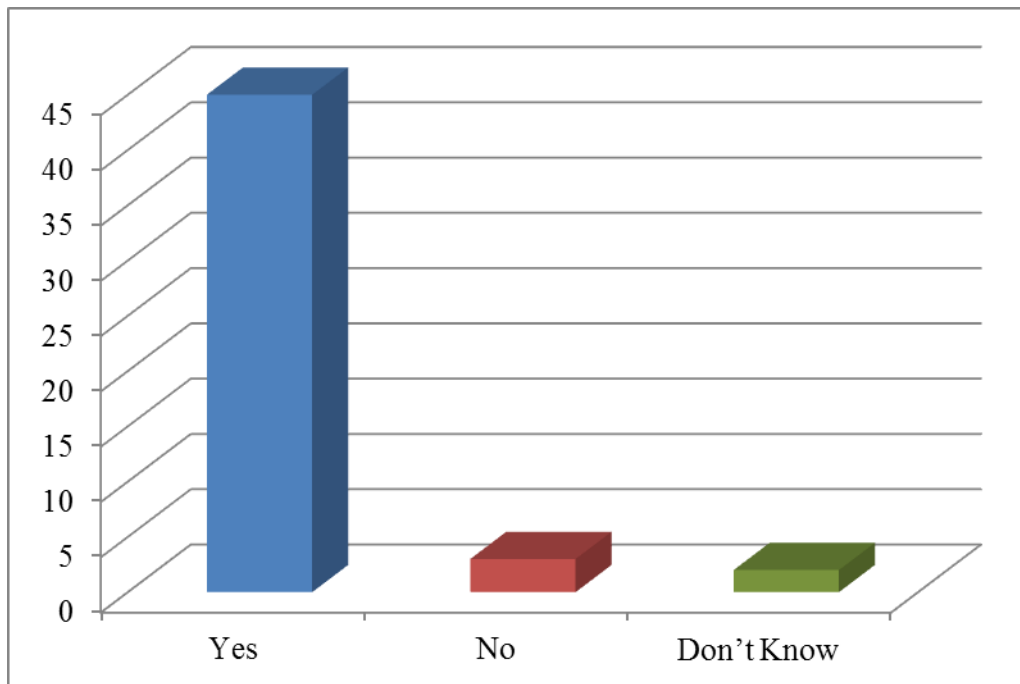
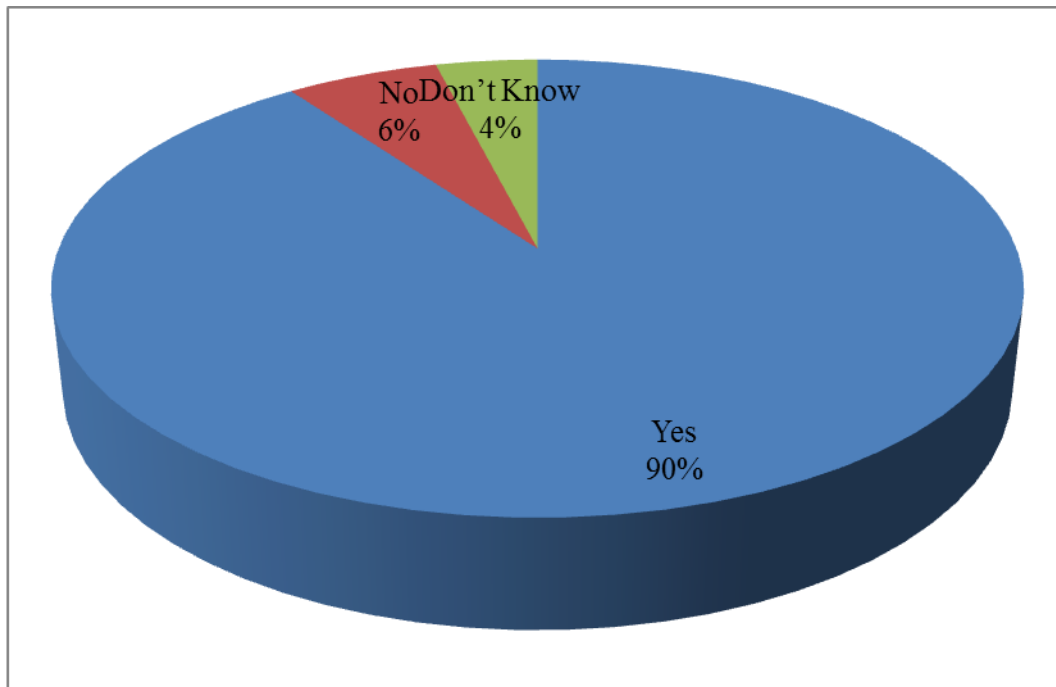


No 8. Have you ever been counselled by health professionals on dual protection (condom combined with another method) as a method of choice for contraception for HIV positive women?

Table B.8				
	Yes	No	Don't Know	Total
Value (n)	45	3	2	50
%	90	6	4	100

Knowledge Score (%) = 90%

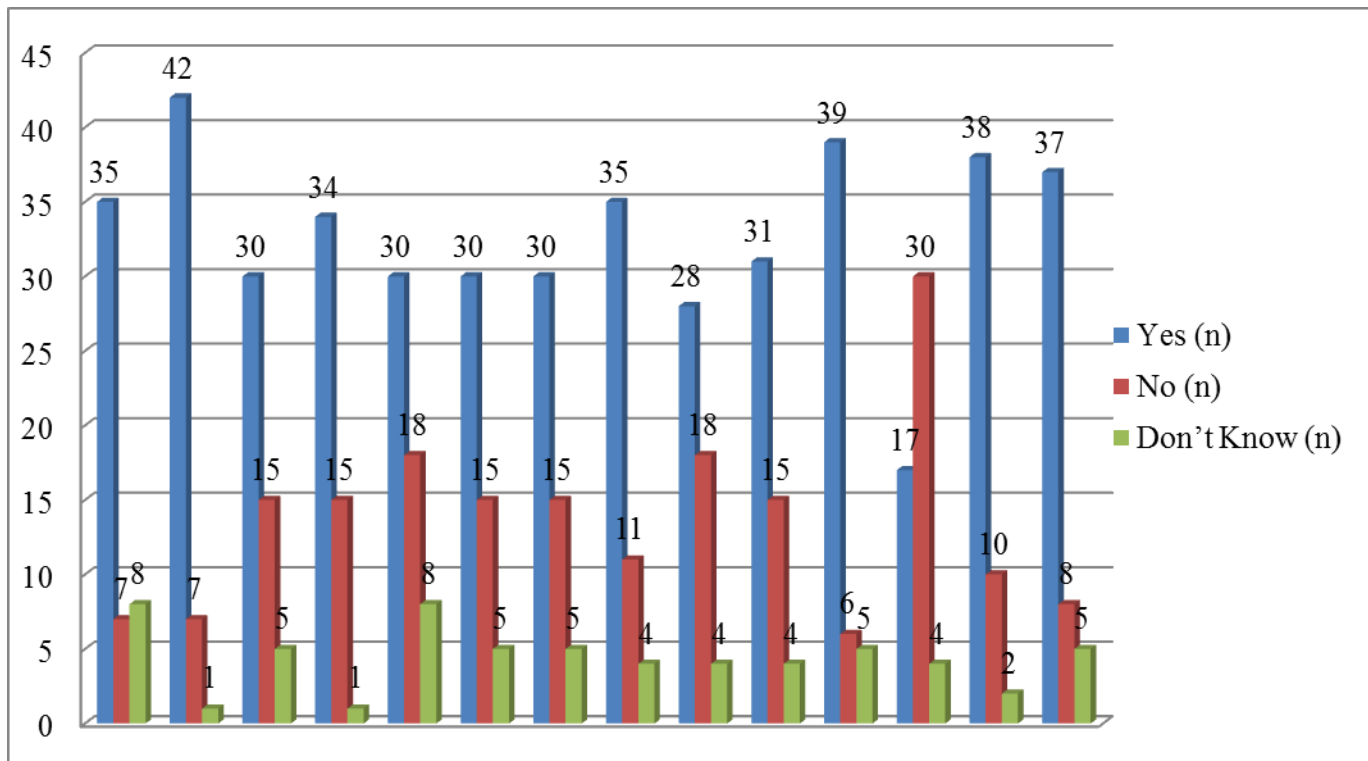
Figure B.8



No 9. Which of the following factors do you know may influence or affect the choice of contraceptive methods in HIV positive women?

Table B.9

Factors	Yes	No	Don't know	Knowledge score (%)
Pregnancy desires or intentions?	35	7	8	70
Counselling by health professionals?	42	7	1	84
General state of health (feeling sick or healthy)?	30	15	5	60
Family, social or cultural pressures?	34	15	1	68
Pressure from male partner?	30	18	8	60
Disclosure or non-disclosure of HIV status to partner?	30	15	5	60
HIV status of partner (positive or negative)?	30	15	5	60
Use or non-use of HAART or ARVs Pills?	35	11	4	70
Fear of stigmatisation or discrimination by family or friends?	28	18	4	56
Fear of stigmatisation by health professionals?	31	15	4	62
Side effects of the contraceptive methods?	39	6	5	78
Being employed or unemployed?	17	30	4	34
Financial needs for child support grants?	38	10	2	76
Access to or the availability of the contraceptive methods at your nearest clinic?	37	8	5	74
			Average	66%



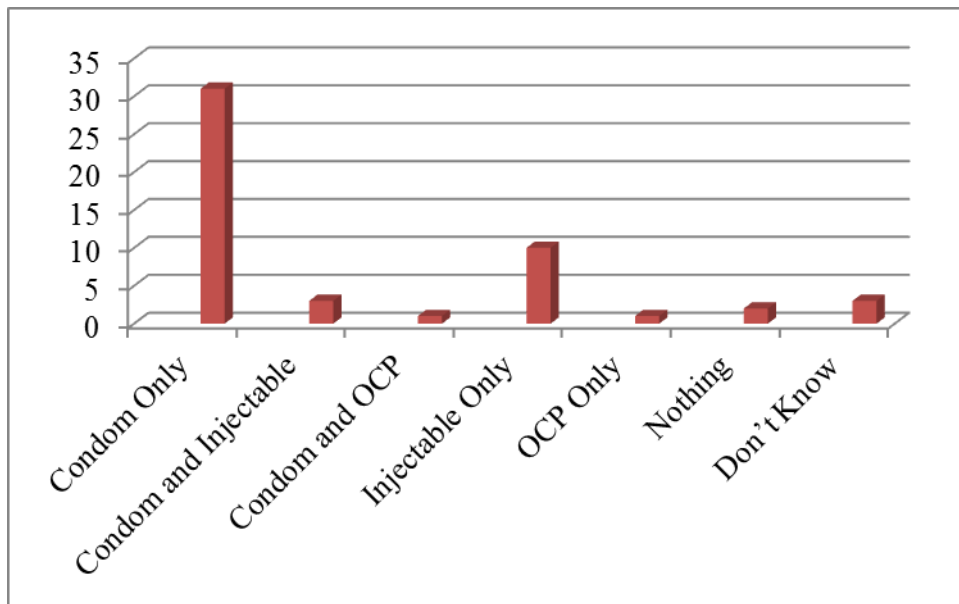
SECTION C DATA ANALYSIS

1. Looking at the circumstances around you, which contraceptive method do you feel is/are best suited for you?

Table C.1			
Group	Value (n)	%	
Condom Only	31	62	
Condom and Injectable	3	6	
Condom and OCP	1	2	
Injectable Only	10	20	
OCP Only	1	2	
Nothing	2	4	
Don't Know	3	4	
Total	50	100	

Positive Perception to use of Dual Protection= 8%	
Favourable perception to unprotected sex= 32%	
Favourable perception to using condom protection=70%	

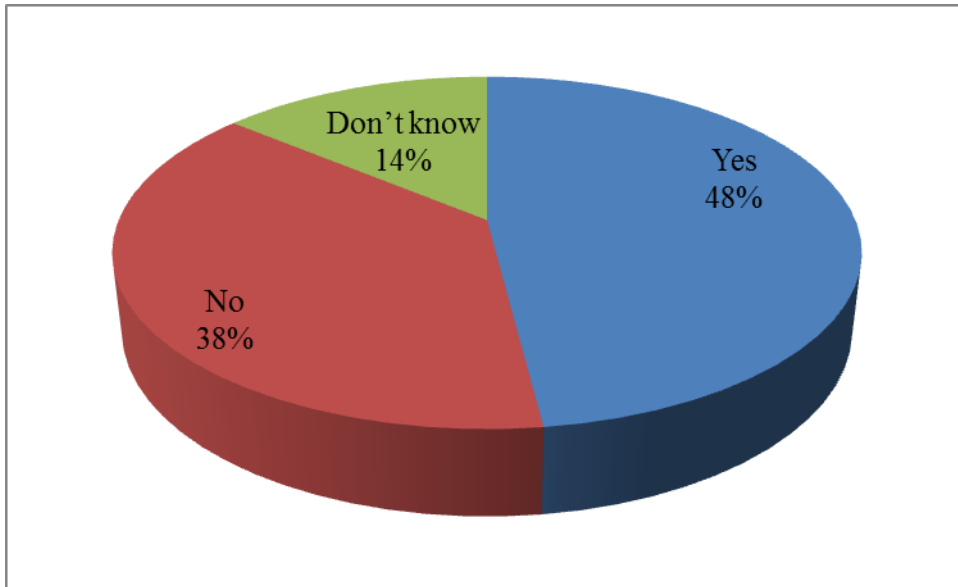
Figure C.1



No.2. Do you think or feel that pregnancy desires or intentions may influence your choice of contraceptive method?

Group	Value (n)	%
Yes	24	48
No	19	38
Don't know	7	14
Total	50	100

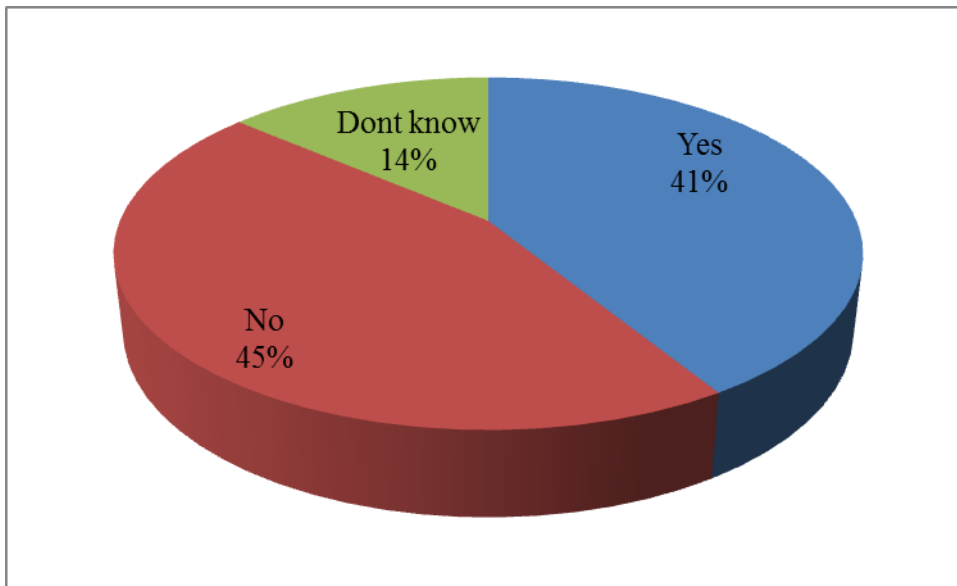
Figure C.2



No 3. Do you think or feel your general state of health (being sick or healthy) could affect your choice of contraceptive method?

Figure C.3		
Group	Value (n)	%
Yes	21	42
No	23	46
Dont know	7	14
Total	50	100

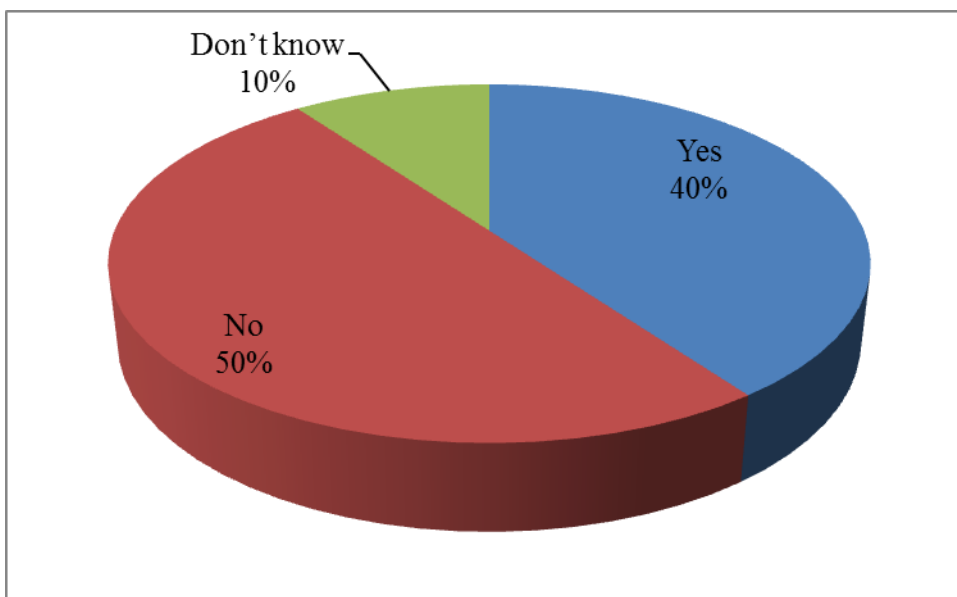
Figure C.3



No 4. Do you think or feel family; social or cultural pressures that a woman must have children would affect your choice of contraceptive method?

Figure C.4		
Group	Value (n)	%
Yes	20	40
No	25	50
Don't kno	5	10
Total	50	100

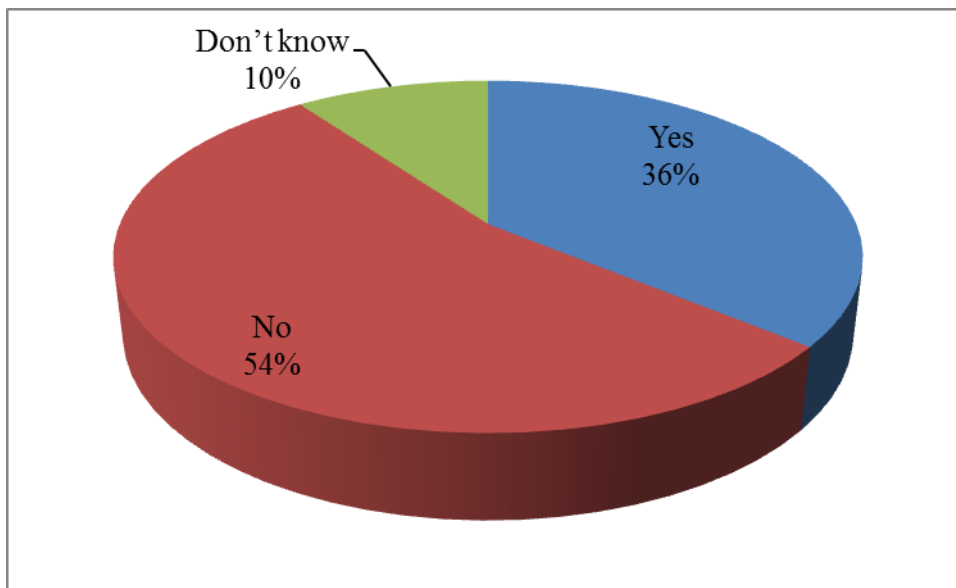
Figure C.4



No 5. Do you think or feel that health workers counselling can influence your choice of contraceptive method?

Table C.5		
Group	Value (n)	%
Yes	18	36
No	27	54
Don't know	5	10
Total	50	100

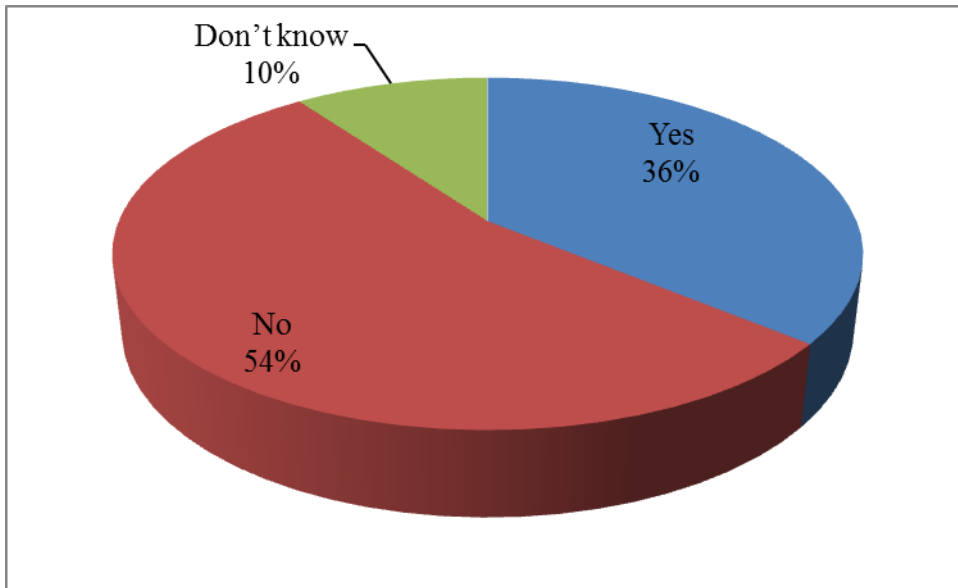
Figure C.5



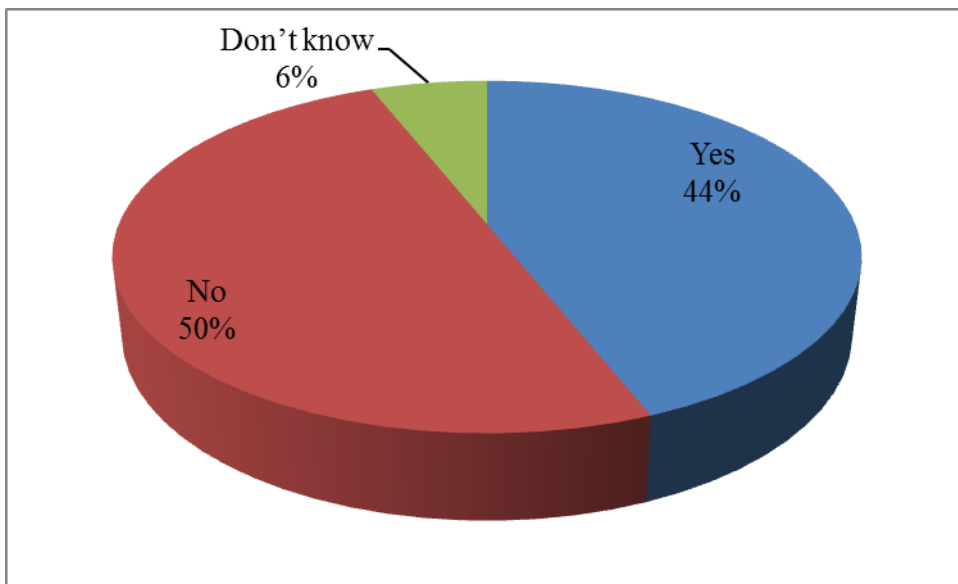
No 6. Do you think or feel that health workers attitude and approach to family planning counselling can influence or affect your choice of contraceptive methods?

Table C.6		
Group	Value (n)	%
Yes	18	36
No	27	54
Don't know	5	10
Total	50	100

Figure C.6

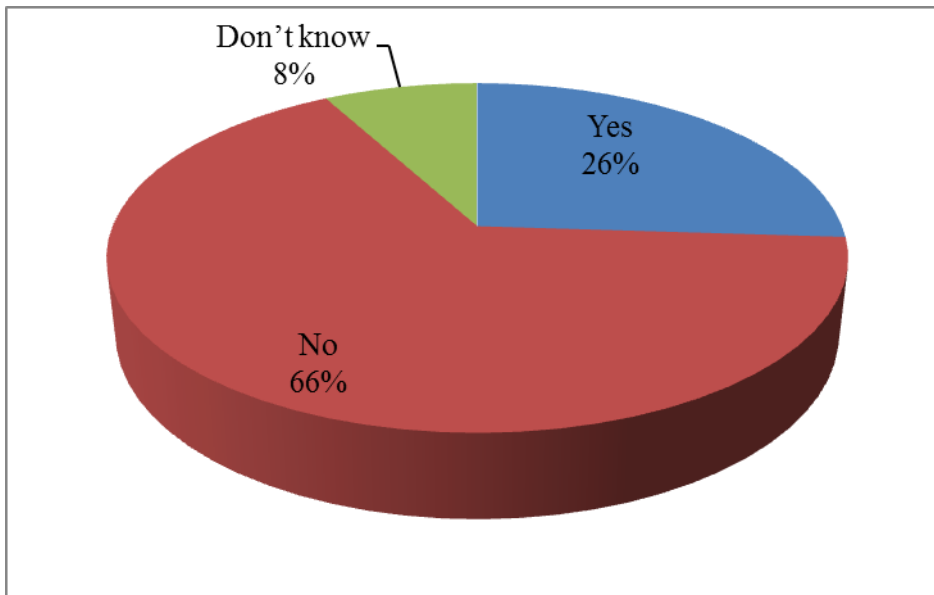


No 7. Do you think or feel that the contraceptive methods available at your nearest clinic or health centres affect your choice of contraceptive methods?



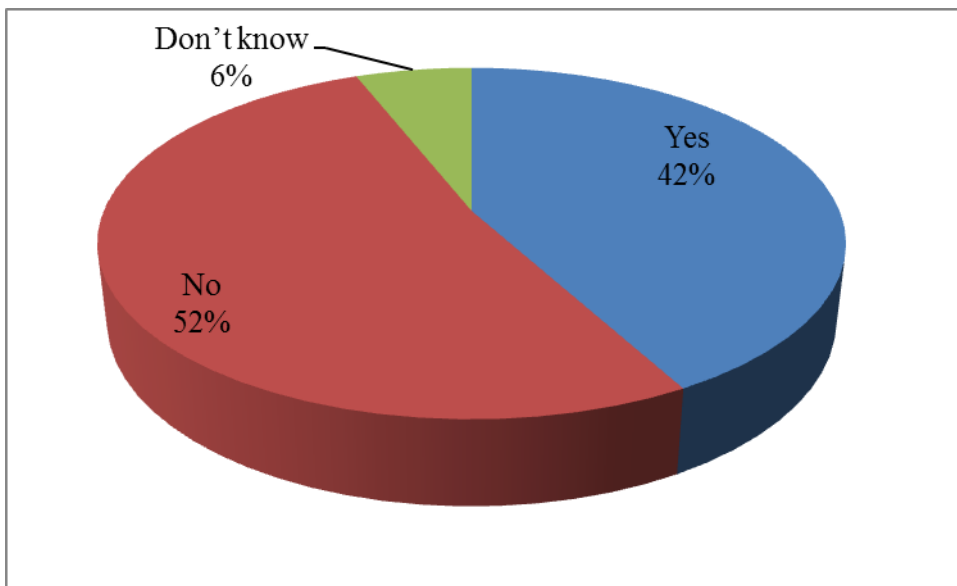
No 8. Do you think or feel your male partner may influence your choice of contraceptive method?

Figure C.8



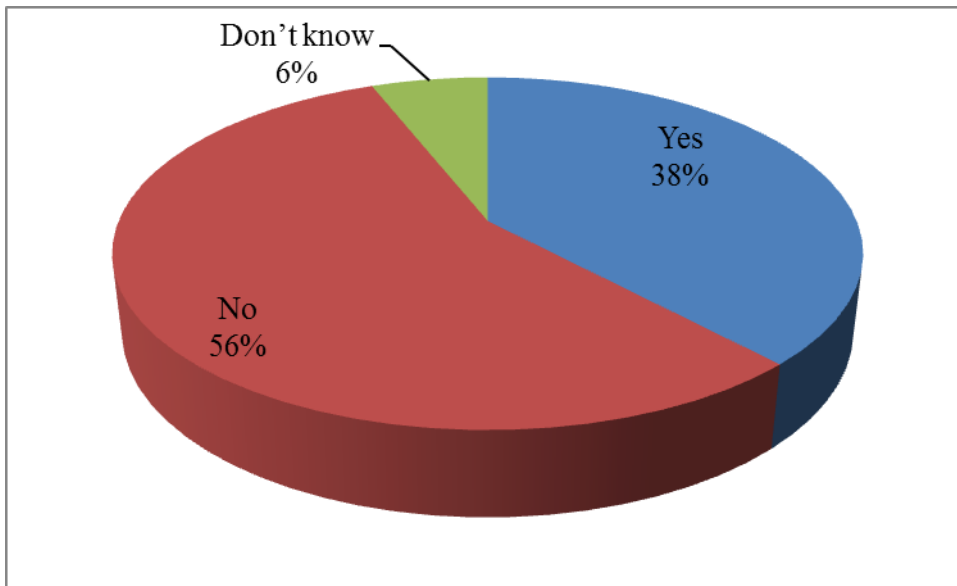
No 9. Do you think or feel whether or not disclosing your status to your partner could affect your choice of contraceptive method?

Figure C.9



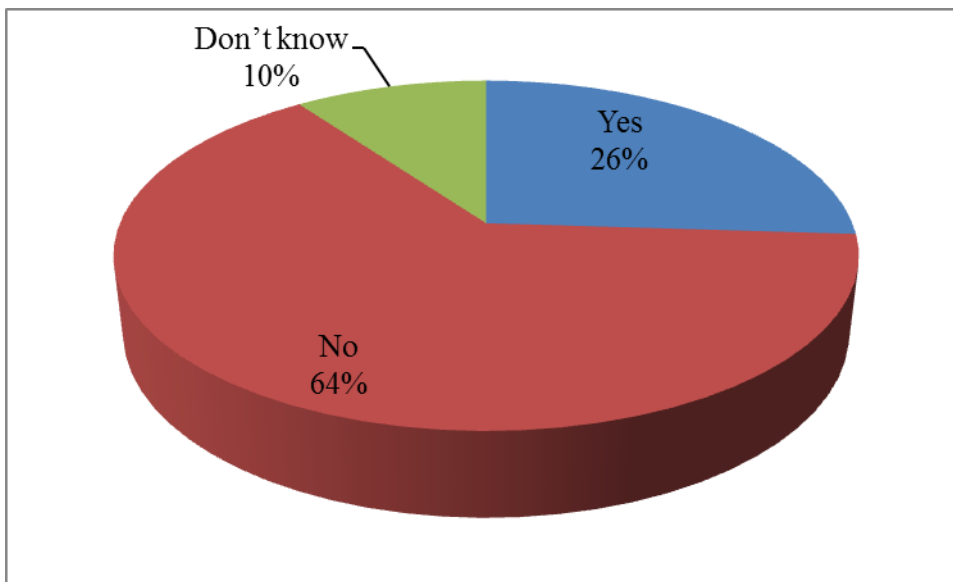
No 10. Do you think the HIV status of your partner (either positive or negative) will affect your of contraceptive method?

Figure C.10



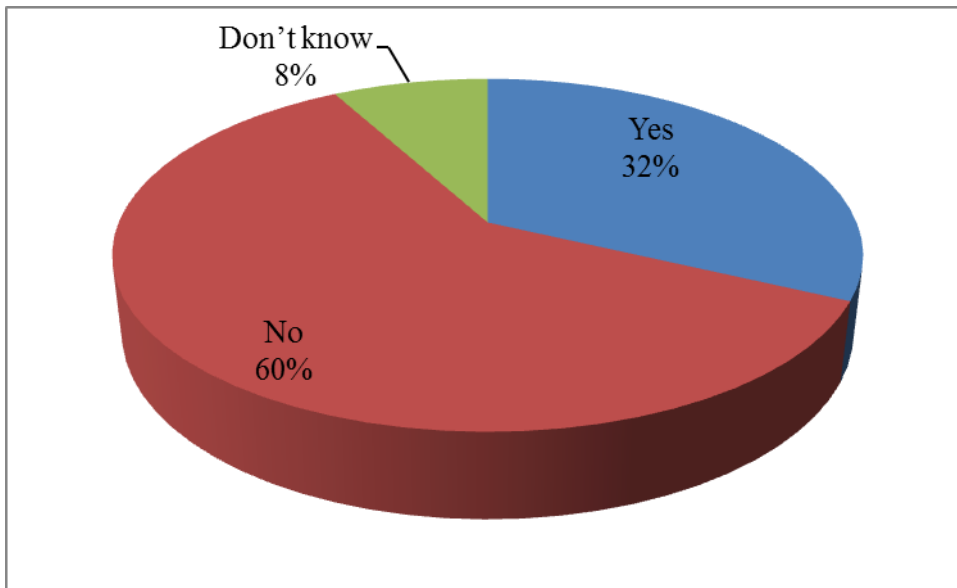
11. Do you think the fear of stigmatisation or discrimination by family or friends could affect your choice of family planning method?

Figure C.11



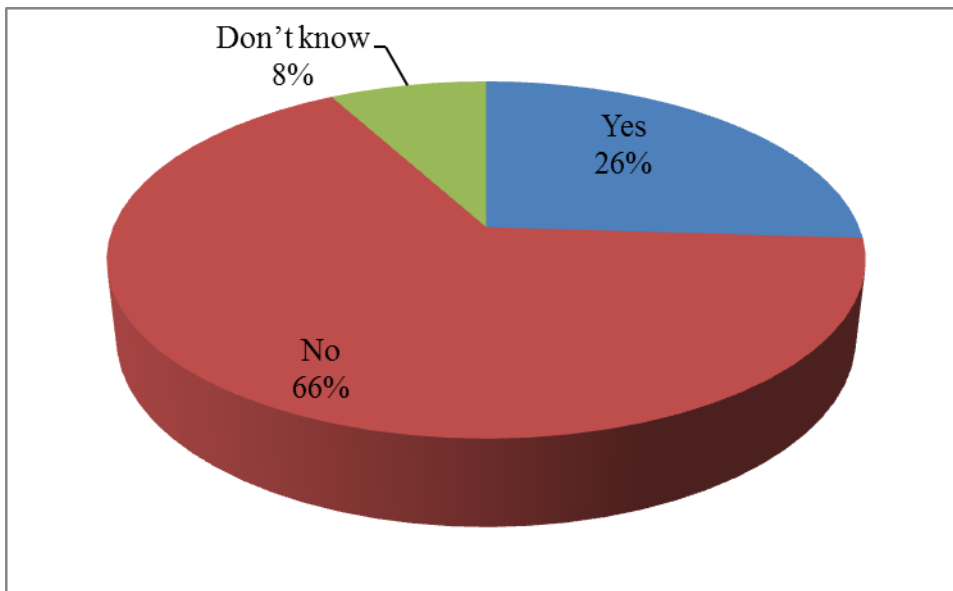
No 12. Have you ever perceived anything in health workers attitude during counselling that suggest HIV positive women must not bear children?

Figure C.12



No 13. Do you think or feel the side effects of contraceptive methods could affect your choice of contraceptive method?

Figure C.13



No 14. Mention any side-effects you have felt with any contraceptive you might have used before?

Table C.14

Side effects felt	Value (n)	%
Vaginal discharge	4	7
Headaches	2	3.6
Irregular Menses	4	7
Amenorrhoea	7	12.7
Weight gain	1	1.8
Dysmenorrhoea	2	3.6
Nausea	1	1.8
Dizziness	1	1.8
Tiredness	1	1.8
Backache	1	1.8
No side effects	32	58.1
Total	55	100

3/4 (75%) of those who felt vaginal discharge are currently not using any contraceptive.

The two feeling headaches are currently using injectables and OCP respectively.

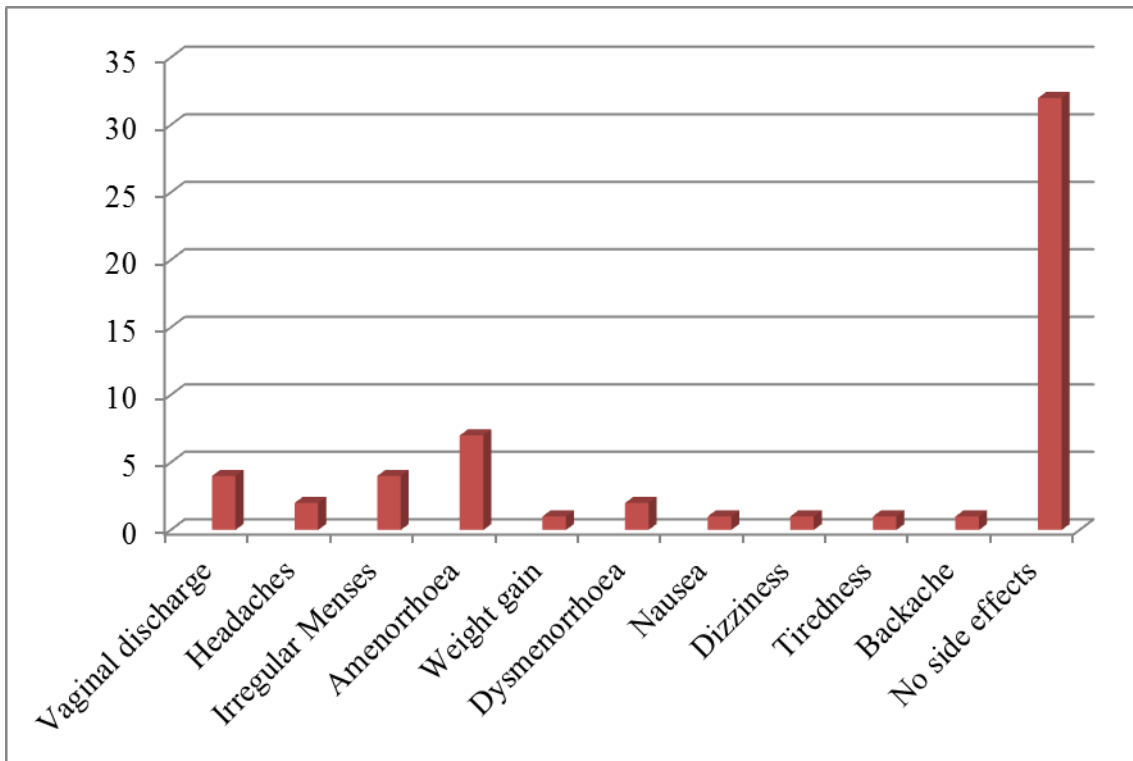
All having irregular menses are currently using injectables.

All having amenorrhoea are currently using injectables.

*16/32 (50%) of those who felt no side effects are currently using condoms while 2/32 (6.25%) are currently using Dual protection.

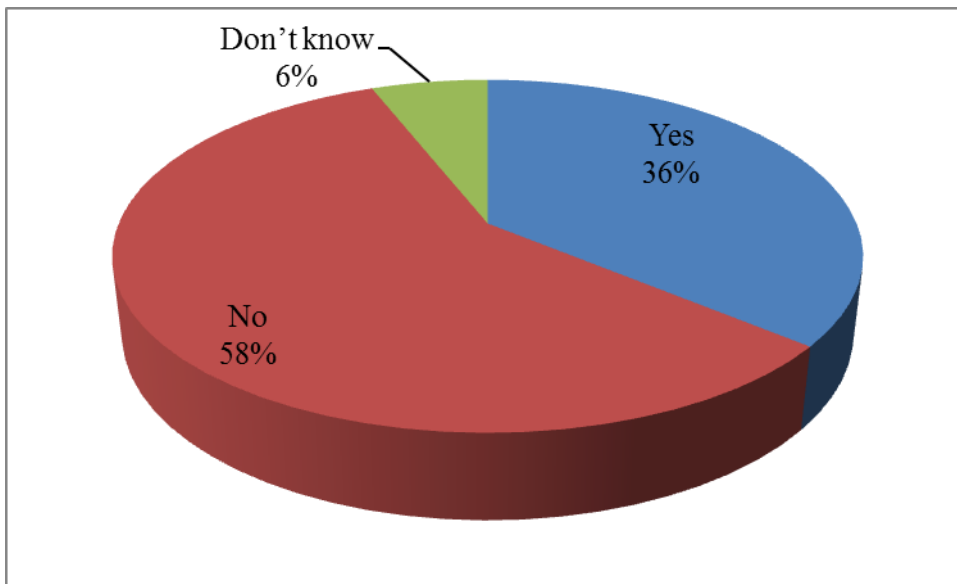
* = *After Cross-checking with Section D 1.*

Figure C.14



No 15. Do you think or feel being stigmatised by your partner may affect your choice of contraceptive method?

Figure C.15



C.16. Average positive response on attitude and Perception to factors influencing choice of contraceptive methods**Table C.16**

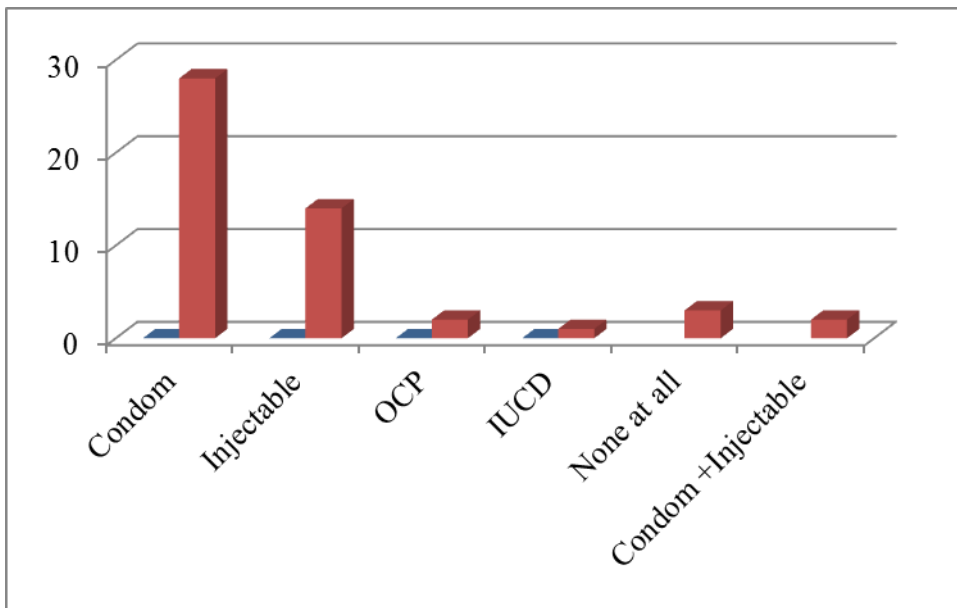
Group	Yes (%)
Q2	48
Q3	42
Q4	40
Q5	36
Q6	36
Q7	44
Q8	26
Q9	42
Q10	38
Q11	26
Q12	32
Q13	26
Q15	36
Average	36.3077

SECTION D DATA ANALYSIS

No 1.What contraceptive method are you using now?

Table D.1`				
Group		Value (n)	%	
Condom	Only	28	56	
Injectable	Only	14	28	
OCP	Only	2	4	
IUCD	Only	1	2	
None at all		3	6	
Condom +Injectable		2	4	
Total		50	100	

Figure D.1



No 2. Reasons for using present contraceptive method.....		
2a. None at all (3)		
Reasons		Value (n)
Looking to get pregnant and have baby		2
I don't have a boyfriend now		1
	Total	3
2b. Oral Contraceptive Pills (OCP) only users		
Reason		Value (n)
To make my menstruation regular again		1
Simply satisfied and comfortable with the pills		1
	Total	2
2c. IUCD only user (1)		
Reasons- no side effect and can stay for 5 years		
2d.Injectables + Condom users (2)		
Reasons		Value (n)
The Condom also prevent STIs		1
The condom prevent infection and pregnancy in case of rape		1
	Total	2
2e. Injectables Only Users (14)		
Reasons		Value (n)
Does not want to loose blood through menses (Prefers Amenorrhoea)		1
The 2-3 months interval makes it convinient and easy to remember		3
Simply satisfied and comfortable with the injections		3
Does not want another baby born with HIV infection		4
It's the method available at the nearest clinic		1
Does not want to get pregnant in case of rape		1
Want to gain weight and be more healthy		1
Prevent pregnancy for now and have a baby later		1
	Total	15

N.B. one respondent gave 2 different reasons as grouped above

Figure D.2e

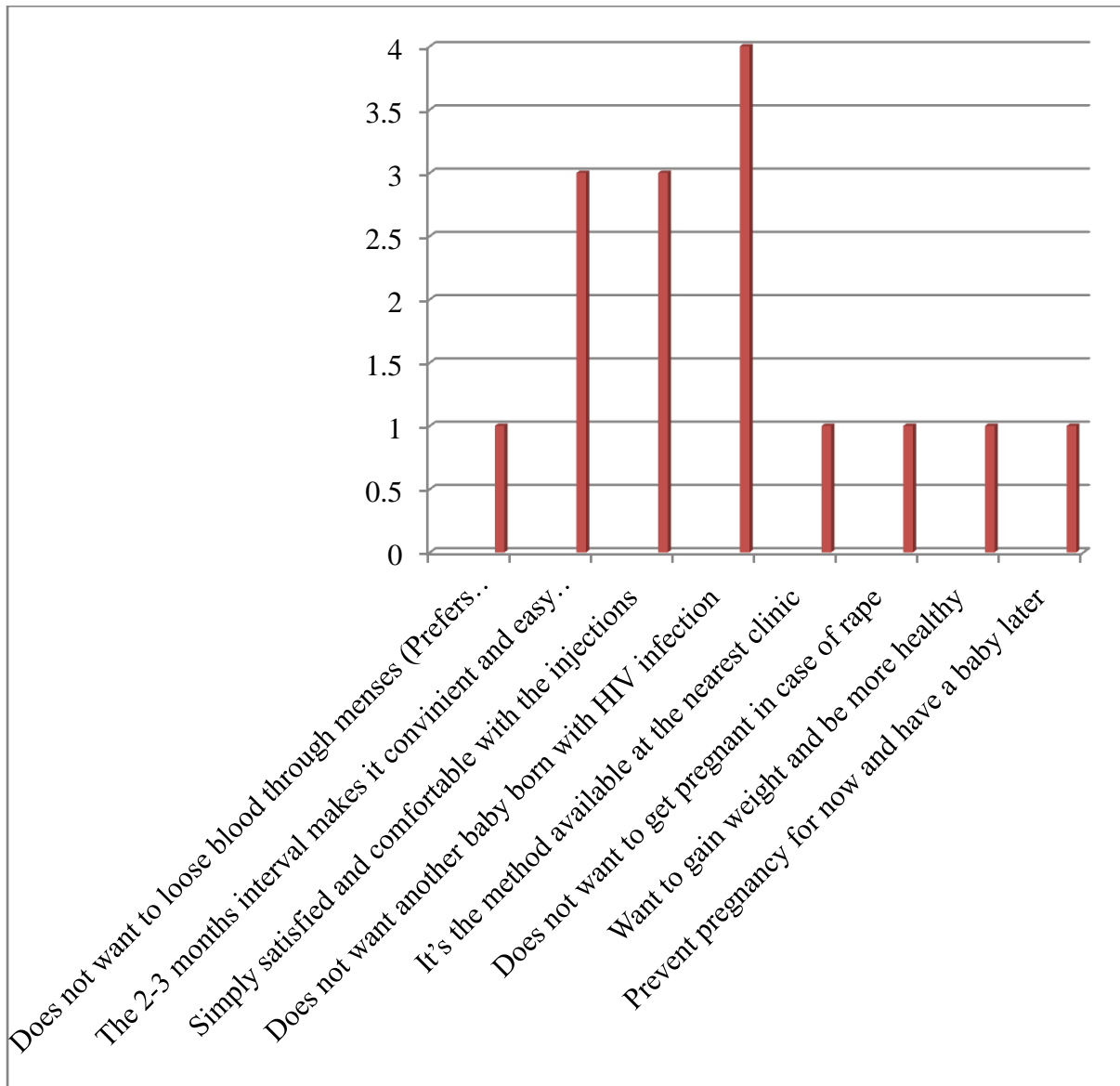
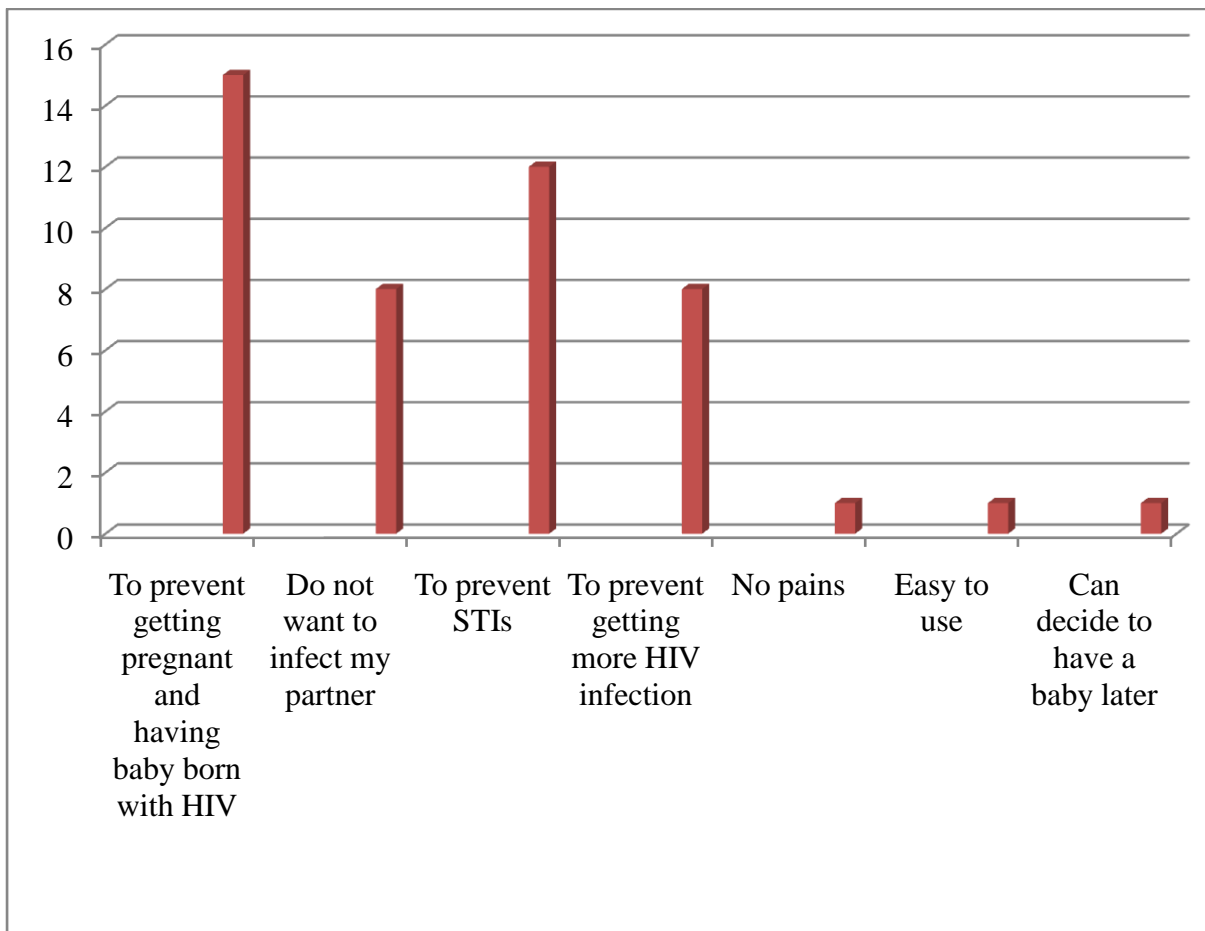


Table D.2f		
Reasons	Value (n)	% (/28)
To prevent getting pregnant and having baby born with HIV	15	53
Do not want to infect my partner	8	29
To prevent STIs	12	43
To prevent getting more HIV infection	8	29
No pains	1	3.5
Easy to use	1	3.5
Can decide to have a baby later	1	3.5
Total	46	

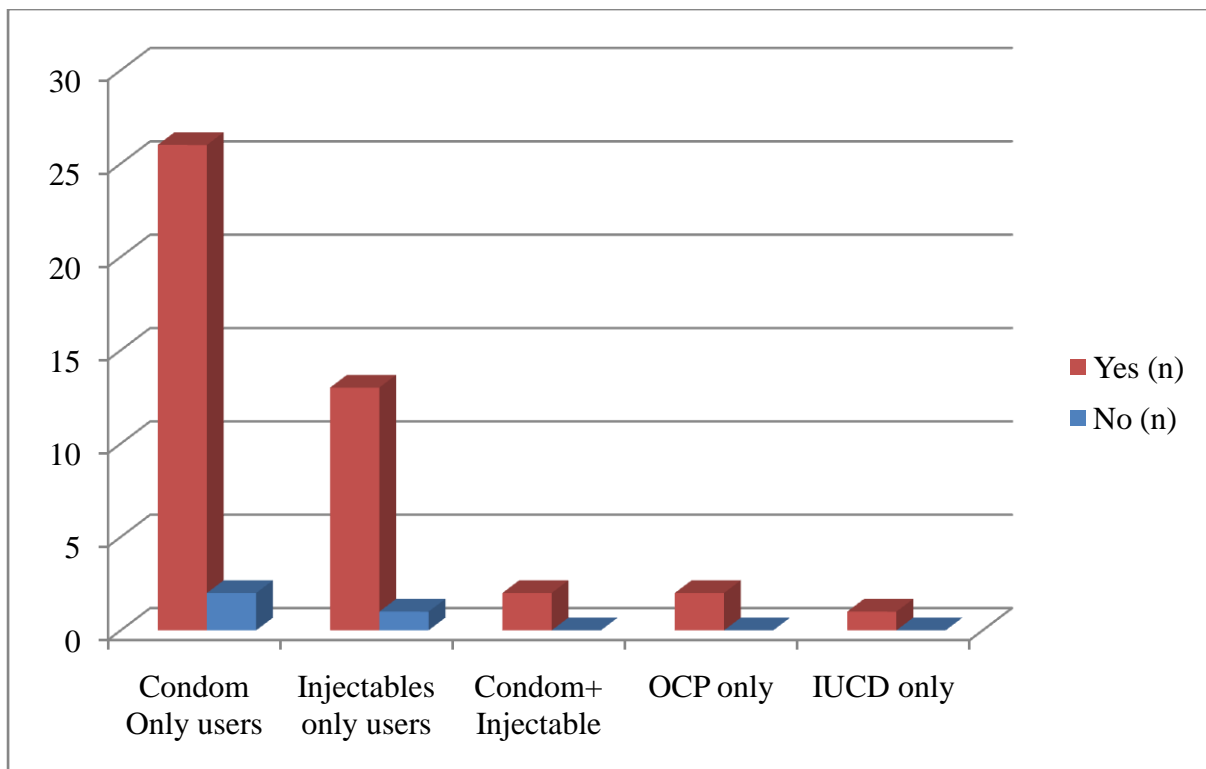
N.B many respondents gave more than one reasons as a grouped above.

Figure D.2f



3. Do you use the method consistently or all the ?				
Table D.3				
	Yes (n)	No (n)	Total	Consistency %
Condom Only users	26	2	28	93
Injectables only users	13	1	14	93
Condom+ Injectable	2	0	2	100
OCP only	2	0	2	100
IUCD only	1	0	1	100

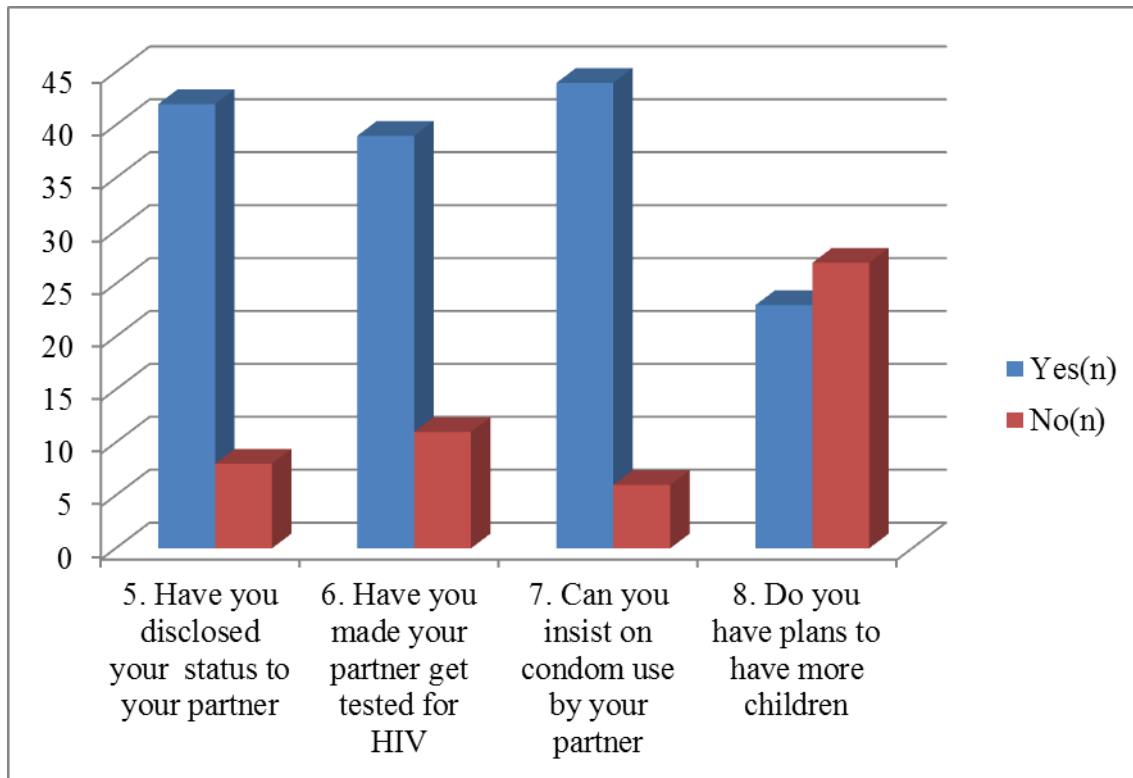
Figure D.3



4 Reasons for not using method consistently?				
Reasons	Value(n)			
No reason	3			
Total	3			
All not using their method consistently said they have no reasons				

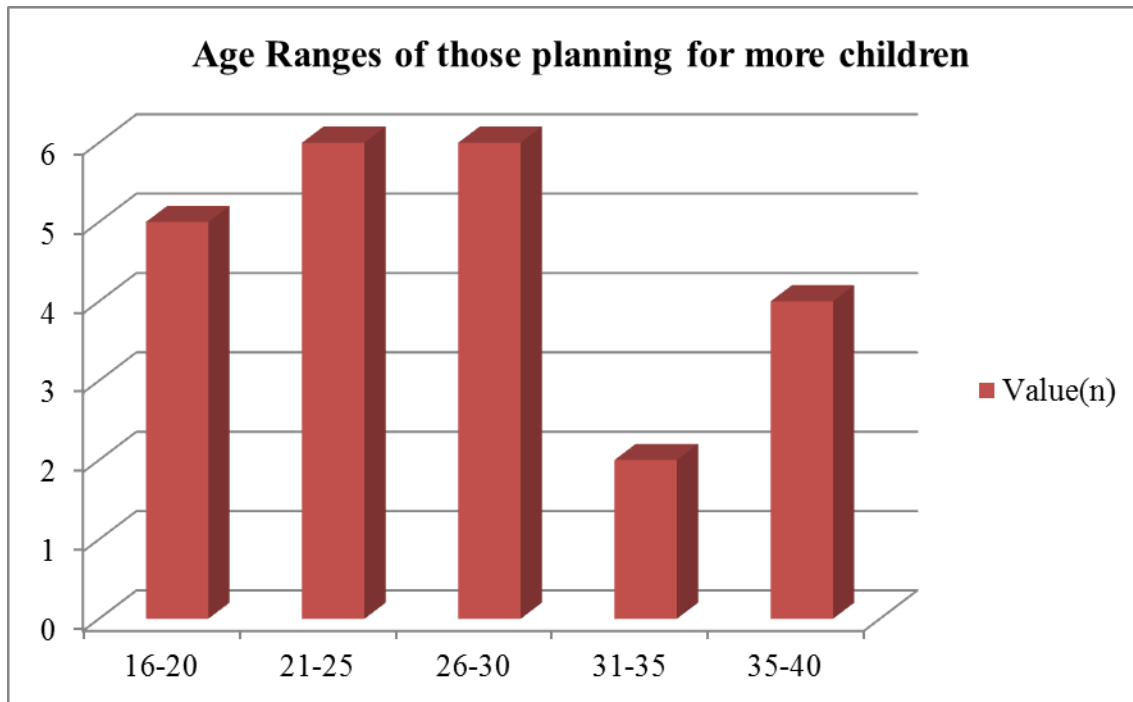
Section D. 5-8						
	Yes(n)	No(n)	Total	Yes (%)	No(%)	Total (%)
5. Have you disclosed your status to your partner	42	8	50	84	16	100
6. Have you made your partner get tested for HIV	39	11	50	78	22	100
7. Can you insist on condom use by your partner	44	6	50	88	12	100
8. Do you have plans to have more children	23	27	50	46	54	100

Figure D. 5-8



8a. Age Range of those (23) who have plans for more children		
Table D.8a		
Age	Value(n)	%
16-20	5	22
21-25	6	26
26-30	6	26
31-35	2	9
35-40	4	17
Total	23	100

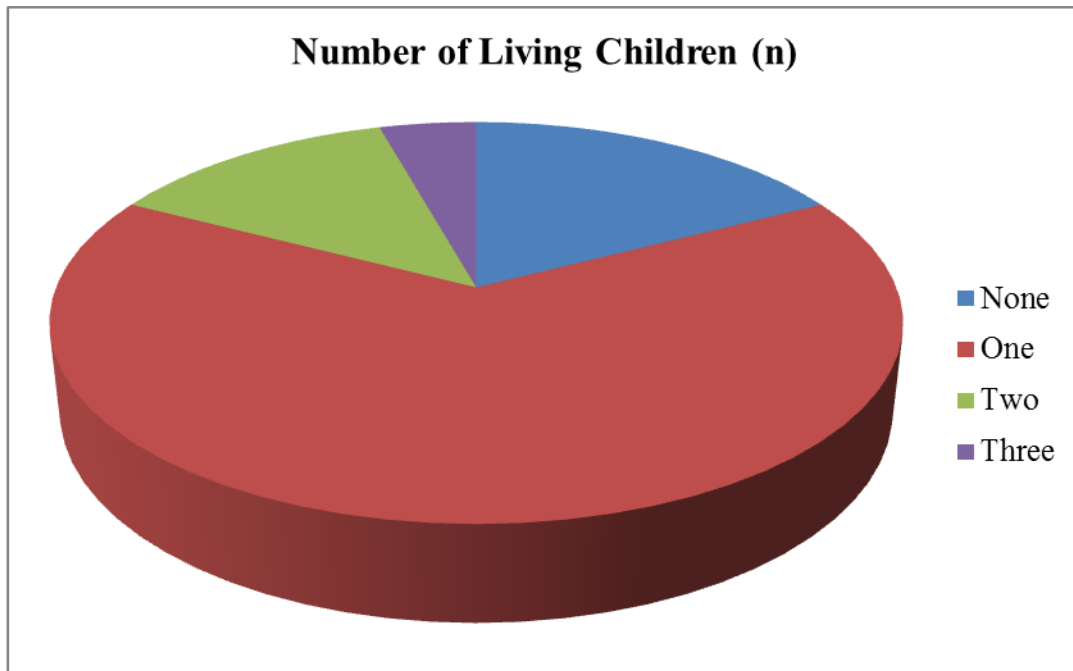
Figure D.8a



No 8b. Number of living children in those who have pregnancy plans

Table D.8b			
Number of living children	Value (n)	%	
None	4	17.4	
One	15	65.2	
Two	3	13	
Three	1	4.4	
Total	23	100	

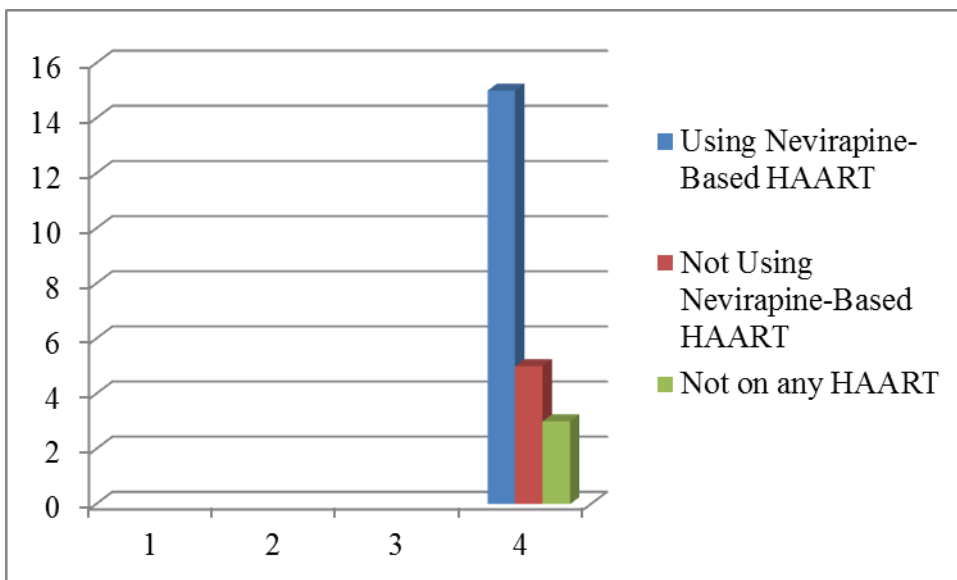
Figure D.8b



No 8c. The use of Nevirapine-based HAART by those who have pregnancy plans

Table D.8c		Value (n %)	
Group			
Using Nevirapine-Based HAART		15	65.2
Not Using Nevirapine-Based HAART		5	21.8
Not on any HAART		3	13
	Total	23	100

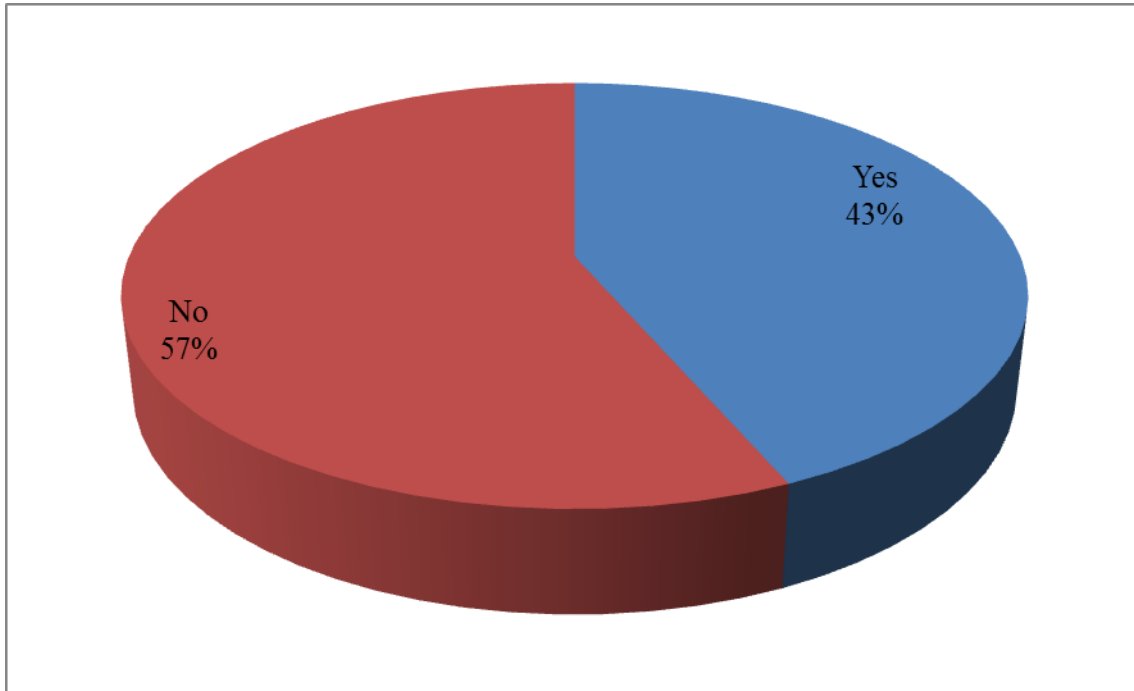
Figure D.8c



9. Does the plans for more children affect your choice of contraceptive method?

Table D.9				
	Yes	No	Total	
Value(n)	10	13	23	
%	43	57	100	

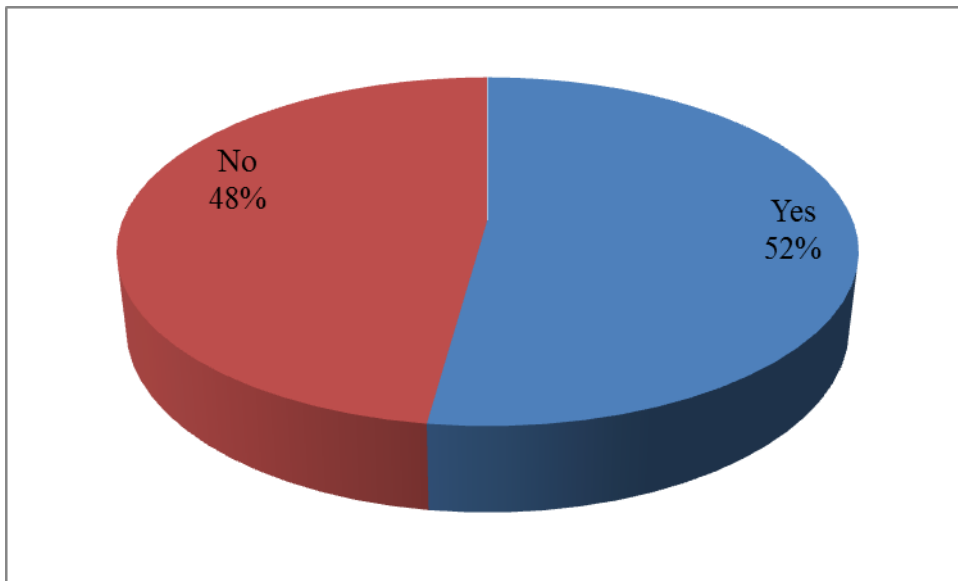
Figure D.9



10. Does the benefit of getting child support grants has anything to do with your future pregnancy desires?

Table D.10				
	Yes	No	Total	
Value(n)	12	11	23	
%	52	48	100	

Figure D.10



11. If the government replaces child support grants with Basic income grant for all unemployed people, will that change your contraceptive method?

Figure D.11

