

**SOCIO-CULTURAL FACTORS CONTRIBUTING TO THE
DIFFERENTIAL HIV STATUSES BETWEEN AGNUAK AND NUER
COMMUNITIES IN FUGNIDO REFUGEE CAMP, ETHIOPIA**

BY

BETEL GETACHEW ALEMAYEHU

Dissertation submitted in partial fulfilment of the requirements for the Degree
of Master of Sociology at the University of South Africa

Supervisor: Dr Zanetta Jansen

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DECLARATION

I, Betel Getachew, hereby declare that this dissertation has not been presented at any other institution either partially or in total for any academic award, publication, or other use. The works here in are original. Where the works of others are quoted, appropriate references have been given.

I therefore wish to present it for the award of the degree of Master of Sociology at the University of South Africa.

Student: **Betel Getachew**

Date

Supervisor: **Dr. Zanetta Jansen**

Date

DEDICATION

I would like to dedicate this research to the resilient and courageous women of South Sudan and the future of the youngest nation, the children of South Sudan.

God bless!

ACKNOWLEDGEMENTS

First and above all, I praise God, the almighty for providing me this opportunity and granting me the capability to proceed successfully. This dissertation appears in its current form due to the assistance and guidance of several people. I would therefore like to offer my sincere thanks to all of them.

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ABSTRACT

According to the 2005 Ethiopian Demographic Health Survey, HIV prevalence in Gambella region where Fugnido refugee camp is located is 6%, which is the highest prevalence data recorded in the country. Similarly, the United Nations High Commissioner for Refugees (UNHCR) Health Information System (HIS) demonstrates that Fugnido has the highest HIV prevalence compared to other refugee camps in Ethiopia and furthermore shows variation in prevalence among the two main ethnic groups in the camp, namely Agnuak and Nuer (about 8.5% and 2.3% respectively). The study seeks to investigate why a significant difference exists in the number of people with known HIV positive status among the Agnuak community compared to the Nuer community in the Fugnido refugee camp in Ethiopia. It does this by investigating factors that are presumed to explain HIV high risk-behaviour and vulnerability. This was a cross-sectional study of Agnuak and Nuer tribes living at the Fugnido refugee camp. The sampled population involved men and women refugees from the ages of 15 to 49 years. The study used a mixed method approach or methodological triangulation. Cluster sampling technique was used for the quantitative data collection. The sample size was 831 refugees (439 Agnuak and 390 Nuer). Seven (7) Focus Group Discussions (FGDs) and 3 Key Informant (KI) interviews was used for the qualitative data collection. Findings show that the Agnuak were almost 4 times (OR=3.8, 95% CI [1.9-7.4] $p < 0.05$) more likely to practice risky behaviour compared to 0.3 times (OR=0.3, 95% CI [0.1-0.9] $p < 0.05$) likelihood among the Nuer refugees. Factors associated with differences in risky behaviour for both Agnuak and Nuer included, inter alia, primary education as the highest level of education attained, 50% among the Agnuak (OR=0.5, 95% CI [0.3-0.8] $p < 0.05$), compared to Nuer community's 30% (OR=0.3, 95% CI [0.2-0.6] $p < 0.05$). Access to HIV and voluntary counselling and testing (VCT) services was lower for the Agnuak (OR=1.8, 95% CI [1.1-2.9] $p < 0.05$) compared to the Nuer (OR=2.9, 95% CI [1.6-5.1] $p < 0.05$). Unlike the Nuer refugees, the Agnuak refugees who had experienced forced sex (OR=7.3, 95% CI [2.9-18.8] $p < 0.05$) and had a positive attitude (lack of or reduced stigma) towards HIV (OR=2.1, 95% CI [1.3-3.7] $p < 0.05$) were more positively associated with risky

behaviour (than the Nuer). The Nuer had no factor associated with risky behaviour that was different from that of the Agnuak. The study revealed more Agnuak refugees than Nuer refugees had been engaged in risky sexual behaviour by having multiple sex partners and being involved in transactional sex. The Nuer was more closed and reserved to having sexual relations outside of their group than the Agnuak were which contributed to their relatively lower HIV prevalence. Furthermore, there was very low condom use among the Nuer community compared to the Agnuak community, which was based on differential attitudes between the two communities concerning trust of partner and monogamous relations. The study findings recommend that humanitarian workers and community partners need to collaborate to develop congruent HIV interventions that go beyond traditional strategies of distributing condoms and focus on correct and consistent use of condoms in the camp. Humanitarian and community workers' understanding the socioeconomic context of the communities and the influence of cultural and other factors, including behaviour with intervention strategies, could also curb the epidemic.

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ABBREVIATIONS

AIDS - Acquired Immunodeficiency Syndrome

ANC - Antenatal Care

ARRA - Administration for Refugee and Returnee Affairs

ART - Anti Retroviral Therapy

BSS - Behavioural Surveillance Survey

CI - Confidence Interval

DHS - Demographic Health Survey

EmOC - Emergency Obstetric Care

ETB - Ethiopian Birr

FGD - Focus Group Discussion

FSW - Female Sex Worker(s)

HIS - Health Information System

HIV - Human immunodeficiency virus

IASC - Inter-Agency Standing Committee

IDP - Internally Displaced Person/s

IRC - International Rescue Committee

KI - Key Informants

MSM - Men having Sex with Men

OR - Odds Ratio

OVC - Orphan and Vulnerable Children

PC - Palliative Care

PEPFAR - Presidential Emergency plan for AIDS Relief

PITC - Provider Initiated Testing and Counselling

PLHIV - People/Person living with HIV

PMTCT - Prevention of Mother to Child Transmission

RaDO - Rehabilitation and development Organization

RH - Reproductive Health

SGBV - Sexual and Gender based Violence

STI - Sexually Transmitted Infection

UNAIDS - United Nations joint team on AIDS

UNHCR - United Nations High Commissioner for Refugees

VCT - Voluntary Counselling and Testing

VMMC - Voluntary Medical Male Circumcision

WHO - World Health Organization

OPERATIONAL DEFINITIONS

Anal sex: both penetrative and receptive anal intercourse.

Asylum-seekers: civilians seeking safety in countries other than their own, (the first step towards being formally recognized as refugees).

Camp health centre: health facility located in the refugee camp and serves all refugees and Ethiopian nationals living in the surrounding community. They are managed by health agencies working in the refugee program.

Casual sex partner: a partner with whom one is not married or cohabitating with, has a sexual relationship, and does not pay or exchange a favour for sex.

Commercial sex: a sexual relationship where money is paid in exchange for sex (paid sex).

Comprehensive knowledge and misconceptions about HIV/AIDS: respondents were considered to have comprehensive knowledge about HIV/AIDS if they knew about the three HIV/AIDS prevention methods and had no misconception about HIV transmission.

High-risk behaviour: unprotected anal and vaginal intercourse with an infected sexual partner, having multiple sex partners, using non-sterile drug injection equipment, alcohol abuse and early initiation of sexual behaviour.

HIV seroprevalence: is the number of persons in a population who test positive for HIV based on serology (blood serum) specimens; often presented as a percentage of the total specimens tested.

Host community: Ethiopian nationals living around a refugee camp. They are also referred to as local, national or surrounding population.

Host health centre: health facility that specifically serves Ethiopian nationals and is managed by the Woreda Health Bureau under the Federal Ministry of Health.

Khat: (pronounced “cot”) is a stimulant drug derived from a shrub (*Catha edulis*) that is native to East Africa and southern Arabia.

Knowledge about HIV prevention: respondents were considered to be knowledgeable about HIV prevention if they correctly identified the three major ways to prevent HIV transmission:

(1) abstinence, (2) being faithful to one partner, and (3) condom use.

Misconceptions: respondents were considered to have misconceptions about HIV/AIDS transmission and prevention if they agreed with one or both of the following two incorrect statements about HIV/AIDS: (1) that HIV can be transmitted by sharing utensils with someone who is HIV positive; (2) that a healthy-looking person cannot be infected with HIV.

Recreational drugs: drugs that are not given at a medical facility people use orally, sniffing, injection, other locally common methods for using drugs but does not include tobacco unless it is mixed with another drug.

Refoulement: expelling or returning asylum-seekers or refugees in any manner whatsoever to the frontiers of territories where his/her life or freedom would be threatened on account of his race, religion, nationality, membership of a particular social group or political opinion, intercepting asylum-seekers or refugees outside the territory of any country with a view to prevent them from seeking safety.

Refugee: any person who is outside his or her country of origin or habitual residence and who is unwilling or unable to return there owing to: i) a well-founded fear of persecution for reasons of race, religion, nationality, membership of a particular social group or political opinion or ii) serious and indiscriminate threats to life, physical integrity or freedom resulting from generalized violence or events seriously disturbing public order.

Regular sexual partner: a spouse or a partner with whom one lives, has a sexual relationship, and does not pay or exchange a favour for sex.

Returns: are refugees and the internally displaced persons who return to their country/area of origin or habitual residence.

Sentinel surveillance: is the collection of high-quality data from a sample of specially selected sentinel sites. It is comprised of measuring the prevalence of HIV infection in a selected population on a regular basis and implemented the same way each time, collecting and testing blood for HIV antibodies as well as demographic characteristics and data on high risk behaviour.

Sexual intercourse: penetrative vaginal or anal sex.

The internally displaced: those who have been forced to flee their homes as a result of armed conflict, situations of generalized violence, violations of human rights, or natural or human-made disasters. Unlike refugees who have crossed an international border, the internally displaced remain uprooted within their own country.

Transactional sex: a sexual relationship where money, a gift or favour is provided in exchange for sex (this includes commercial sex).

Wife/widow inheritance: is a type of marriage in which a widow marries a kinsman of her late husband, often his brother.

Woreda/Wereda: an administrative division of Ethiopia that is managed by a local government. It is composed of a number of Wards, or neighbourhood associations, which are the smallest unit of local government in Ethiopia.

CHAPTER ONE

1. BACKGROUND AND RATIONALE

1.1 INTRODUCTION

When refugees arrive in a country, in large numbers, they are generally moved to camps where they can get relief assistance (Toole et al 1990; Toole et al 1993). Although it is known that social factors such as poverty, social instability and powerlessness typically associated with conflicts and the forced displacement of people exacerbate Reproductive Health (RH) and Human Immunodeficiency Virus (HIV) transmission, until recently not much attention has been paid to RH and HIV and Acquired Immunodeficiency Syndrome (AIDS) care and prevention in the context of a humanitarian response –such as in refugee camps. HIV/AIDS is both a long-term crisis in its own right, and a contributory factor in acute emergencies. The epidemic presents key challenges for both humanitarian and development assistance, and for the interfacing between the two.

In the last two decades, the slim literature on HIV/AIDS and emergency situations largely focused on HIV/AIDS in conflict and refugee situations. The main theme was the increased risk of infection among affected populations caused by the violence, displacement, and militarization resulting from conflicts and war. During 2002 and 2003, however, the issue of HIV/AIDS and humanitarian emergencies leapt to the top of the UNHCR policy agenda, prompted by the Southern African crisis, the publication of the Inter-Agency Standing Committee (IASC) guidelines on HIV/AIDS and emergencies, and the revision of the Sphere Handbook, where HIV/AIDS was seen as a cross-cutting issue (Humanitarian Policy Group, 2004). HIV/AIDS has particular characteristics that may create new types of vulnerabilities, or exacerbate existing ones and in emergencies such as in displacement, may increase people's susceptibility, further fuelling the epidemic.

Reproductive health services for refugees are defined in accordance with UNHCR Interagency Field Manual for Reproductive Health in Refugee Situations (1995). The underlying principles of RH care should be available in all situations and be based on the needs of refugees, particularly women's needs, with full respect for the various religious and ethical values and cultural backgrounds of the refugees in conformity with universally recognized international human rights (Inter-agency Working Group, 2010).

This research focuses on exploring and explaining perceived differential HIV/AIDS statuses among the Nuer and Agnuak communities within the Fugnido refugee camp, in the Gambella region in Western Ethiopia. The camp hosts Sudanese nationals who crossed the Ethiopian border to seek asylum due to conflicts and continued clashes between Northern and Southern Sudanese. The study specifically focuses on socio-cultural, economic, political and other relevant factors to explain differential infections between the two major ethnic groups there, namely the Agnuak and Nuer. Socio-cultural, economic, accessibility factors and other co-factors for HIV transmission are all associated with behavioural risk for HIV infection. In reality, they often overlap and integrate when accounting for HIV infection.

1.2 BACKGROUND

Ethiopia is situated in the eastern part of Africa with a major portion of the country lying on the Horn of Africa. It has a tiered government system consisting of a federal government overseeing ethnically based regional states, zones, districts (woredas), and neighbourhoods (kebele). Ethiopia is divided into nine ethnically based regional states and subdivided into sixty-eight zones and two chartered cities: Addis Ababa and Dire Dawa. It is further subdivided into 550 woredas. The United Nations High Commissioner for Refugees (UNHCR) and Administration for Refugee and Returnee affairs (ARRA) work together in a spirit of solidarity to address the multi-faceted needs of refugees and other relevant persons in Ethiopia. ARRA, on behalf of the Federal Democratic Republic of Ethiopia, is in charge of

refugee protection and implements a range of activities including provision of staff security and protection, camp management and inter-agency coordination. ARRA also undertakes to distribute food and non-food items and provides primary health care, primary education, supplementary feeding, water and sanitation services. UNHCR supports the local community affected by the refugee presence by providing free access to service facilities in refugee camps including health, education and drinking water, in order to maintain harmonious relationships between refugees and the local community.

As at 30 June 2011, the UNHCR Ethiopia was caring for over 218,699 refugees, mainly from Somalia, Eritrea, Sudan, and Kenya. The overwhelming majority has been accommodated in ten camps in different regions of the country and a smaller number of urban refugees from several other countries and in the capital, Addis Ababa (UNHCR 2010). The UNHCR sub-office in Gambella regional state of Ethiopia was established in 1969 following the arrival of the first Sudanese refugees in the region. Since then, Sudanese refugees have been hosted in four settlements. One of the camps, Fugnido refugee camp, was established in 1988 when Sudanese nationals crossed the Ethiopian border to seek asylum from war in Ethiopia (Suckling 2005). As of 2009, many Sudanese refugees were voluntarily repatriated back to Sudan and as a result, all the camps in Gambella region were closed except for the Fugnido refugee camp. The camp now consists of three main ethnic groups; the Dinka, the Nuer and the Agnuak, who, due to ethnic tensions, have each been allocated separate villages within the camp perimeter (Suckling 2005).

ARRA, UNHCR's principal government counterpart, is responsible for provision of health services in the camp with support from UNHCR. There are two camp health centres within Fugnido as well as a government-run/host health centre. The Nuer health centre is within the refugee camp and is located 7.5 km from the host community. The Agnuak health centre is located 900 meters from the host community and the host health centre is about 500 meters

from the Agnuak health centre. Both the refugees and the surrounding host community have access to health services in the camp health centre including HIV services. HIV services in Fugnido Refugee Camp include: HIV prevention through promotion of abstinence and being faithful as well as condom use, treatment of sexually transmitted infections (STI), Tuberculosis and HIV treatments, Orphan and Vulnerable Children (OVC), Voluntary Counselling and Testing (VCT), Provider Initiated Testing and Counselling (PITC), Voluntary Medical Male Circumcision (VMMC), Prevention of Mother to Child Transmission (PMTCT), Antiretroviral Treatment (ART) and Palliative Care (PC).

HIV prevalence is given as a percentage of a population. Data on HIV prevalence in Fugnido comes from antenatal clinic (ANC) and Voluntary Counselling and Testing (VCT) clinics and are, therefore, subject to bias. This is because many infections are undiagnosed or unreported. However, evidence from surveillance of mostly urban antenatal clinic attendees indicates that the growth in the AIDS epidemic in sub-Saharan Africa has levelled off since the late 1990s but only East Africa shows a decline in HIV prevalence. In general, globally, very large differences persist between sub-regions because of several reasons (explained in the reviewed literature section below). Workers planning a response to the AIDS epidemic must take careful consideration to allow more locally appropriate responses to variations in the pandemic in regions.

1.3 PROBLEM STATEMENT

Both Agnuak and Nuer refugees in Fugnido refugee camp live in close proximity to health services in health centres established for the refugees on site. In the health facilities of both sites, there is a comprehensive HIV programme run by the UNHCR government counterpart, the Administration for Refugees and Returnee Affairs (ARRA), which implements facility-based HIV services and Rehabilitation and Development Organization (RaDO) which implements the community-based awareness programme.

Prior to 2008, HIV preventative strategies and programmes in Fugnido refugee camp were not comprehensive and consistently implemented mainly because HIV prevention responses were under-funded. However, when the UNHCR obtained the Presidential Emergency Plan for AIDS Relief (PEPFAR) funding in October 2007, it started working to ensure that refugees benefitted from effective prevention efforts. Although there is no HIV sero-prevalence data that can be used as baseline information, the monthly Health Information System (HIS) from the two health centres in the camp shows that there is significant differences in HIV prevalence among the Agnuak and the Nuer refugees in Fugnido. Based on the data from the Health Information System (HIS), from October 2009 to June 2010, there are 802 Agnuak refugees living with HIV ever enrolled in HIV care (ART) while there are only 57 in the Nuer community. Below is the data for Prevention of Mother to Child Transmission (PMTCT), Voluntary Counselling and Testing (VCT) and Provider Initiated Testing and Counselling (PITC) from October 2009 to June 2010.

Table 1.1: Fugnido HIS data on HIV-Testing from October 2009 to June 2010

HIV Service-Area	Ethnic group	Tested	Tested Positive	Prevalence (%)
PMTCT	Agnuak	650	54	8.3
	Nuer	337	8	2.37
VCT	Agnuak	1539	38	2.47
	Nuer	268	1	0.37
PITC	Agnuak	856	75	8.76
	Nuer	964	23	2.38

Furthermore, data from the 2005 Ethiopian Demographic Health Survey (Central Statistical Agency 2005) demonstrates an unexpected regional pattern in HIV prevalence. Of greatest concern is the prevalence of close to 6% recorded in rural Gambella, the regional state in

Ethiopia, where the Fugnido refugee camp is located. The same survey indicates that the prevalence in Amhara and Tigray, which had always been identified as among the most affected regions of the country, was found to be 0.8 and 1.2 respectively, much less than the Gambella region. Similarly, based on data from HIS in the refugee health centres, the Fugnido refugee camp has the highest HIV prevalence compared to the rest of the refugee camps in Ethiopia. As indicated in Table 1.1 above, the data from the health centres also shows variation in prevalence between the two main ethnic groups in Fugnido refugee camp – Agnuak and Nuer.

This study will seek to investigate socio-cultural, behavioural, and other factors that are thought to influence and, or explain the differential HIV statuses among the Agnuak and Nuer both emerging from the same country and living in a similar setting in the Fugnido camp.

1.4 RATIONALE

Over the years, the national HIV and AIDS response in Ethiopia has improved to be more comprehensive in the services it provides to some marginalized groups of people including refugees; however, the responses are not adequately targeted to refugees and there is a huge gap in baseline information regarding HIV in the refugee camps. Monitoring the HIV epidemic and assessing the impact of HIV prevention interventions is an intrinsically complex and multi-faceted process. This is because of the dynamics of the epidemic, the nature of interventions necessary to reduce its spread, and the inherent limitations of measuring the impact of multiple, mutually reinforcing interventions.

HIV sentinel surveillance, the traditional cornerstone of monitoring HIV trends, becomes less sensitive as an epidemic matures. This is because HIV prevalence changes very slowly in response to behavioural changes in populations due to the chronic nature of HIV infection. Thus, HIV prevalence data cannot indicate whether prevention interventions are having their desired short-term effect of changing behaviour. This study is intended to provide data to allow for analysis of behavioural risks in Fugnido where HIV sentinel surveillance will later be undertaken. It also seeks to call forth the need to conduct behavioural surveillance surveys, which can capture trends in behavioural change, which will lead to a reduction in HIV infection, for example, reduced number of sexual partners and increased condom use among non-regular sexual partners. These changes may be related to the effects of any number of interventions put in place to reduce high-risk behaviour, or they may be a function of naturally occurring responses to the epidemic. Whichever may be the case, the type of information that will be produced by this study can help guide intervention programmes by giving programme planners a clearer picture of current risk behaviour in the two major ethnic groups in Fugnido.

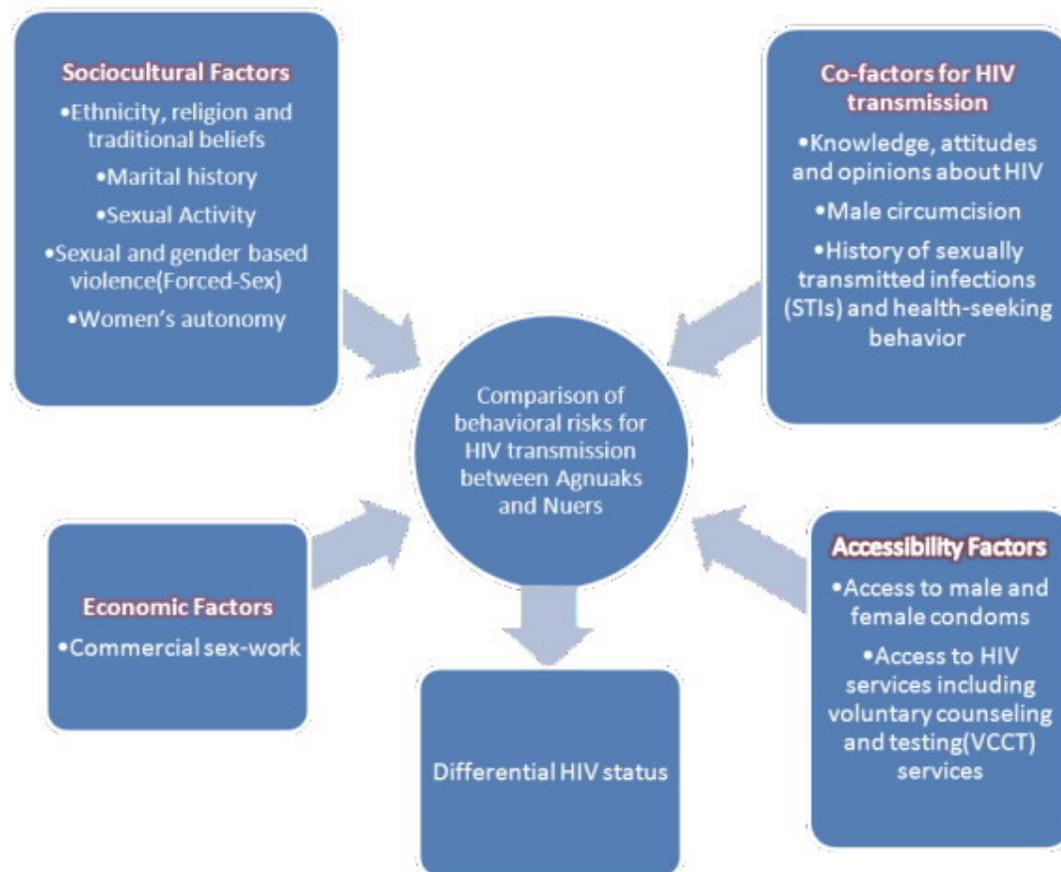
1.5 CONCEPTUAL FRAMEWORK

This section briefly conceptualizes the factors that are thought to explain the differential HIV high risk-behaviour and vulnerability between the two main groups in the camp. Factors that enhance HIV/AIDS vulnerability may be conceptualized at multiple levels. Figure 1.1 (below) proposes, in four major categories, factors that are presumed to explain differential HIV high risk-behaviour and include socio-cultural factors, economic factors, accessibility factors, and co-factors for HIV.

For the purposes of this study, under the category of socio-cultural factors are included the following sub-categories: marital history, ethnicity, religion and traditional beliefs, forced sex and women's autonomy. Economic factors mainly include the type of work, which people

engage in because of poor economic conditions and in order to sustain their lives and their families that put people in a ‘most at risk state’ to HIV infection, e.g. sex-work. The accessibility factors include access to male and female condoms and access to HIV health services including voluntary counselling and testing (VCT). The co-factors include knowledge, attitudes and opinions about HIV, history of sexually transmitted infections (STIs), and male circumcision. These factors, in turn are believed to affect HIV transmission dynamics and the differential distribution of HIV/AIDS.

Figure 1.1 Conceptual frameworks of factors that could explain HIV high risk-behaviour and vulnerability between Agnuak and Nuer refugee communities leading to differential HIV statuses in the Fugnido refugee camp



The categorizing of this conceptual framework is to draw out explanations for differential infections between the Agnuak and Nuer ethnic groups, and furthermore, these categories are not mutually exclusive and self-contained. They intersect, often overlap, and integrate when accounting for HIV infection.

1.6 RESEARCH QUESTION

What socio-cultural, economic and behavioural factors account for the differential HIV statuses between the Agnuak and the Nuer communities in the Fugnido refugee camp, in Ethiopia?

1.7 RESEARCH HYPOTHESIS STATEMENT

Socio-cultural, economic, and behavioural factors can account for differential HIV statuses between Agnuak and Nuer refugee communities in the Fugnido Refugee camp.

1.8 AIMS AND OBJECTIVES

The aim of this study is to observe why a significant difference in the number of people with known HIV positive status among the Agnuak community compared to the Nuer community exists in Fugnido refugee camp in Ethiopia and further, to investigate factors that are presumed to explain differential HIV-prevalence between these groups resulting from high-risk behaviour and vulnerability. The objectives of the study are listed as follows:

Objective 1: To establish baseline behavioural data among the Sudanese refugee population in Fugnido Refugee Camp in Ethiopia among Agnuak and Nuer refugees.

Objective 2: To provide data in the study that raises awareness among interest groups like UNHCR to allow for further analysis of behavioural risks in Fugnido where HIV sentinel surveillance will be undertaken.

Objective 3: To allow for comparison of behavioural risks between the two largest ethnic refugee communities in Fugnido Refugee Camp.

CHAPTER TWO

2. LITERATURE REVIEW

2.1 INTRODUCTION TO REFUGEE CRISIS AND HIV

While data on Human Immunodeficiency Virus (HIV) prevalence in refugee situations are scarce, it is believed that refugees and other displaced populations are at increased risk of contracting the virus during and after displacement due to the following: poverty, disruption of family/social structures and health services, lack of health infrastructure and education, increased drug use, increase in sexual violence and abuse and increase in socio-economic vulnerability, particularly of women and youth (Khaw et al. 2000, International Rescue Committee 2002, Smith 2002). However, in relation to the increasing 'at risk' profile of refugees, it is important to combat the stereotypical perception that 'refugees bring AIDS with them to local communities', which then may lead to discriminatory practices (UNHCR 2002). This study seeks to observe these and other related socio-cultural factors in their association with vulnerabilities among the Agnuak in comparison to the Nuer refugee communities.

Some types of conflicts and, or displacement have brought about much more particular risks of HIV infection. For example, long years of refugee camp life and lack of employment or recreational opportunities have contributed to intravenous drug use in the Afghanistan and Pakistan border areas; this is a driving factor of the epidemic in these countries just as it is in Central Asia (Marion et al 2010). The destitution of Burmese refugees in Thailand has led to widespread 'survival sex' which has mainly driven the infection in that sub-region. The sexual violence used as a weapon of war in Timor Leste, Central Asia, Sri Lanka and other conflicts has undoubtedly increased HIV-infection risks (Marion et al 2010).

The factors that affect HIV transmission vary by context and arise during different phases of the cycle of displacement. According to Spiegel (2007) three phases in the cycle of displacement exist as: the emergency phase, associated with the onset of conflict or some other emergency and flight of those affected; the post-emergency phase, marked by better stability; and the final phase, when durable solutions are secured, and refugees return home, are resettled in a third country, or are permanently integrated within their host country. The many factors that can contribute to the increased risk of HIV transmission among refugees in emergency and post-emergency phases are relatively well understood by humanitarian agencies: refugees are uprooted from their homes and communities. Livelihoods are lost. The breakdown of social networks and institutions reduces community cohesion, weakening the social and sexual norms that regulate behaviour. Disruption to health and education services occurs and reduces access to HIV prevention information and commodities, sexual and reproductive health services, as well as HIV-related treatment and care for those who need it (Spiegel 2007).

Conflict, poverty and HIV disproportionately affect people in sub-Saharan Africa. In 2004, 25 active armed conflicts occurred worldwide; 69 countries were affected by refugee movements and 48 countries by the internal displacement of their populations. Africa was the most affected continent. Their needs are enormous due to the trauma they have suffered and the deplorable conditions in which they live. Furthermore, their vulnerabilities are increased due to destitution, displacement, discrimination, and reduction of basic services and coping mechanisms (Massimo et al 2005).

There is limited epidemiological data on HIV in Southern Sudan due to the lack of a national HIV and AIDS surveillance system (Boo 2007). The genesis of HIV and AIDS in Southern Sudan cannot be traced through case reporting, due to the effects of the war and displacement in a setting devoid of HIV surveillance systems. Data from various sentinel surveillance sites

operated by non-governmental organizations (NGOs) have, however, demonstrated that Southern Sudan has not been insulated from the AIDS epidemic. The two protracted conflicts have resulted in vulnerability of the populations to the risk of HIV infection, primarily due to the disruption of societal structures, disintegration of family and household units and frequent mixing of sexual networks between high-risk groups, according to the BSS Southern Sudan study (2010). Factors that increase conflict-affected and forced-migrant populations' vulnerability to HIV include breakdown in social structures, lack of income and basic needs, sexual violence and abuse, increased drug use, and lack of health infrastructure and education as pointed out by Khaw et al (2000), Hankins et al (2002), International Rescue Committee (2002), Lawday(2002), and Smith (2002).

Although a thorough discussion of how and which socio-cultural factors can increase risks of HIV transmission in refugee camps would require reviewing a myriad of broad social, cultural, economic and physiological data and indicators; this study focuses on a few issues of particular relevance to socio-cultural and related factors, including economic factors, accessibility factors, and other co-factors.

2.2 SOCIO-CULTURAL AND RELATED FACTORS

War and displacement may be a significant and under-recognized collective risk factor for HIV transmission (Khaw et al 2000). Conflict, displacement, food insecurity, and poverty have the potential to make affected populations more vulnerable to Human Immunodeficiency Virus (HIV) transmission (Spiegel 2004). In situations of displacement, behaviours that facilitate the spread of HIV and STIs are likely to be common. Social life is disrupted, along with the usual patterns of sexual behaviour. There is likely to be a lack of opportunities for social activities that enable men and women to meet in culturally acceptable ways. There may be an increase in casual sex, sex in exchange for food, goods or protection, coerced sex, commercial sex, and high rates of sexual assault and rape. Local or international

military, and the host population, may be interacting sexually with refugees, and may have higher rates of sexually transmitted and HIV infections. Blood may be transfused without screening, and access to health care is limited. There may be excessive use of drugs and alcohol, and anti-social behaviour such as stealing, vandalism, and violence (IRC 2001), which exacerbate conditions in which the disease can emerge.

Forced displacement refers to the coerced movement of a person or persons away from their home or home region. The High Commissioner for Human Rights (HCHR 1951, Chapter 1, Article 1, Section 2) defines a refugee as, “a person who, owing to a well-founded fear of persecution for reasons of race, religion, nationality or political opinion, is outside the country of his/her nationality and is unable or, owing to such fear, unwilling to avail himself of the protection of that country.” Elsewhere, it is stated that “In a context of loss, violence and displacement, HIV paradoxically becomes a form of attachment and rootedness” (Wilhelm-Solomon 2010: 25). While the refugee status should not be equated with an increased risk of contracting HIV, the nature of a refugee environment may increase the vulnerability of people—especially women, adolescents and children—to the disease. However, as pointed out by Wilhelm-Solomon (2010) above, ironically an empathic and shared “social space” within refugee camps also creates an affinity and care within the group so that those sharing the same experience become rooted by an accepted identity within the group. The vulnerability of children to HIV/AIDS resulting from political, economic, social, cultural and other factors determines the likelihood of their being left with insufficient support to cope with the impact of HIV/AIDS on their families and communities. These are further exposed to the risk of infection, and subjected to inappropriate research, or deprived of access to treatment, care and support if and when HIV infection sets in (CRC 2003).

HIV/AIDS spreads faster where there is poverty, lawlessness and social instability; these are the conditions that often give rise to, or accompany, forced displacement (UNHCR 2006).

Refugees are usually torn from their lives and families, and with their community and social structures destroyed, their ability to cope is severely compromised. In their new “temporary” settings, they struggle to survive at every level because the normal social safety nets are often absent. Women and girls can be subject to sexual violence and rape, and generally drug and alcohol abuse are often rife. At the same time, health care services are often only minimal or non-existent. A variety of complex factors within refugee camps or displacement settlements makes the people living there enormously vulnerable to acquiring human immune-deficiency virus (HIV) (UNAIDS 2005).

2.2.1 ETHNICITY, RELIGION, BELIEFS AND BEHAVIOUR

A study done on individuals, ages 15 to 49 from the Guyana HIV/AIDS Indicator Survey (2009), examines the relationship of cultural factors, comprehensive knowledge of the disease, and behaviour reducing the risk of contagion. Statistical controls are included for gender, age, urban residence, marital status, education, and wealth. The study finds that ethnicity is the most consistent cultural factor, with East Indians being more likely to avert risk and Africans less likely. Religion is less consistent, though Muslims and Hindus engage in less risk behaviour than so-called pagans do especially over the course of a lifetime. Having a comprehensive knowledge of the disease does not reduce risk, according to Jessica et al (2009). Recent research suggests that racial/ethnic disparities in substance-related problems may stem, at least in part, from racial/ethnic differences in socioeconomic status and racial/ethnic differences in exposure to environmental risk factors (Wallace et al. 2004).

It has been suggested that in sub-Saharan Africa, sexual activity appears to be driven largely by socio-cultural beliefs and practices (Caldwell et al. 1999; Cohen & Trussell 1996; Gage & Njogu 1994; Anarfi 1993). Risk-taking sexual behaviour may be tolerated in some contexts while in others it may be strongly disapproved of and regarded as irresponsible or immoral.

For example, multiple partnerships for men may be tolerated, while women's infidelity is highly penalized, meaning that aspects of sexual conduct are beyond women's control in exposure to environmental risk factors (Caldwell et al. 1999; Fapohunda & Rutenberg 1999; Ingham & van Zessen 1997). Religious beliefs are powerful influences on behaviour. In some cultures, religious prohibitions affect what may be discussed. If sex outside of marriage is considered a sin, then it becomes difficult to discuss the issue even though everyone may know that it is a commonplace practice. Women may not feel that they can discuss their husband's infidelity, or strategies to reduce the risk that results from it, even with other women (IRC 2001). Furthermore, religion can influence sexual behaviour through intermediate factors such as the age at first sexual encounter, marital status, and access to information and other services. It can also influence attitudes to HIV and perceptions of risky behaviour (Nzioka 1996).

2.2.2 MARITAL STATUS AND BEHAVIOUR

The risk of HIV for married persons is complex. It depends on several socio-demographic and sex behaviour determinants that are related to both marital status and HIV (O Shisana et al. 2004). Women in complex emergencies may use transactional or 'survival sex' with men who have food or money to avoid starvation for themselves and their children. In Sierra Leone, war altered sexual networks through massive displacement of populations, psychological trauma, and progressive impoverishment of women (Salama et al. 1999). Deaths or loss of contact with spouses that are frequent concomitants of war, may lead men and women to seek new partners in situations where normal social controls of sexuality by relatives and neighbours are disrupted (Mufune et al. 2000). In Sudanese refugee camps in northern Uganda in 1996, beer brewing and selling were common activities for young refugee women, most of who were separated or widowed due to war. Unprotected sex with multiple partners while under the influence of alcohol was common (Akwir et al. 1998).

Marital status influences perception of the risk of HIV infection and sexual behaviour particularly among women. Whereas non-married women may have some ability to negotiate safer sex, married women face extra challenges, in that women avoid negotiating safer-sex, since in many people's eyes negotiation is a "taboo" and in some cases an admission of "guilt." Furthermore, women do not negotiate because of the fear of being suspected of promiscuity by their spouses, which may lead to unwanted consequences such as separation or even divorce. Often, married women acquiesce in unsafe sexual practices, even if they suspect or know of their partner's extramarital relations (Blanc et. al, 1996). Although HIV cannot be spread through sexual intercourse in stable monogamous relationships between uninfected partners, among married women the presence and the nature of their partners' casual or extramarital sexual practices largely determines the risk of HIV transmission (Ahlburg et al. 1997).

Many refugees have suffered trauma and violence, including sexual violence during conflict and flight. In addition, traditional community support structures are often destroyed during displacement. Thus, there are varieties of 'psychosocial' issues in refugee populations, which may not exist in more stable communities (UNHCR 2005).

2.2.3 SEXUAL BEHAVIOUR

Patterns of sexual behaviour are likely to be altered by displacement. In a refugee camp with many single women and possibly poorly disciplined military groups in charge there are likely to be increased levels of violent or coercive sex. Single soldiers and those away from their wives and girlfriends are likely to pay for sex or start relationships with local women. This may be the starting point for a new epidemic such as HIV in a vulnerable population. The usual restraints on young people may be lacking, and lack of activities and leisure structures result in boredom and a search for excitement. They may be more likely to have sex at an

earlier age and with more partners. Where displaced people are living with host families, changes in sexual practices may be less significant, but overcrowding, enforced intimacy, and lack of privacy may affect sexual relationships (IRC 2001).

Women and girls are more susceptible to HIV due to gender discrimination and violence, their biology, insufficient access to HIV prevention information and services, inability to negotiate safer sex, and lack of female-controlled HIV prevention methods. AIDS is affecting women most severely in places where heterosexual sex is a dominant mode of HIV transmission, as is the case in sub-Saharan Africa and the Caribbean. Adult women in sub-Saharan Africa are up to 1.3 times more likely to be infected with HIV than their male counterparts are. This inequality is greatest among young women aged 15–24 years, who are approximately three times more likely to be infected than men of the same age (UNHCR 2005). Furthermore, women are more likely to take in orphans, provide home-based care, cultivate crops and seek other forms of income to sustain their families. The above factors may be more pronounced among refugee women and girls due to their vulnerability to sexual exploitation and violence throughout the displacement cycle. Policies and programmes must be prioritized and tailored to their needs as well as to the elderly who also have an increased burden (UNHCR 2005).

The age of a person is one factor that may influence sexual behaviour and the level of perceived risk of HIV infection. Men and women in their teens are at increased risk of HIV infection because they often engage in unprotected sexual intercourse (Hulton et al. 2000). Sometimes there is pressure for girls to prove their fertility before marriage. Similarly, boys may face pressure to prove manhood by impregnating a girl, or by having many sexual partners (Meekers et al. 1997; Nzioka 2001). Although the risk of HIV infection is high among young men and women, often they do not perceive their risk to be high (Prohaska et al. 1990; Cleland 1995). Unless the first intercourse is also the start of a mutually

monogamous relationship, early age at first sexual intercourse is associated with a long period of exposure to sexual activity, a higher propensity to accumulate sexual partners, and increased chances of contracting sexually transmitted diseases (Dixon-Muller et al. 1990; Konings et al. 1994).

Furthermore, young people affected by armed conflict, whether they are refugees or internally displaced persons (IDPs) living in rural or urban settings, are likely to be more at risk of developing sexual or reproductive health problems than young people who have not been displaced. They may have, in addition, the burden of the trauma of exile and the uncertainties inherent to their future. They may have experienced or witnessed rape, torture or killings and may have lost their “role models” from their families and the community. They may also find themselves living in a new society where social norms are very different from those that they grew up with and with which they were beginning to come to terms. The separation from one’s homeland, one’s elders and one’s traditional culture may create a situation in which risky behaviour is less condemned, thus increasing the risk of unplanned or unwanted pregnancy, sexually transmitted infections (STIs), drug abuse, violence, and such (Action for the Rights of Children 2001: 9).

2.2.4 DISPLACEMENT AND FORCED-SEX

At the end of 2003, 6.2 million refugees were living in protracted refugee situations in 38 countries in the world, mostly in Africa. Increasingly lengthy stays in camps, which are often located in unsafe areas and may be subject to cross-border attacks, result in declining international attention and resources, lack of privacy and livelihood opportunities, limited participation in decision-making processes, and restricted access to basic rights lead to a host of protection risks for women and girls. Sexual and gender-based violence (SGBV), including domestic violence and alcohol abuse, increases in such circumstances. Women and girls may

be attacked as they look for firewood or water outside the camp. Lack of, or biases in judicial systems and/or in traditional justice mechanisms often leave them with no redress or result in further stigmatization and discrimination.

As financial resources are depleted, adolescent girls are married off at increasingly younger ages. For some women and girls, survival sex becomes the only way to support themselves and their families. In addition, in situations of internal displacement, humanitarian access for women and girls is often more limited than it is for men. Internally displaced people (IDP), women and girls are also more likely to be caught in the midst of on-going conflict, with all its attendant risks, including repeated raids, abduction, forced military recruitment, and SGBV (UNHCR 2008).

Around the world, at least one in every three women has been beaten, coerced into sex, or otherwise abused in her lifetime. There are serious and potentially life threatening health outcomes with all types of sexual and gender-based violence. Among the fatal outcomes are homicide, suicide, maternal mortality, infant mortality and AIDS-related mortality (UNHCR 2003). Sexual and gender-based violence poses a huge threat to young people particularly girls both in settled situations and in times of insecurity: rape is most commonly referred to in this category, but also included are sexual threats, exploitation, humiliation, assaults, incest, domestic violence, and involuntary prostitution (Action for the Rights of Children 2001).

Between 50,000 and 64,000 internally displaced women in Sierra Leone reported experiencing sexual violence at the hands of armed combatants. Half of internally displaced women who had face-to-face contact with combatants reported experiencing sexual violence. Twenty-five percent of Azerbaijani women surveyed in 2000 by the US Centre for Disease Control acknowledged being forced to have sex; those at greatest risk were among

Azerbaijan's internally displaced populations. Survivors/victims of GBV are at high risk of severe and long-lasting health problems, including death from injuries or suicide. Health consequences can include unwanted pregnancy, unsafe self-induced abortion, infanticide, and sexually transmitted infections, including HIV/AIDS (IASC 2005).

War magnifies the everyday injustices that many women live with in peacetime. During periods of armed conflict, all forms of violence increase, particularly violence against women and girls. Women forced to flee their homes are often caught in a vicious cycle of abuse, exposed to sexual exploitation throughout the refugee experience. Sexual and gender-based violence ranges from harassment, domestic violence and rape to female genital mutilation and the withholding of food or other essentials unless paid for with sex. Unfortunately, camps may not always be safe havens for women. Separated from the security offered by extended networks of family and community, unaccompanied women and girls may be regarded by camp guards and male refugees as sexual prey (UNHCR 2006).

2.2.5 WOMEN'S AUTONOMY

The roles and responsibilities of men and women, and the relationships between them, are often dramatically altered when populations are displaced because of conflict. Nevertheless, both men and women continue to be influenced by the gender roles and relations that prevailed in their own communities. It is important to think about the differences in impact of displacement for men and for women. Women's reproductive health and vulnerability to STIs and HIV are greatly affected by men whose behaviour is influenced by their experiences during and after armed conflict. Men may be traumatized by torture or rape of their spouse or daughter(s), feel guilty because they failed to protect their family, or perhaps committed atrocities themselves. They may be depressed, lonely and bored. Men generally have few

emotional outlets, and lose their role in refugee camps while women's work of caring for children, cleaning, cooking and collecting fuel continues.

The impact of forced displacement on women and girls can be devastating. When families become separated this removes the support and protection the family used to provide. Family members may have to assume different roles and women and girls may become sole providers for their children/siblings. The situation is exacerbated by the lack of gender equality. Particular challenges can arise in a camp situation where forcibly displaced women and girls in urban areas often live in squalid conditions and lack access to fundamental services, such as education and health care. Without money to pay for rent or even food, women risk sexual exploitation by landlords and others. Some displaced women and girls are virtually imprisoned indoors, fearing arrest and deportation, or the wrath of their husband, father, male siblings or other relatives, if they leave their homes. If they are employed as domestic workers, they often face violence and/or exploitation at the hands of their employers and may be less well equipped than their male counterparts to resist such treatment (UNHCR 2008).

2.3 RELEVANT CO-FACTORS IN HIV INFECTIONS IN REFUGEE SITUATIONS

2.3.1 KNOWLEDGE AND ATTITUDES

HIV prevention and education campaigns in countries of asylum are often inaccessible to refugees who frequently speak different languages and have different cultural backgrounds (UNHCR 2005). Migrant populations may be particularly vulnerable to infectious diseases and often need special considerations in terms of health care. In particular, migrant populations can be at high risk of HIV infection, in part due to the lack of education about diseases and infections. One study evaluated knowledge, attitudes, and beliefs about HIV/AIDS as well as risk behaviour in the Sudanese immigrant and refugee population of Nebraska. The results demonstrated that a significant proportion of individuals from this

population are poorly educated about HIV infection, exhibit attitudes and beliefs that may increase their risk of disease acquisition, create barriers to HIV prevention and care, and engage in high-risk sexual behaviour (Marc et al. 2006).

2.3.2 ALCOHOL AND DRUG ABUSE

Alcohol use and abuse is directly linked to risky sexual behaviour and therefore an indirect contributor to HIV transmission (Fritz et al. 2002). The relationship between substance use and HIV transmission is complicated and needs further study in conflict-affected populations. Nevertheless, alcohol has been shown to increase risky sexual behaviour and HIV transmission in some conflict settings (UNHCR, WHO 2008). People with alcohol use disorders are more likely than the general population to contract HIV (human immunodeficiency virus). Similarly, people with HIV are more likely to abuse alcohol at some time during their lives. Alcohol abuse is associated with high-risk sexual behaviours (NIAAA 2002). An increase in alcohol and other substance use is among the many health and social issues associated with conflict and displacement.

Problems with substance abuse are prevalent in a variety of conflict-affected situations including, camps for refugees and internally displaced people. Combatants also often use psychoactive substances, particularly alcohol and psycho-stimulants. The reasons given for substance abuse among conflict-affected and displaced populations include self-medication for pain and mental health problems, the stress of adapting to life in a new environment and exposure to unfamiliar patterns of alcohol and other substance uses. A wide range of legal and illegal substances may be used, including alcohol, cannabis, hypno-sedatives, inhalants, opioids, and psycho-stimulants (UNHCR, WHO 2008).

Refugees living in camps often face a myriad of health and social problems including unemployment, poverty, violence, insecurity and lack of essential daily needs. Such problems can lead to frustration and depression and push some to engaging in substance abuse. For example, one study has found that recent job loss predicted increase in Khat use among newly arrived Somali refugees in England (ACMD 2005). According to a study done in Kakuma refugee camp, Kenya, refugees who engage in excessive consumption of alcohol are more likely to engage in risky sexual behaviour, including multiple sexual partners, transactional sex as well as engage in non-protected sex. They are also more likely to engage in gender-based sexual violence and crime including rape. All of the latter would increase the chances of the spread of HIV and STIs in such communities (Adelekan 2006).

Factors adduced for massive production of traditional liquors include economic, cultural, lack of alternative job, harsh weather conditions not conducive to farming, ready market, and ready availability of ingredients from food rations and ease of preparation. Consumption of these brews is associated with multiple physical, social and psychological complications. Excessive consumption also goes hand in hand with sex work, which involves unsafe sexual practices. HIV vulnerability is thus increased among women in particular but also in the society at large (Adelekan 2006).

2.3.3 MALE CIRCUMCISION

Three randomized clinical trials carried out in Kisumu, Kenya, and Rakai District, Uganda revealed at least a 5 % and 51% reduction in risk of acquiring HIV infection, respectively. These results support findings published in 2005 from the South Africa Orange Farm Intervention Trial, sponsored by the French National Agency for Research on AIDS, which demonstrated at least a 60% reduction in HIV infection among men who were circumcised (WHO, UNAIDS 2007). WHO and UNAIDS recognized male circumcision as an efficacious

intervention for the prevention of heterosexually acquired HIV infection in men. The Ethiopia Demographic and Health Survey in 2005 found that overall adult HIV prevalence was 1.4 percent, while the overall male circumcision rate was 92.5 percent. However, in the region of Gambella, the adult HIV prevalence was 6.0 percent, and the male circumcision rate was only 46.8 percent (USAID 2009). A number of observational studies indicate that circumcised men have lower levels of HIV infection than uncircumcised men, which indicate that the high adult HIV prevalence in the Gambella region could be also attributed to the low male circumcision rate.

2.3.4 HISTORY OF SEXUALLY TRANSMITTED INFECTIONS (STIS) AND HEALTH-SEEKING BEHAVIOUR

The link between protection of human rights and effective HIV/AIDS programmes is apparent. People will not seek HIV-related counselling, testing, treatment and care when lack of confidentiality, discrimination, denial of access to the asylum procedure, threat of Refoulement, restrictions to freedom of movement or other negative consequences (real or perceived) exist (Spiegel 2004). Ensuring human rights including the right to life, liberty, protection against arbitrary detention and physical violence such as rape and other forms of SGBV are very crucial for the prevention of HIV infection. It is important to ensure that everyone has equal access to these amenities and that persons with specific needs, such as single parents, separated children, the disabled, and older persons are not excluded from receiving such support. This means that humanitarian assistance must be planned from a protection perspective.

Of cardinal importance is the principle of non-Refoulement, which includes: not denying access to their territory to asylum-seekers who have arrived at their border (access to asylum); not intercepting asylum-seekers or refugees outside the territory of any country (e.g. the high seas) with a view to prevent them from seeking safety; not expelling or returning

asylum-seekers or refugees in any manner whatsoever to the frontiers of territories where his/her life or freedom would be threatened on account of his race, religion, nationality, membership of a particular social group or political opinion (Article 33 of the 1951 Convention) (UNHCR 2007).

A study done in Vietnam on sex-workers shows that women's decision to seek STI treatment and HIV testing is influenced by the complex interplay of personal risk perceptions, social relationships and community discourse. The women exhibited adequate knowledge of HIV while their knowledge of STIs was limited. They demonstrated high-risk perceptions of HIV, but they showed little concern for STIs. Most women sought treatment at pharmacies when they noticed symptoms of the genital tract. Their decision to seek care in health facilities and HIV testing was hampered by the high costs of treatment, judgmental attitudes of service providers, and a lack of information on testing services (Ratliff et al, 2007). Long distances to health services exerts a dual influence on its usage; as a disincentive to seeking care in the first place and as an actual obstacle to reaching care after a decision has been made to seek it (Thaddeus et al 1994).

2.4 ECONOMIC FACTORS

Various camps have been criticized on the way that specific forms of long-term encampment have led to denials of the several core human rights of refugees. International human rights law, specifically Article 12 of the International Covenant on Civil and Political Rights, enshrines the right to freedom of movement and residence within states. Though refugees do not necessarily become economic burdens to the host country, host states fear the economic burden of refugees. Therefore, refugees in many countries are not allowed to work. Freedom of movement is necessary to fulfil a host of fundamental civil, political, social and economic human rights. In most refugee camps, this right is being denied in long-term camps where the host state either in law and/or in practice arbitrarily denies such freedom by, for example,

using the system of exit passes, and leaving some refugees for decades in a de facto state of aid dependency and physical confinement.

At the beginning of August 2010, the Ethiopian government significantly relaxed the movement restrictions for Eritrean refugees in Ethiopia through the introduction of an 'out-of-camp' scheme. This new policy essentially allows Eritrean refugees to live outside camps and in any part of the country, provided that they are able to sustain themselves financially or have a close or distant relative or a friend in Ethiopia who commits to supporting them (UNHCR 2010). However, the 'out-of-camp' scheme does not apply to other refugees in Ethiopia other than the Eritrean refugees. The encampment policy does not allow refugees to work, and access to farmland is highly restricted. This makes them almost entirely dependent on external assistance for survival.

2.4.1 SEX WORK IN RELATION TO RISK PROFILE

Food insecurity, hunger, and unequal distribution of materials put women and girls at risk of exploitation and abuse, including coercion into transactional sex for survival. Displacement may cause families and communities to split apart, destroying community structures and support systems that traditionally serve to protect women and children. This breakdown of communities may also lead men and women to engage in risky sexual behaviour. Displaced women often suddenly find themselves as heads of households, responsible for providing for their families in addition to caring for the children as male family members are more likely to be involved in the conflict itself (Spiegel 2004).

A sex-worker can be female, male and transgender adults who receive money or goods in exchange for sexual services, regularly or occasionally, and either who may or may not

consciously define those activities as income generating (UNHCR 2010). Attracted by the concentration of potential clients with relatively higher incomes, namely relief agency employees, soldiers and, in some instances, refugees, female sex workers (FSW) often relocate to areas near refugee camps. As a result, infection rate of FSWs near refugee camps can equal those found in more urban areas. Sex workers have consistently been identified as populations with increased rates of HIV (Mengistu et al. 1990).

2.5 ACCESSIBILITY FACTORS

Far too often refugees face an untenable situation: they are no longer guaranteed the protection of their country of origin and do not receive assistance from host countries. Many host countries are already overburdened by the effect of HIV, and are often unable or unwilling to provide the HIV-related services refugees need and to which they have a right under international refugee and human rights law. Refugees often do not have access to HIV prevention commodities and programmes. Access to basic HIV-related care and support is also rarely given adequate attention. Despite improvements in the availability of antiretroviral therapy in low- and middle-income countries, very few refugees have access to it. Displacement of people from their country of origin has an enormous effect on their lives, as well as upon the lives of host communities. Increased risk of HIV infection and poor access to HIV-related prevention, treatment, care and support are an avoidable part of this effect (UNAIDS, UNHCR 2007). Furthermore, HIV spreads through the behaviour of individuals, but these behaviours are influenced by the social and cultural context. The impact of displacement may lead to behaviours that increase vulnerability to HIV, and affects the way that the community responds to the epidemic (IRC 2001).

2.5.1 USE OF MALE AND FEMALE CONDOMS

Although the female condom has been available for many years now, for numerous reasons, it has not been accepted and used on a wide scale basis in refugee camps as well as in

numerous other settings (UNHCR 2006). There is still much distrust and stigma associated with condoms in communities. Stories and hearsays of women dying because of male condoms lodged inside their vaginas, of men piercing the tip of condoms, of condoms breaking and of Western plots to lace condoms with HIV are common. The public health rationale for condom use in the refugee setting is compelling as refugees are particularly vulnerable to HIV and sexually transmitted infections (STIs). Social dislocation, economic deprivation, increased sexual violence, lack of access to medical services, increased transactional sex and increased contact with potentially infected populations put refugees, especially women, at heightened risk (Jacqueline 2005).

2.5.2 ACCESS TO BASIC HIV SERVICES

The various dimensions of autonomy, such as position in the household, financial independence, mobility and decision-making power regarding one's own healthcare, may all influence health facility use. In many countries, women cannot decide on their own to seek care, but have to seek permission from a husband or mother-in-law. Furthermore, women may lack control over material resources needed to pay for expenses, their mobility may be restricted or they may lack access to vehicles or even bicycles or donkeys (Thaddeus et al. 1994; Furuta et al. 2006).

HIV testing is important in preventing HIV transmission because it provides knowledge of one's infection status; after persons become aware that they are HIV-positive, most reduce their high-risk sexual behaviour (Marks et al. 2005). Countries of asylum are responsible for the protection and wellbeing of people living on their soil, including refugees. However, refugees have been consistently excluded from many host countries' HIV/AIDS National Strategic Plans and their needs have not been addressed in proposals submitted to major donors (Spiegel 2004). Their consistent exclusion is not only discriminatory but also

undermines effective HIV/AIDS prevention and care efforts since refugees and local communities interact daily. Furthermore, refugees are often hosted in remote and inaccessible areas, far from cities where HIV/AIDS programmes are most developed. Improving HIV/AIDS interventions in an integrated manner for the refugees and surrounding host population will invariably improve services for both communities (Spiegel 2004).

The above literature review shows that there are many factors that can explain increased risk of HIV infection within a refugee situation or among displaced communities. This study will consider several of these factors as relevant in comparing the high-risk potential and differential HIV-infection between the Agnuak and Nuer refugees in Fugnido Refugee Camp in Ethiopia.

CHAPTER THREE

3. RESEARCH DESIGN AND DATA COLLECTION

3.1 DESCRIPTION STUDY AREA

Fugnido refugee camp is located in Gog woreda (district). Gog is one of the eight woredas in the Gambella Region of Ethiopia. Gambella is also divided into 4 administrative zones. Gog is bordered on the south by the Southern Nations, Nationalities and People's Region, on the southwest by Sudan, on the west by Jor, on the north by Abobo, and on the east by the Godere special woreda. Gog is composed of 10 kebeles (neighbourhoods) of which Fugnido is one of them and is also the major town. The total population of people living in the Gog woreda is 16,823 of which 5,610 live in Fugnido town (Central Statistical Authority 2008).

Fugnido camp is approximately 115 km from Gambella town and 65 km from the Sudan-Ethiopia border. The three main ethnic groups, the Dinka, the Nuer and the Agnuak, have been allocated separate villages within the camp perimeter due to ethnic tensions among them. The camp is composed of 6 zones. The zones are further sub-divided into blocks, which are also further sub-divided into plots containing different households. The camp hosts a total population of 20,208 Sudanese refugees (UNHCR, 2009). The main ethnicities present in the camp are the Agnuak (53.15%) and Nuer (44.78%); Dinka (1.04%) and other ethnicities constituting (1.03%).

3.2 STUDY POPULATION

The study population included men and women refugees in Fugnido refugee camp in the Gambella region of Ethiopia. The study included respondents from the ages of 15 to 49 years from both Agnuak and Nuer ethnic communities who were residing in the selected households for the period of the data collection, which was from the latter part of June 2011 until the data collection was completed at the end of July 2011.

3.3 METHODS OF DATA COLLECTION

3.3.1 QUANTITATIVE METHODS - Interview administered questionnaire

Administratively, the camp is sub-divided into zones, blocks and plots. Both Agnuak and Nuer sites are divided into clearly defined zones, which are in turn divided into villages/clusters. Each village/cluster is then divided into blocks, which are in turn divided into residential plots, which are then allocated to one nuclear or extended family unit. Personal interviews with a standard structured questionnaire were administered to consenting participants from ages 15 to 49 years in the sampled households. Data was administered to respondents by interviewers, trained by the researcher of the study, based on a structured and pre-tested questionnaire.

Systematic cluster sampling was undertaken. The blocks were listed by alphabetical order, by village/cluster population and on the basis of this line listing; the study sample per cluster was selected by proportional population sampling (PPS). The block population for refugees was based on the latest UNHCR registration figures. Twelve (12) interviewers were recruited by the researcher from each of the two communities among the Agnuak and Nuer refugees and the principal investigator (i.e. the researcher of the study) trained all 24 interviewers. During the survey, interviewers proceeded to the most central position of the block and randomly selected the direction in which to proceed. Then all households in that direction up to the boundary of the block were counted and assigned a number (i.e. 01-20). The interviewers wrote the household number on pieces of paper, folded the papers and mixed them thoroughly before selecting one household number from the lot. The selected household was then the first study household in that direction to be interviewed.

The interviewers first sought permission from the household head (HH) to interview his/her relatives who fulfil the age and other criteria (male and female). When the consents were obtained, the HHs were then asked to line list all household members by name, age, sex and relationship to the HH. From each HH the interviewers were able to identify all persons aged 15-49 years, and after obtaining informed consent from each individual proceeded to conduct an interview in a private setting within the household. After interviewing all eligible household members the interviewers moved to the next most immediate household until the entire study population block was interviewed. When the block boundary was reached before the required block sample was attained, the interviewers returned to the central position of the block and identified another direction starting with a new household as explained above.

3.3.2 QUALITATIVE METHODS

Qualitative information was collected using field interviews, which were semi-structured, Focus Group Discussions (FGDs), and in-depth interviews with Key Informants (KIs). These are explained below. Each focus group consisted of 8 to 12 persons. A total of 7 FGDs were conducted and categorised as follows:

- Women association groups (one in each site)
- Refugee central committees (one in each site)
- Peer educators (one in each site)
- Host community women who live close to the refugees and practice sex-work

The key-informant interviews were conducted with the UNHCR Community Services Associate and the Administration for Refugees and Returnee Affairs Medical Director in both sites.

3.3.2.1 FIELD INTERVIEWS

From each refugee community, the researcher of the study recruited 24 interviewers. The interviewers were selected from among the community members. They had to be able to

speak, read and write English and the local language of the community they had been selected from (either Agnuak or Nuer). In addition, they had to have some experience working in HIV programmes for ease in understanding the content of the research questionnaires. The interviewers were paid a small stipend as lunch allowance for the number of days they took part in the research. Each group consisted of a team leader (also the main interviewer) and a translator. Two days training was given to the field staff in selection of individuals for the study, recruiting participants, conducting interviews, use of manuals and guidelines, and on the art of conducting discussions and interviews.

The principal investigator (i.e. the researcher of the study) and three-experienced field supervisors who had participated in similar studies led the training. The training reviewed the goals and objectives of the study, study populations of interest, eligibility criteria, ethical issues and considerations of data collection, interviewer techniques, field procedures, code of conduct for field workers and data collection tools. The trainees were divided between the Agnuak and Nuer communities according to their language skills and they practiced administration of the questionnaire using role-play exercises. Pre-testing by all the teams was done under supervision of the principal investigator and team leader.

3.3.2.2 SAMPLING METHOD

A cross-sectional behavioural study was conducted in the two sub-populations: youth and adult men and women refugees from and including the ages of 15 to 49 years from the Agnuak community, and men and women refugees in the same age categories from the Nuer community in Fugnido refugee camp. The study utilized a single stage cluster sampling to select the study participants in the two study domains. The households, which were the sampling units, were selected using random sampling. The sample size was estimated based on prevalence of 2 key behavioural indicators related to

(a) HIV/AIDS risks, namely:

1. 50% of youth aged 15-24 in the target populations reporting the use of a condom during last sexual intercourse with a non-regular sexual partner.
2. 50% of respondents between 15-24 years of age within the target population who both correctly identify ways of preventing the sexual transmission of HIV and who reject major misconceptions about HIV transmission or prevention.

(b) The following formula was used to determine the sample size: (Joseph Amon et al 2000).

$$n = D \frac{\left[\sqrt{2P(1-P)}Z_{1-\alpha} + \sqrt{P_1(1-P_1) + P_2(1-P_2)}Z_{1-\beta} \right]^2}{\Delta^2}$$

$$n = D \frac{\left[\sqrt{2P(1-P)}Z_{1-\alpha} + \sqrt{P_1(1-P_1) + P_2(1-P_2)}Z_{1-\beta} \right]^2}{\Delta^2}$$

Where:

D = design effect;

P1 = the estimated proportion at the time of the first survey;

P2 = the proportion at some future date such that the quantity (P2 - P1) is the size of the magnitude of change it is desired to be able to detect;

P = (P1 + P2) / 2;

$\Delta^2 = (P2 - P1)^2$

Z_{1-α} = the z-score corresponding to the probability with which it is desired to be able to conclude that an observed change of size (P2 - P1) would not have occurred by chance;

Z_{1-β} = the z-score corresponding to the degree of confidence with which it is desired to be certain of detecting a change of size (P2 - P1) if one actually occurred.

α = 0.05 (Z_{1-α} = 1.65) β = 0.20 (Z_{1-β} = 0.84)

(c) To determine the sample size needed to detect a change of 15 percentage points for several different indicators, the initial value of (P1) has been estimated at 50%. (This is a conservative estimate, which will yield the biggest sample size). The design effect was estimated at 2 because of the cluster design used to sample the target groups. The level of precision was set at 0.05. Application of the above formula yields a sample size of 200 boys and 267 girls aged 15-24 years from each group. Therefore, the overall sample size of persons between 15-49 years of age with 15% non-respondent rate added to the figure is 900 persons per survey.

3.4 OPERATIONALIZING VARIABLES

Although there are other documented cases of behavioural risk of HIV transmission, for the purpose of this specific research, the definition used to define “high risk behaviour” is: unprotected anal and vaginal intercourse with an infected sexual partner, having multiple sex partners, using non-sterile drug injection equipment, alcohol abuse and early initiation of sexual behaviour. As the research focuses more on behavioural factors, in-depth investigation has not been conducted on the biological risk factors; therefore, this should not be understood to mean biological factors are not important. The researcher appreciates the importance of measuring biomedical transmission factors on a regular basis, as biomedical transmission factors will continue to be important as the epidemic changes.

The dependent and independent variables are listed below under 3.4.1 and 3.4.2:

3.4.1 DEPENDENT VARIABLE:

- HIV high-risk behaviour

3.4.2 INDEPENDENT VARIABLES

Socio-cultural factors

- Ethnicity, religion and traditional beliefs
- Marital History
- Forced-sex

Co-factors for HIV transmission

- Knowledge, attitudes and opinions about HIV
- Male circumcision
- History of sexually transmitted infections (STI) and health seeking behaviour

Economic factors

- Commercial sex-work

Accessibility Factor

- Access to male and female condoms
- Access to basic HIV services

3.5 ENROLMENT CRITERIA

All selected household members aged 15-49 were eligible. Any individual who had not been living and sharing meals with the household for more than a fortnight was excluded.

3.5.1 HOUSEHOLD REPLACEMENT

A household was considered to be abandoned when neighbour(s) reported nobody had lived in that household for more than 1 month or inhabitants have repatriated. Abandoned households were skipped and therefore not replaced with immediate neighbouring houses. After the referendum there was an on-going repatriation of refugees to Sudan, some of the selected household occupants had repatriated before the day of the data collection. This has influenced the data collection in that some households were abandoned; therefore, the anticipated number of interviews was lower by 3.5%.

3.5.2 ABSENT POTENTIAL RESPONDENTS

Details of absent potential respondents were taken and attempts made to get in contact with them by booking an appointment at a suitable time of the day, tracing them to the market, hospital and workplaces. Those who could not be traced after three visits were recorded “absent” and not replaced.

3.5.3 REFUSAL TO PARTICIPATE

Those households (HHs) who the interviewers failed to convince to participate or if the selected respondent declined to participate, no attempt was made to select another one. The household or respondent was simply recorded as a “non-response”. Informed consent was obtained before the interviewing began. The survey supervisor was informed about those households and about respondents that had declined and visited them and confirmed the refusal. The supervisor conducted the interview to those HHs and respondents who agreed to be interviewed. Overall, only 0.2% of the interviewees refused to participate.

3.6 DATA MANAGEMENT AND ANALYSIS

3.6.1 DATA ENTRY

The quantitative data collected using the structured individual questionnaire was entered into the computer using CSPro. CSPro was chosen because it allowed the setting up of proper “skip rules” and “range checks” during data entry, so that errors during data entry were minimized.

3.6.2 DATA CLEANING

Editing of the data was done after data entry by running frequencies and checking for out of range responses.

3.6.3 DATA ANALYSIS

SPSS software was used to analyse the data. The Chi-squared test was used to determine associations between predictor variables and the outcome. Logistic regression analysis was used, and where the Chi-squared test was not valid; the Fisher's exact test was used. Adjusted Odds ratio (AOR) was reported together with their 95% confidence intervals (CI).

The analysis technique for the in-depth interview and focus group discussions (FGDs) was primarily an interpretive technique using observer impression.

3.7 ETHICAL CONSIDERATIONS

Consent to conduct the study was obtained from local community leaders and community members. Participation was strictly voluntary and measures were taken to assure the respect of autonomy, dignity and freedom of participants. During training, interviewers were trained on the importance of obtaining informed consent (written and orally), avoiding coercion and stopping the interview whenever the respondent felt uncomfortable. Except for the household demographic information form, names of respondents were not recorded anywhere on the questionnaire. The study was reviewed and approved by the relevant Higher Degrees Committee at the University of South Africa, Research and Ethics Committee, Administration for Refugees and Returnee Affairs (ARRA) and United Nations High Commissioner for Refugees (UNHCR) in Ethiopia.

3.7.1 RISK

There was a potential for minimal risk due to the content of some of the questions. This was minimized through sensitivity training for the interviewers. The respondents were informed before the interview that if they were uncomfortable answering these questions they could refuse to answer those questions or that they could stop the interview at any time. The interviewers were trained to make sure that individuals understood that households were selected at random and that they were not being singled out.

This study involved minimal risk of harm to the respondents and did not involve invasive procedures.

3.7.2 BENEFIT

There were no direct benefits or compensation given to the respondents for their participation. The indirect benefits for the participants will include ultimately improved prevention programmes through targeted training and behaviour change strategies.

3.7.3 INFORMED CONSENT

Oral informed consent was obtained from each HH to recruit his/her household members after the survey objectives, community benefits and rationale was explained to him/her.

3.7.4 CONFIDENTIALITY AND PRIVACY

One household data form was used per house to collect demographic information regarding a selected household. Confidentiality was explained before actual interviews occurred. Each household member was then identified by name, age, sex, relationship to HH and whether the

respondent had agreed to participate or not as well as whether the interview had been conducted or not. After all household members were interviewed, personal identifying marks were erased and the household data form kept at a place accessible only by the researcher. One form was used to collect information per respondent. No personal identifying marks were written on the form. All persons working on the project were trained and asked to maintain high level of confidentiality and to keep the study information private to the fullest extent allowable by law.

3.8 CAPACITY DEVELOPMENT

This study helped build local capacity by training interviewers on survey methods. In addition, it provided survey experience for them on-site during the study. Field team members were trained in interview techniques, as well as data organisation and management.

3.9 LIMITATIONS

Although this research was carefully executed, the researcher is still aware of its limitations and possible shortcomings. These are now explained below.

There was no data quality assurance of HIV testing program in the Gambella region where the study was conducted. Quality assurance measures ensures that HIV testing equipment and protocols are up to date and reliable by re-testing 10% of the HIV negative results and 100% of the positive results to confirm the test results conducted at the refugee health centres were correct. However, the regional laboratory in Gambella region did not have the quality assurance in place.

There is no temporal relationship, in cross-sectional studies like this one, to ascribe causations to the relationships found. Furthermore, after the referendum in South Sudan in January 2011, there was an on-going repatriation or returning back of refugees to the country of origin, Sudan. Hence, some of the selected household occupants had repatriated before the

day of the data collection. Therefore, the data collection was affected in that some households selected for the study were abandoned. Therefore, the anticipated number of interviews was lower per village/cluster in the camp by 3.5%.

A small percentage (0.2%) of interviewees felt that the contents of the questionnaire was too private to answer and therefore refused completely while others were willing to answer some of the questions and refused to answer those they were not comfortable with. However, careful measures were taken to overcome the presumed technical challenges of obtaining information from women and younger participants, given the power dynamics in the households, by conducting the interviews privately away from other family members.

Lastly, 4.7% of the participants interviewed fell on the few Dinka and Shiluk tribes residing within the Agnuak and Nuer sites who were not intended to be covered in the study. Despite these limitations and challenges however, the study data and methods of collection are reliable and the interpretation of the findings, valid.

CHAPTER FOUR

4. A QUANTITATIVE PRESENTATION OF THE DATA

4.1 SOCIO-DEMOGRAPHIC CHARACTERISTICS OF RESPONDENTS BY TRIBE

In total, 831 refugees participated in the study. Out of 100% of participants from the Agnuak tribe, 63.1% were female and 39.9% male; while 53.3% were male and 46.7% female from the Nuer tribe. More respondents were interviewed per cluster in the Agnuak site compared to the Nuer site, which resulted in a difference of 47 more individuals who participated from the Agnuak tribe compared to the Nuer tribe. There were some challenges that may have limited the number of participants in the Nuer site including, that tribes other than Nuer reside more in the Nuer site than in the Agnuak site, which resulted in selected households within the cluster fall on Dinka and Shiluk tribes residing within the Nuer sites.

A comparison of the demographic characteristics of the population of interest is outlined in Table 4.1 below:

Table 4.1: Demographic Characteristics

		Agnuak	Nuer	Total
		N (%)	N (%)	N (%)
Age category	Total	439(52.8)	392(47.2)	831(100)
	15-19	119(27.1)	87(22.2)	206(24.8)
	20-24	71(16.2)	50(12.8)	121(14.6)
	25-29	84(27.1)	95(24.2)	179(21.5)
	30-34	57(13)	42(10.7)	99(11.9)
	35-39	39(8.9)	60(15.3)	99(11.9)
	40-44	34(7.7)	31(7.9)	65(7.8)
	45-49	35(8.0)	27(6.9)	62(7.5)

Educational status	Total	439(100)	390(100)	829(100)
	Have never attended school	113(25.7)	71(18.2)	184(22.2)
	Did not complete primary education	60(13.7)	37(9.5)	97(11.7)
	Primary	149(33.9)	162(41.5)	311(37.5)
	Secondary	105(23.9)	115(29.5)	220(26.5)
	Post-secondary school	12(2.7)	5(1.3)	17(2.1)
Sex	Total	439(100)	392(100)	831(100)
	Male	162(36.9)	209(53.3)	371(44.6)
	Female	277(63.1)	183(46.7)	460(55.4)
Marital status	Total	432(100)	372(100)	804(100)
	Never married	101(23.4)	125(33.6)	226(28.1)
	Currently married and living with spouse	203(47.0)	162(43.5)	365(45.4)
	Currently married but not living with spouse	53(12.3)	52(14)	105(13.1)
	Divorced	12(2.8)	5(1.3)	17(2.1)
	Separated	29(6.7)	19(5.1)	48(6)
	Widow/widower	34(7.9)	9(2.4)	43(5.4)
Religion	Total	430(100)	390(100)	820(100)
	Catholic	77(17.9)	44(11.3)	121(14.8)
	Protestant	275(64)	322(82.6)	597(72.8)
	Moslem	7(1.6)	8(2.1)	15(1.8)
	Christian Orthodox	71(16.5)	16(4.1)	87(10.6)

Based on the combined figures for the two tribes, the largest proportion (24.8%) of the population was between the ages of 15-19 years. However, age category 25-29 years is slightly higher (24.2%) than the 15-19 years category (21.2%) in the Nuer community, while for the Agnuak community, the 15-19 years age category constituted the largest proportion (27.1%) compared with other age groups in this community. The 25-39 age group comprised the greater amount of respondents or participants in the study for the Nuer while, the 35-39 year age group had more Nuer respondents than the same age group for the Agnuak tribe.

This meant that there were more ‘mature’ adult participants in the study from the Nuer tribe than the Agnuak tribe.

4.2 COUNTRY OF BIRTH

One hundred percent of the respondents both in Agnuak and Nuer tribes who participated in the survey were nationals of what is now called the Republic of South Sudan. However, only 24.9% of the respondents were born in South Sudan while 75.1% of the respondents were born in Ethiopia. Of this, a greater number of Nuer people than the Agnuak were born in Ethiopia. (See Table 4.2 below)

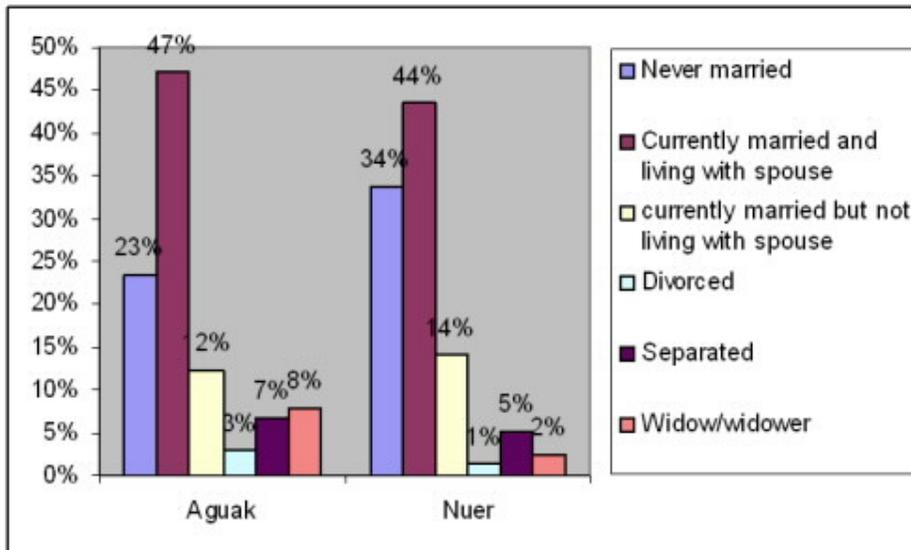
Table 4.2: Country of birth

	Agnuak			Nuer		
Characteristics	Male	Female	Total	Male	Female	Total
	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)
Country of Birth						
Sudan	134(35.8)	36(56.2)	170(100)	13(35.1)	24(64.9)	37(100)
Ethiopia	29(10.8)	240(89.2)	269(100)	196(55.2)	159(44.8)	355(100)

4.3 MARITAL STATUS

Many of the respondents were married, with over 43% in both Agnuak and Nuer refugee communities identifying themselves as being married and living with a spouse (47% among Agnuak and 44% among Nuer communities) (See Fig 4.1). Compared to those who had never married, those who have been/are married were significantly associated with having risky behaviour among the Agnuak compared to the Nuer. Among the Nuer, being married and living with a spouse and widowed/widower was significantly associated with risky behaviour, but in contrast to the Agnuak, being married, but not living with a spouse, divorced or separated, was not significantly associated with risky behaviour.

Figure 4.1: Marital Status



4.4 RELIGION

Religious affiliation among the study participants of the two communities was similar (See Fig. 4.2 & Fig. 4.3 below). Among the respondents from the Agvak community, 17.9% identified as Catholic, 64% identified as Protestant and 16.5% identified as Orthodox Christians and 1.6% Moslem. Among the Nuer respondents, 11.3% identified themselves as Catholic, while 82.6% identified as Protestant, 4.1% and 2.1% identified as Orthodox Christians and Moslem, respectively. For both tribes, respondents who were of the Orthodox Christian religion were significantly associated with risky behaviour compared to other religions. The Agvak were almost 4 times (OR=3.8, 95% CI [1.9-7.4] $p < 0.05$) more likely to practice risky behaviour compared to 30% (OR=0.3, 95% CI [0.1-0.9] $p < 0.05$) likelihood among the Nuer refugees in the total sample population.

Figure 4.2: Religious Affiliation among Agnuak refugees

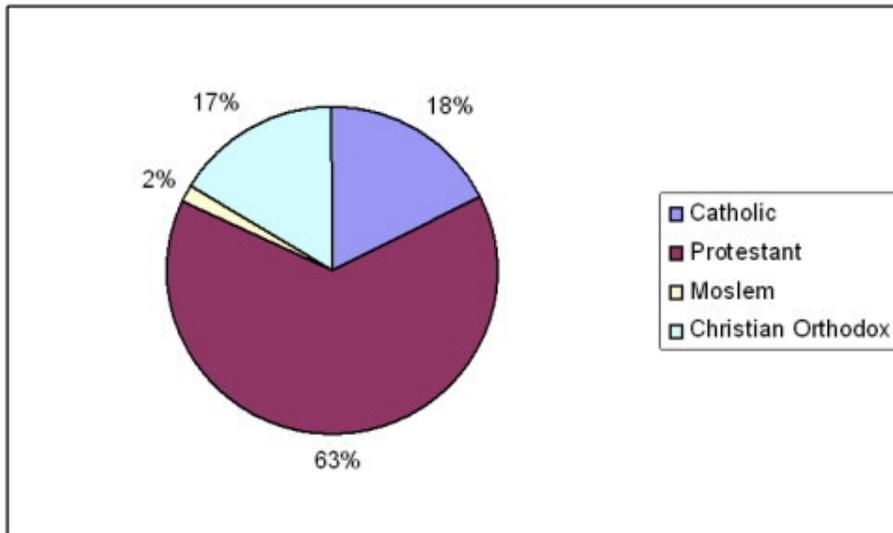
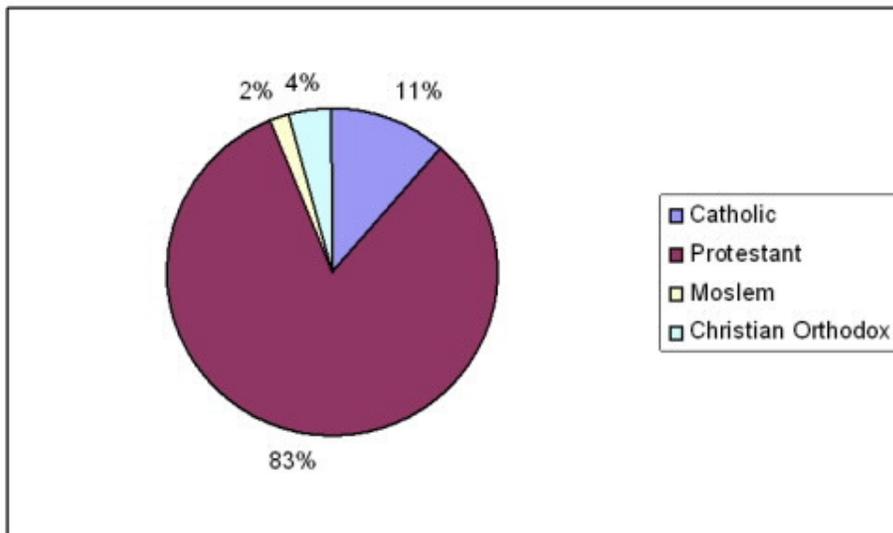


Figure 4.3: Religious Affiliation among Nuer refugees

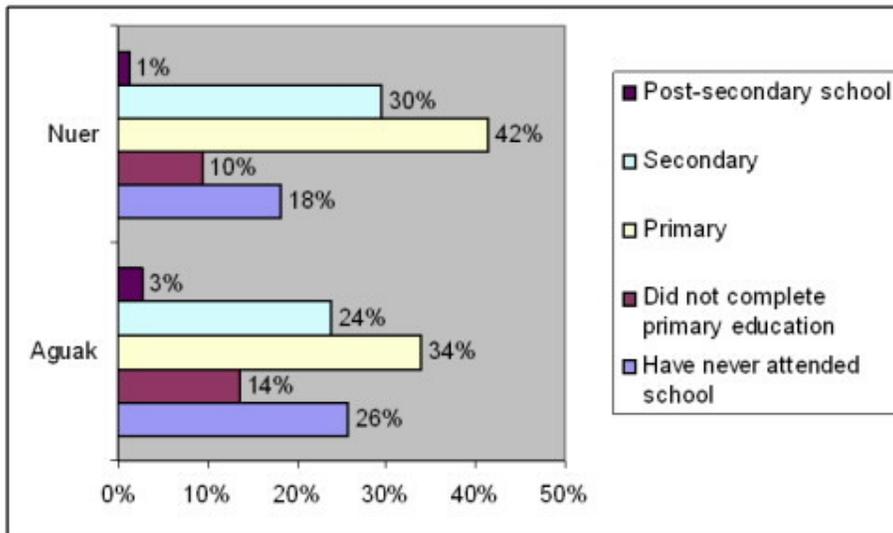


4.5 EDUCATIONAL STATUS

Educational attainment varied between the two populations. Among Agnuak refugee men and women, 13.7% did not complete primary education, in comparison to 9.5% for the Nuer. About 25.7% of respondents in the Agnuak community never attended school, while 33.9%

completed primary school, 23.9% completed secondary school, and 2.7% completed an education at the college level and above. In comparison, among the Nuer, 18.2% never attended school, 9.5% did not complete primary education, 41.5% completed primary school, and 29.5% completed secondary school education. About 1.3% attended college and university. Completing primary education as the highest level of education attained was significantly associated with risky behaviour among both Agnuak (OR=0.5, 95% CI [0.3-0.8] $p < 0.05$) and Nuer communities (OR=0.3, 95% CI [0.2-0.6] $p < 0.05$).

Figure 4.4: Comparing Educational Status among Agnuak and Nuer Refugees



4.6 SOURCE OF INCOME

Most Agnuak refugee participants (32.3%) reported earning their income through businesses/trading while 30.4% reported to have no income at all. 8.9% earn their income through crop production and 15.3% from humanitarian or development group activity and 8.9% from public services. Those who reported earning their income from pastoral labour were only 0.4% while the rest, 3.8% said other, which included private services, agricultural activities (digging, peasantry), traditional healing, peasantry, transport, and fishing.

The main sector where a great proportion (i.e. 31%) of income is earned in the Nuer villages is from humanitarian development group. Twenty-three point three percent (23.3%) reported having no income at all. 19.6% reported business to be their source of income. Among the Nuer, 4.7% reported earning their income through agriculture, 11.9% from public services and only 1.3% from pastoralism and 7.2% said other, which included private services, agricultural activities (digging, peasantry), traditional healing, peasantry, transport, and fishing.

Refugees whose source of income was business or humanitarian/ development group had a positive association with practicing risky behaviour among both Agnuak and Nuer refugees. However, Agnuak refugees whose source of income was agricultural or public service was positively associated with risky behaviour but not so for Nuer refugees with a similar source of income. Nuer pastoralists were positively associated with risky behaviour but not the Agnuak pastoralists. The Agnuak agriculturalists and Nuer pastoralists commonly leave the homestead area and are exposed to risky behaviour with casual or other partners or sex workers, which could happen without the knowledge of their spouse or family.

Table 4.3: Main sector income earned

	Agnuak	Nuer
Source of Income	N (%)	N (%)
No income	133(30.4)	90(23.3)
Agriculture	39(8.9)	18(4.7)
Business	141(32.3)	76(19.6)
Pastoralism	1(0.4)	5(1.3)
Private services	5(1.1)	9(2.3)
Public services	39(8.9)	46(11.9)
Humanitarian or development group	67(15.3)	120(31)
Other	12(2.7)	23(5.9)

4.7 LANGUAGE PROFICIENCY AND LITERACY

A majority of the Agnuak and Nuer community were able to read their respective languages (Among the Agnuak, 74.6% and among the Nuer community 96.6%). A higher proportion (i.e. 61.1%) of refugees in the Nuer community compared to the Agnuak community (38.9%) read Arabic. The Agnuak community's skill in reading English is about 32% while for the Nuer it is 43.6%. Relatively higher (25.4%) respondents from Nuer community read the Agnuak language easily and only 3.4% of the Agnuak community reads the Nuer language easily.

Table 4.4: Language proficiency and literacy

Variables	Agnuak			Nuer		
	Easy	Difficult	Do not read at all	Easy	Difficult	Do not read at all
	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)
Agnuak	206(74.6)	31(49.2)	202(41.1)	70(25.4)	32(50.8)	290(58.9)
Nuer	6(3.4)	18(21.7)	415(72.4)	169(96.6)	65(78.3)	158(27.6)
Arabic	7(38.9)	9(26.5)	423(54.3)	11(61.1)	25(73.5)	356(45.7)
English	107(49.3)	36(37.1)	296(57.3)	110(50.7)	61(62.9)	221(42.3)

4.8 SEXUAL BEHAVIOUR

Patterns in sexual behaviour and sexual partnerships were examined to provide background information. Sixty-eight percent (68%) of the respondents from both the Agnuak and the Nuer community had had sexual experience. As the data Table 4.5 below shows, among the 15-24 year old respondents in the Agnuak community, a larger proportion of females (68.5%) in comparison to males (31.5%) had had sex, while in the same age category among the Nuer community compared to the females (43.7%), males who had had sex were higher (56.3%). The high proportion among the Agnuak could be because there was a larger proportion of women than men in the sample population of the Agnuak (277 to 162) compared to the Nuer (183 to 209).

Table 4.5: Experience of sexual intercourse

Age category			Agnuak		Nuer	
			Male	Female	Male	Female
			N (%)	N (%)	N (%)	N (%)
15-24	Have you ever had sexual intercourse?	Yes, married/inherited and has had sex	23(27.4)	61(72.6)	5(21.7)	18(78.3)
		Yes, unmarried and not inherited and has had sex	11(45.8)	13(54.2)	22(88.0)	3(12.0)
		No, unmarried and has not ever had sex	39(49.4)	40(50.6)	48(55.2)	39(44.8)
	Total	73(39.0)	114(61.0)	75(55.6)	135(100)	
25-49	Have you ever had sexual intercourse?	Yes, married/inherited and has had sex	74(38.9)	116(61.1)	67(43.2)	88(56.8)
		Yes, unmarried and not inherited and has had sex	3(15.0)	17(85.0)	37(90.2)	4(9.8)
		No, unmarried and has not ever had sex	11(31.4)	24(68.6)	28(53.8)	24(46.2)
	Total	88(35.9)	157(64.1)	132(53.2)	248(100)	

4.9 KNOWLEDGE OF AND ACCESS TO CONDOM USE

The survey participants were asked about their knowledge on various HIV prevention methods including condom use. Over 74% of the participants have heard of condoms (57.6% among Agnuak, and 42.4% among Nuer).

Table 4.6: Awareness of condoms by age group

Variables	Agnuak				Nuer			
	Male		Female		Male		Female	
Ever heard of condom	Yes	No	Yes	No	Yes	No	Yes	No
	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)
15-24 years	56(36.6)	16(44.4)	97(63.4)	20(55.6)	51(52.6)	24(60.0)	46(47.4)	16(40.0)
25-49 years	71(35.3)	18(39.1)	130(64.7)	28(60.9)	91(55.8)	41(46.1)	72(44.2)	48(53.9)

Comparing males and females, a larger proportion of male respondents knew about condoms in both communities with the proportion being higher among Agnuak refugees (79%) compared to 54.6% among the Nuer male refugees. The proportion of people who reported ever using condoms was low, with only 43% of Agnuak refugee participants and 25.5% of Nuer participants reporting having used condoms. In the 25-49 year age group (Table 4.6), 130 females (82%) among Agnuak compared to only 72 (60%) among Nuer heard of condoms although, as explained above there were relatively more women in the sample population among the Agnuak compared to the Nuer.

Table 4.7: Condom use history by tribe

Variables	Agnuak				Nuer			
	Male		Female		Male		Female	
Ever used condom	Yes	No	Yes	No	Yes	No	Yes	No
	N (%)	N (%)	N (%)					
	27(41.5)	29(33.7)	38(58.5)	57(66.3)	39(59.1)	102(52.8)	27(40.9)	91(47.2)

Among respondents who have ever used condoms, knowledge on where to obtain condoms was high: 98.7% of the Agnuak refugee respondents and 98% of the Nuer respondents knew where to obtain condoms.

Table 4.8: Condom use at last sex with regular sex-partner

			Agnuak		Nuer	
Age			N (%)		N (%)	
			Male	Female	Male	Female
15-24	The last time you had sex with a regular sex partner, did you use a condom?	Yes	6(60.0)	4(40.0)	4(57.1)	3(42.9)
		No	4(28.6)	10(71.4)	4(33.3)	8(66.7)
		No answer	1(100.0)	0(0)	0(0)	0(0)
		Don't know	0(0)	0(0)	1(100.0)	0(0)
	Total		11(44.0)	14(56.0)	9(45.0)	11(55.0)
25-49	The last time you had sex with a regular sex partner, did you use a condom?	Yes	11(47.8)	12(52.2)	7(53.8)	6(46.2)
		No	5(27.8)	13(72.2)	49(54.4)	41(45.6)
		No answer	1(33.3)	2(66.7)	0(0)	3(100.0)
		Don't know			0(0)	1(100.0)
	Total		17(38.6)	27(61.4)	56(52.3)	51(47.7)

4.10 REGULAR SEX PARTNER

Most participants reported having a regular sex partner, with at least 75% of both males and females in both areas having a regular sex partner in the past 12 months. A larger proportion (47.8%) of the Agnuak respondents had used condoms the last time they had sex in comparison to respondents from the Nuer community (15.7%).

4.11 CASUAL SEX PARTNER (NOT REGULAR SEX PARTNER)

Respondents were also asked about non-regular partnerships, which included casual sex relationships. A very small proportion (12.6%) from the total participants was willing to answer the question when asked if they have had sex with a casual sex partner. Among the Agnuak refugee respondents, 34.1% reported to have had casual sex partners while in the Nuer 41.2% reported to have had sex with a casual partner in the past 12 months.

Table 4.9: Sex with a casual sex partner in the past 12 months by age group

			Agnuak		Nuer	
Age			N (%) N (%)		N (%) N (%)	
			Male	Female	Male	Female
15-24	Have you had sex with a casual partner in the past 12 months?	Yes	5(45.5)	6(54.5)	1(50)	1(50)
		No	16(76.2)	5(23.8)	1(50)	1(50)
	Total		21(65.6)	11(34.4)	2(50)	2(50)
25-49	Have you had sex with a casual partner in the past 12 months?	Yes	10(52.6)	9(47.4)	3(60)	2(40)
		No	16(43.2)	21(56.8)	5(62.5)	3(37.5)
	Total		26(46.4)	30(53.6)	8(61.5)	5(38.5)

Respondents were also asked about the number of casual sex partners they had in the past 12 months. The results are shown below in Table 4.10.

Table 4.10: Number of casual sex partner(s) in the last 12 months

		Agnuak		Nuer		
Age		N (%)		N (%)		
		Male	Female	Male	Female	
15-24	How many casual partners did you have sex within the last 12 months?	1	4(50)	4(50)	0(0.00)	0(0.00)
		2	2(66.7)	1(33.3)	1(100.0)	0(.00)
		Don't know	0(.00)	1(100.0)	0(.00)	1(100.0)
	Total	6(50.0)	6(50.0)	1(50.0)	1(50.0)	
25-49	How many casual partners did you have sex within the last 12 months?	1	5(55.6)	4(44.4)	2(66.7)	1(33.3)
		2	2(50.0)	2(50.0)	1(100.0)	0(00)
		3	0(00)	1(100.0)	0(0.00)	1(100.0)
		5	0(00)	2(100.0)	0(0.00)	0(0.00)
		7	1(100.0)	0(.00)	0(0.00)	0(0.00)
		No answer	1(100.0)	0(.00)	0(0.00)	0(0.00)
	Don't know	1(50.0)	1(50.0)	0(0.00)	0(0.00)	
Total	10	10	3	2		

4.12 CONDOM USE DURING LAST SEXUAL ENCOUNTER WITH CASUAL SEX PARTNER

When comparing the two community’s respondents, 62.3% of the Agnuak community respondents have used condoms while the Nuer community respondents reported 0% of condom use during the last sexual intercourse with a casual sex partner. Among the Agnuak, the 25-49 age groups, compared to the 15-24 age groups have a higher proportion (52.3%) of using condoms during last sexual encounter with a casual sex partner.

Table 4.11: Condom use during last sexual intercourse with casual sex partner

		Agnuak		Nuer	
		Sex		Sex	
Age		Male	Female	Male	Female
15-24	Yes	6(60.0)	4(40.0)	0(0.0)	1(100.0)
	No	4(28.6)	10(71.4)	4(80.0)	1(20.0)
	No answer	1(100.0)	0(0.0)	0(0.0)	0(0.0)
Total		11(44.0)	14(56.0)	4(66.7)	2(33.3)
25-49	Yes	11(47.8)	12(52.2)	0(0.0)	0(0.0)
	No	5(27.8)	13(72.2)	8(61.5)	5(38.5)
	No answer	0(0.0)	0(0.0)	0(0.0)	0(0.0)
	Don't know	1(33.3)	2(66.7)	2(100.0)	0(0.0)
Total		17(38.6)	27(61.4)	10(66.7)	5(33.3)

When Agnuak survey participants were asked why they did not use condoms, respondents mentioned that no condoms were available, not liking condoms, no availability of free condoms, and trusting their partner. Respondents in Nuer community gave various reasons for not using condoms during last sex with casual sex partner including there were no condoms available, they did not like condoms, they did not think they needed a condom, they trusted their partner, their partner objected and they wanted to have a baby.

4.13 FORCED SEX

Sexual violence is another important risk factor for HIV transmission; thus, dynamics related to this issue were explored. Among both the Agnuak and Nuer community's respondents, equal proportions of respondents (12.2%) have been forced to have sex. The data highlights that for the 15-24 year age group, among the Agnuak community, female respondents have been affected disproportionately; however, the data also shows that in both communities men also have been forced to have sex. Agnuak refugees who had experienced forced sex were 7 times (OR=7.3, 95% CI [2.9-18.8] $p < 0.05$) more likely to practice risky behaviour. On the contrary, there was no significant relationship between experiencing forced sex and practicing risky behaviour among the Nuer refugees.

Table 4.12: Forced sex history by age group

Variables	Agnuak				Nuer			
	Male		Female		Male		Female	
Ever been forced to have sex	Yes	No	Yes	No	Yes	No	Yes	No
	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)
15-24 years	3(21.4)	70(40)	11(78.6)	105(60)	0(0.00)	75(56.0)	2(100.0)	59(44.0)
25-49 years	19(47.5)	69(33.3)	21(52.5)	138(66.7)	8(66.7)	123(51.9)	4(33.3)	114(48.1)

4.14 TRANSACTIONAL SEX

Of those respondents who have ever had transactional sex in the Agnuak community, 17% had been involved in transactional sex while only 3.7% reported to have been involved in transactional sex in the Nuer community. Of those respondents both from Agnuak and Nuer who have been involved in transactional sex, 80.4% belong to the 25-49 year age group.

Table 4.13: Transactional sex history by age group

Have you ever had sex in exchange for money, a gift or a favour?		Agnuak		Nuer	
AGE		N (%)		N (%)	
		Male	Female	Male	Female
15-24	Yes	5(55.6)	4(44.4)	2(100.0)	0(0.0)
	No	34(38.2)	55(61.8)	22(55.0)	18(45.0)
Total		39(39.8)	59(60.2)	24(57.1)	18(42.9)
25-49	Yes	22(56.4)	17(43.6)	4(66.7)	2(33.3)
	No	47(32.4)	98(67.6)	89(53.3)	78(46.7)
Total		69(37.5)	115(62.5)	93(53.8)	80(46.2)

4.15 KNOWLEDGE, OPINION AND ATTITUDES TOWARDS HIV/AIDS

Knowledge of HIV/AIDS among both populations was also assessed, to identify areas where more information is needed. Individual knowledge about HIV and their beliefs was probed. Among the Agnuak 88% of respondents had heard of HIV/AIDS while among the Nuer 81% reported to have heard of HIV/AIDS. An interesting finding was that Nuer refugees who had knowledge of HIV were 2 times (OR=2.1, 95% CI [1.2-3.7] $p < 0.05$) more likely to have risky behaviour compared to those who had inadequate knowledge. Knowledge of HIV was not significantly associated with risky behaviour among the Agnuak refugees.

Table 4.14: Awareness of HIV and AIDS by age group

Agnuak				Nuer				
Variables	N (%)		N (%)		N (%)		N (%)	
	Male		Female		Male		Female	
Ever heard of HIV or AIDS	Yes	No	Yes	No	Yes	No	Yes	No
15-24	62(38)	10(41.7)	101(62)	14(58.3)	62(55.9)	12(54.5)	49(44.1)	10(45.5)
25-49	75(34.2)	13(46.4)	144(65.8)	15(53.6)	107(54.0)	25(47.2)	91(46.0)	28(52.8)

The respondents were also asked about how they received information on HIV/AIDS and how they would prefer to receive this information. Among the respondents in the Agnuak site, most received information from community health workers followed by the health facility, place of worship, peer outreach worker and school. The respondents in the Nuer villages identified community health workers, health facility, radio, school and VCT centre as the main sources.

Tables 4.15 and 4.16 highlight knowledge and misconceptions related to HIV/AIDS among both of the populations that participated in the survey.

Table 4.15: Knowledge about HIV transmission

Variables	Agnuak					Nuer			
		Male		Female		Male		Female	
		Yes	No	Yes	No	Yes	No	Yes	No
	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	
Protection by staying with uninfected faithful partner	15-24	59(38.3)	2(28.6)	95(61.7)	5(71.4)	55(57.3)	6(42.9)	41(42.7)	8(57.1)
	25-49	65(35.3)	10(43.5)	119(64.7)	13(56.5)	95(55.2)	13(50.0)	77(44.8)	13(50.0)
Protection by using condom every time correctly when having sexual intercourse	15-24	58(39.2)	2(28.6)	90(60.8)	5(71.4)	60(57.1)	1(25)	45(42.9)	3(75)
	25-49	67(35.8)	49(57.1)	120(64.2)	3(42.9)	100(55.6)	5(41.7)	80(44.4)	7(58.3)
Protection through abstinence from sex	15-24	49(37.4)	12(48)	82(62.6)	13(52)	60(58.8)	2(25.0)	42(41.2)	6(75.0)
	25-49	63(35)	11(44)	117(65)	14(56)	85(52.8)	15(57.7)	76(47.2)	11(42.3)
Sharing a toothbrush with an infected person is risky	15-24	48(38.4)	13(38.2)	77(61.6)	21(61.8)	44(50.0)	17(77.3)	44(50.0)	5(22.7)
	25-49	64(37.2)	11(32.4)	108(62.8)	23(67.6)	81(50.6)	26(68.4)	79(49.4)	12(31.6)
Anal sex with a male partner without a condom is risky	15-24	42(42.9)	10(32.3)	56(57.1)	21(67.7)	38(52.1)	18(69.2)	35(47.9)	8(30.8)
	25-49	51(39.8)	15(27.8)	77(60.2)	39(72.2)	63(52.1)	29(59.2)	58(47.9)	20(40.8)
Sharing needles may lead to infection	15-24	55(36.9)	5(50)	94(63.1)	5(50)	60(56.1)	3(50.0)	47(43.9)	3(50.0)
	25-49	67(34.7)	7(38.9)	126(65.3)	11(61.1)	100(54.3)	8(53.3)	84(45.7)	7(46.7)
Infected woman can infect	15-24	50(41.7)	12(29.3)	70(58.3)	29(70.7)	50(55.6)	8(47.1)	40(44.4)	9(52.9)
	25-49	64(36.8)	11(26.8)	110(63.2)	30(73.2)	80(52.3)	26(59.1)	73(47.7)	18(40.9)

an unborn child during pregnancy or delivery									
Breast feeding can transmit HIV if mother is infected	15-24	58(38.4)	4(36.4)	93(61.6)	7(63.6)	55(53.9)	4(57.)	47(46.1)	3(42.9)
	25-49	69(34.3)	6(40.0)	132(65.7)	9(60.0)	99(53.2)	6(60.0)	87(46.8)	4(40.0)

Table 4.16: Misconceptions about HIV/AIDS Transmission and Prevention

Variables	Agnuak					Nuer			
		Male		Female		Male		Female	
		Yes	No	Yes	No	Yes	No	Yes	No
		N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)
people can get HIV from mosquito bites	15-24	20(40.8)	101(46.3)	29(59.2)	117(53.7)	11(44.0)	49(58.3)	14(56.0)	35(41.7)
	25-49	27(30.7)	154(48.7)	61(69.3)	162(51.3)	14(25.5)	93(66.0)	41(74.5)	48(34.0)
People can get HIV by sharing food with an infected person	15-24	6(46.2)	56(37.6)	7(53.8)	93(62.4)	15(57.7)	44(53.7)	11(42.3)	38(46.3)
	25-49	15(39.5)	59(33.9)	23(60.5)	115(66.1)	28(48.3)	78(57.4)	30(51.7)	58(42.6)
A healthy	15-24	45(43.3)	15(27.3)	59(56.7)	40(72.7)	18(46.2)	39(60.0)	21(53.8)	26(40.0)
	25-49	41(36.3)	34(33.7)	72(63.7)	67(66.3)	38(47.5)	67(58.3)	42(52.5)	48(41.7)

looking									
person									
cannot									
be									
infected									
with HIV									

4.16 ACCEPTING ATTITUDES TOWARDS PEOPLE INFECTED WITH HIV/AIDS

The data suggest that majority of respondents did not have accepting attitudes towards people living with HIV (PLHIV). Interestingly, males tended to have more accepting attitudes towards PLHIV than females. Agnuak refugees who had a positive attitude towards HIV were 2 times (OR=2.1, 95% CI [1.3-3.7] $p < 0.05$) more likely to have risky behaviour compared to those who had a negative attitude towards HIV. In contrast, there was no significant association among the Nuer refugees with regard to association between attitude towards HIV and engaging in risky behaviour.

Table 4.17: Attitudes towards PLHIV

Agnuak					Nuer			
Male		Female			Male		Female	
Yes	No	Yes	No	Yes	No	Yes	No	
N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	N (%)	
If a family member is infected with HIV, it should remain a secret								
15-24	40(34.5)	22(50)	76(65.5)	22(50)	49(58.3)	14(48.3)	35(41.7)	15(51.7)
25-49	50(33.3)	25(36.8)	100(66.7)	43(63.2)	73(52.1)	32(56.1)	67(47.9)	25(43.9)
Would not care at home of a relative sick with AIDS								
15-24	57(39)	5(31.2)	89(61)	11(68.8)	56(55.4)	7(58.3)	45(44.6)	5(41.7)
25-49	65(33.9)	10(40)	127(66.1)	15(60)	91(53.8)	16(53.3)	78(46.2)	14(46.7)
HIV positive teacher should not be allowed to continue teaching								
15-24	60(38.7)	1(20)	95(61.3)	4(80)	55(59.1)	7(36.8)	38(40.9)	12(63.2)

25-49	68(34.7)	7(35.0)	128(65.3)	13(65)	85(59.4)	22(39.3)	58(40.6)	34(60.7)
Would not buy vegetables from an HIV positive shopkeeper								
15-24	61(39.1)	1(20)	95(60.9)	4(80)	33(50.0)	27(61.4)	33(50.0)	17(38.6)
25-49	66(34.4)	9(36)	126(65.6)	16(64)	63(59.4)	42(46.7)	43(40.6)	48(53.3)
Young adolescents should not be taught how to use condoms								
15-24	56(38.9)	6(37.5)	88(61.1)	10(62.5)	44(53.0)	19(63.3)	38(46.3)	11(36.7)
25-49	58(36.5)	15(26.8)	101(63.5)	41(73.2)	65(60.7)	39(45.3)	42(39.3)	47(54.7)

4.17 HIV TESTING AND COUNSELLING

Among the Agnuak community 29% female and 16% male respondents who participated in the survey had been screened for HIV and received their test results. Among the Nuer community, 19% female and 14.5% male respondents had been screened for HIV. Among both communities, female respondents used HIV testing and counselling services more than the male respondents. Access to HIV (VCT) services was significantly associated with risky behaviour among both Agnuak (OR=1.8, 95% CI [1.1-2.9] $p < 0.05$) and Nuer (OR=2.9, 95% CI [1.6-5.1] $p < 0.05$) refugees.

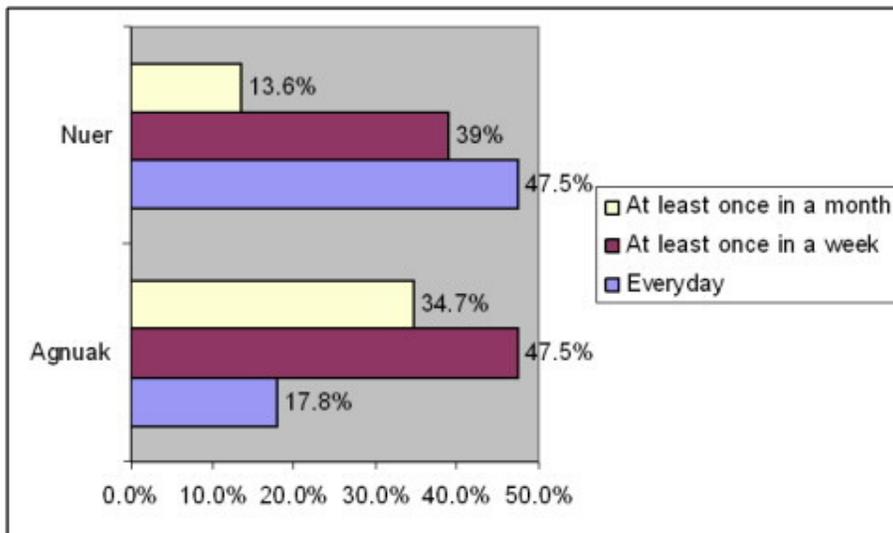
Table 4.18: Number of refugees tested for HIV and received result by tribe

	Agnuak		Nuer	
	Male	Female	Male	Female
Yes	59 (35.5)	107(64.5)	42(42.9)	56(57.1)
No	67(38.7)	106(61.3)	110(59.5)	75(40.5)
No answer	4(40.0)	6(60.0)	2(66.7)	1(33.3)
Don't know	4(20.0)	16(80.0)	3(75.0)	1(25.0)
Total	134(36.3)	235(63.7)	157(54.1)	133(45.9)

4.18 ALCOHOL AND SUBSTANCE ABUSE

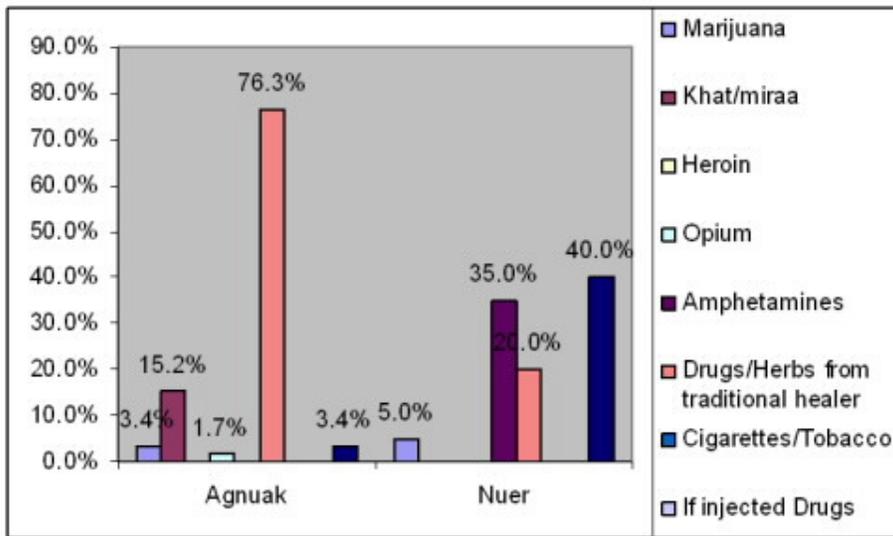
Alcohol abuse, which is considered an indirect risk factor for HIV transmission, was examined and both communities reported using alcohol frequently. The proportion of those who take alcohol every day is significantly higher (47.5%) in the Nuer community compared to the Agnuak community (17.8%). However, the proportion for alcohol consumption at least once in a week and once in a month is higher among the Agnuak respondents compared to the Nuer respondents (47.5% and 34.7% respectively).

Figure 4.5: Alcohol consumption by tribe



Similarly, substance abuse was examined and both communities reported to using Marijuana, khat/chat, heroin, opium, amphetamines, and herbs from the traditional healer as well as tobacco.

Figure 4.6: Substance use by tribe



4.19 CONCLUSION

The results above, showed mixed findings on the factors associated with high-risk behaviour among both Agnuak and Nuer refugees. Despite this, most variables showed higher risk behaviour among the Agnuak community than their Nuer counterparts as explained more in the discussion of chapter 5 that follows.

CHAPTER FIVE

5. A QUALITATIVE INTERPRETATION OF THE DATA AND FINDINGS

5.1 SOCIO-DEMOGRAPHIC AND CULTURAL CHARACTERISTICS OF RESPONDENTS BY TRIBE

The majority of the survey participants were born in Ethiopia (75%) while the rest (25%) were born in South Sudan. The sample population of the Agnuak had more female than male respondents while gender difference was more level for the Nuer sample. However, through the key informant interviews and focus group discussions, it was possible to understand that the Agnuak tribe is more open and interacts better with the host community than the Nuer tribe does. The latter are relatively “closed” possibly because they are living in a land predominantly occupied by Ethiopians from the Agnuak tribe. Openness and open interaction is believed to influence the cultural practices and habits as well as traditional beliefs and values of the Agnuak tribe. However, this needs further investigation in a follow up study so as to give a concrete explanation of how the Agnuak community might have been influenced by the host community in Fugnido town.

5.1.1 COUNTRY OF BIRTH

One hundred percent of the respondents both in the Agnuak and Nuer ethnic groupings who participated in the survey were nationals of what is now called, the Republic of South Sudan; however, only 24.9% of the respondents were born in South Sudan while 75.1% of the respondents were born mainly in Ethiopia. A breakdown of the data shows that more Agnuak male respondents were born in Sudan compared to the Agnuak female respondents, the majority of who in this study were born in Ethiopia. For the Nuer respondents, the majority of both male and female respondents were born in Ethiopia. The great upheavals and war in Sudan resulted in instability in the country which could be associated with high risk behaviour associated with HIV transmission and related STI malaise among the Agnuak refugees compared to the Nuer refugees.

There is limited epidemiological data on HIV in Southern Sudan due to the lack of a national HIV and AIDS surveillance system (Boo 2007). The genesis of HIV and AIDS in Southern Sudan cannot be traced through case reporting, due to the effects of the war and displacement in a setting devoid of HIV surveillance systems. The two protracted conflicts have resulted in vulnerability of the populations (in South Sudan and resultant refugees in Ethiopia) to the high risk of HIV infection, primarily due to disruption of societal structures, disintegration of family and household units and frequent mixing of sexual networks between high-risk groups, according to the BSS Southern Sudan Study (2010). Despite this fact, the HIV prevalence among the Nuer is relatively low compared to the Agnuak in Fugnido refugee camp. This finding may support the argument that being a refugee does not necessarily translate to increased HIV infection in the community. Among the Agnuak however, the resulting increased exposure to HIV infection may possibly be due to their having engaged in sexual behaviour within and outside of their community.

The Nuer refugees have not been able to integrate with the Ethiopian-Agnuak in the surrounding community like the Agnuak refugees have. While accepting that the refugee status should not be equated with an increased risk of contracting HIV, the nature of a refugee environment may, however, increase the vulnerability of people to becoming infected with the disease. The findings admit to the closed nature of the social structure of the Nuer as resulting in their relatively lower HIV prevalence than for the Agnuak members in the camp, and if they integrated with the host community then possibly the risk of HIV infection would probably be as high as that for the Agnuak refugees.

5.1.2 MARITAL STATUS

The study found that among the Agnuak tribe compared to the Nuer tribe, those who had never married and those who have been/are married were more significantly associated with having high risk behaviour. This discrepancy can be explained as unmarried and married persons' perception of risky behaviour as being low particularly with a non-regular partner, or becoming involved with more than one partner (infidelity in marriage and promiscuity), or the belief and knowledge of proper and consistent use of condom, being very high, so as to precipitate high risk behaviour. The level of fidelity and trust in relationships (married or unmarried) among the Nuer was reportedly higher than that of the Agnuak respondents. The data in Fig. 4.1 earlier also shows a streak of more conservatism among the Nuer tribe compared to the Agnuak tribe, with more reported divorces and separations, number of casual sex partners in the last 12 months (Table 4.10) and use of condoms with casual sex partner/s (Table 4.11) among the latter.

The question for further and future research is why is there different levels of conservativeness compared to more liberal/open-mindedness among the two tribes in relation to their refugee status?

5.1.3 RELIGION

In terms of religious affiliation, both communities are similar with the category, Protestant, being higher in number in both tribes than other religious denominations. This difference could be considered for any future programmatic work, and it is important for future faith-based interventions, including prevention programmes and or interventions such as couple counselling, youth programmes regarding sexual behaviour and abstinence, condom distribution and use, and family planning. Such information is also important in planning programmes focused on treatment, specifically home-based care and palliative care.

Interestingly, more of the respondents who were of the Orthodox religion were more significantly associated with risky behaviour compared to other non-Orthodox religions. The Agnuak tribe were almost 4 times (OR=3.8, 95% CI [1.9-7.4] $p < 0.05$) more likely to practice risky behaviour compared to 30% (OR=0.3, 95% CI [0.1-0.9] $p < 0.05$) likelihood among the Nuer tribe refugees. Orthodox Christianity is the oldest and most common religion since the 4th century in Ethiopia whereas in South Sudan Protestantism is the most common religion. This difference of religious association (relating to different values and therefore practices) might explain further, the levels of conservatism among both tribes' respondents. The fact that more Orthodox Christians are found in the Agnuak community than in the Nuer supports the finding from the Key Informant interview and Focus Group Discussion data and the argument in the first paragraph of this chapter, that the Agnuak communities are more open (including to sexual experience) within their host community than the Nuer tribe are. The host community are also mostly Orthodox Christian and this might influence the assimilation of the Agnuak refugees and their integration with the host community more easily, including their conversion to the host community's religion, than the Nuer tribe who are mostly Protestant and more closed in their interactions with the host community.

5.1.4 EDUCATIONAL STATUS

Overall, most (66.1%) of the survey respondents in the sample population had completed primary school level. However, literacy rates are generally low, particularly among Agnuak refugees. Attending primary education as the highest level of education attained was significantly associated with risky behaviour among both Agnuak (OR=0.5, 95% CI [0.3-0.8] $p < 0.05$) and Nuer communities (OR=0.3, 95% CI [0.2-0.6] $p < 0.05$). This implies that attaining some level of education does not guarantee that people living under extreme conditions such as in a refugee camp will be less likely to engage in risky behaviour. This could also mean that the refugee schools do not include reproductive health (RH) and HIV risk-behaviour as components in the curriculum at all educational levels and that it should,

for future research, be included and further observations made in terms of educational level attained and high-risk behaviour. Between both tribes, a higher educational attainment, e.g. secondary or post-secondary education was negatively associated with high-risk behaviour advancing the belief that education is fundamental to improved health and wellness.

5.1.5 LANGUAGE PROFICIENCY AND LITERACY

A majority of the Agnuak and Nuer were able to read their respective languages (among the Agnuak, 74.6% and among the Nuer, 96.6%). There is a higher literacy rate among the Nuer refugees compared to the Agnuak refugees, which is likely to be associated with the Nuer also being more conservative and less open compared to the Agnuak. HIV prevention and education messages in countries of asylum are often inaccessible to refugees who frequently speak different languages and have different cultural backgrounds (UNHCR 2005). The Agnuak are more open and responsive to the host community because they speak the same language of the surrounding Ethiopian-Agnuak community.

However, most information, education and communication (IEC) materials are in the national language of Amharic. A majority of the Agnuak and Nuer refugee tribes are able to read their respective languages and a relatively smaller proportion is able to read Arabic or English. HIV related messages have been produced by UNHCR in the respective language of the Agnuak and Nuer. There was no clear association between language proficiency and engagement in risky behaviour.

5.1.6 SEXUAL BEHAVIOUR

Patterns in sexual behaviour and sexual partnerships will help understand the dynamics in HIV programming. Among the 15-24 year old category of respondents, among the Agnuak, a

larger proportion of females (68.5%) in comparison to the male counterparts (31.5%) had had sex, while in the same age category among the Nuer, compared to the females (43.7%), males who had had sex were slightly higher (56.3%). While this finding supports the statement on the open and liberal character of the Agnuak compared to the more closed Nuer, it could also be attributed to the fact that there were more women than male respondents in the study sample for the Agnuak compared to the Nuer.

In the 15-24 year age category, it may seem that the usual restraints on young people may be lacking, such as family support and stable societal monitoring, which are present usually in stable and cemented communities. Furthermore, the lack of leisure activities and structures can result in boredom and the search for excitement among a refugee population. Younger people may be more likely to have sex at an earlier age and with more partners given such factors. Overcrowding, enforced intimacy, and lack of privacy in refugee camps affect sexual relationships (IRC 2001). There are several factors that lead to early sexual debut among younger refugees than the older age groups, which can be explored in further studies, apart from those visited in this study.

5.1.7 KNOWLEDGE OF AND ACCESS TO CONDOMS

Most people (74%) have heard about condoms in both communities but the data highlights that the proportion of people who reported ever using condoms was low, with only 43% of Agnuak refugee participants and 25.5% of Nuer refugee participants. Among respondents who have ever used condoms, knowledge on where to obtain condoms was high. This shows that community HIV awareness programmes have reached the majority of the population with information regarding where condoms could be obtained. However, the data also suggests that the Nuer members use condoms less than the Agnuak members do. Consistent condom use was not frequently observed among people who are in monogamous sexual

partnerships, particularly those who are faithful in marriage. Furthermore, the smaller proportion of females using condoms with their regular sex partners could be attributed to the dynamics of negotiation between a female and her partner, especially if she is married as reported in one of the FG discussions with married women.

A larger proportion (47.8%) of the Agnuak respondents had used condoms the last time they had sex with a regular sex partner in comparison to respondents from the Nuer community (15.7%). In the FGD conducted with married men and women separately for both communities, both groups expressed the need to reproduce and said “Condoms are for the young and unmarried. We got married because we like to have as many children as we can”. More than 62% of those (both unmarried and married) who had a casual sex partner in the last 12 months reported condom use at last sex with a casual sex partner. Among the Nuer, 0% of those who had a casual sex partner in the last 12 months reported condom use the last time they had sex. This finding is evidence of high-risk behaviour among the Nuer. However, the relatively low HIV prevalence among this community supports the finding that the conservative and ‘closed’ nature of the Nuer refugees is a contributory factor to the low likelihood of HIV infection among this community.

5.1.8 SEX PARTNERSHIPS

Casual sex partnerships are more common amongst the 25-49 year age group in both communities. Most respondents from both communities felt uncomfortable discussing their casual sex relationships; however, from the focus group discussions conducted separately with men, women and the youth in both ethnic groups, it was possible to understand that casual sex partnership is common and that women sometimes know about their husbands’ extramarital affairs but consider the act acceptable. Women in both sites during the FGD expressed that because the husbands paid a lot of dowry to the families of the women when

they first married them, they feel they are bought for a price and they are not their own but of their spouses for the husband to do what he chooses to do. Therefore, extramarital affairs and violence is very rampant and women are treated quite submissively. This is similar to findings in other studies that multiple partnerships for men may be tolerated, while women's infidelity is highly penalized, meaning that aspects of sexual conduct are beyond women's control in exposure to environmental risk factors (Caldwell et al. 1999; Fapohunda & Rutenberg 1999; Ingham & van Zessen 1997).

However, the FGDs revealed that among the Nuer, if casual sex partnerships take place, it commonly takes place within the Nuer community; whereas there is no ethnic or geographic boundary among the Agnuak with casual sex partners. This is because the Agnuak integrate better within the host community than the Nuer group because they are of the same tribe because historically Agnuak community settled on both sides of the Ethiopia-Sudan border thus we have Sudanese Agnuak and Ethiopian Agnuak. People of the Agnuak ethnic group, who are mostly farmers, live on both sides of the international border, in Pochalla County of Sudan and Gog Woreda of Ethiopia, and many Agnuak move across the border frequently, in both directions, to visit relatives, trade, work, and flee insecurity. Pochalla County was a contested area during Sudan's long civil war, and many Sudanese refugees returned to South Sudan from the refugee camp at Fugnido, Ethiopia after the Comprehensive Peace Agreement was signed in January 2005. Agnuak in Pochalla are also known to visit areas of Pibor County, especially at the peak of the dry season in February-March, and the Gog Woreda to raid cattle. The Agnuak refugee shelters are also located next to Fugnido town where a lot of people from host community live whereas the Nuer live about 7 km away from the town where there are hardly any people from the host community there.

Most men (both Agnuak and Nuer) justified the need to have a casual sex partner by saying "when our women give birth, we need to give them some time before we start having

intercourse with them; therefore, we need other women to meet casually and satisfy our desires”.

5.1.9 CONDOM USE DURING LAST SEXUAL ENCOUNTER WITH CASUAL SEX PARTNER

The reasons the married women gave for not having used a condom included trusting their spouse and not liking to use condoms. This raises concerns about people’s perceptions of risk, particularly with a non-regular partner or when involved with more than one partner. Issues related to condom negotiation may be one of several explanations relating to low condom use during casual sex among females. This issue should be explored in future studies.

5.2 WOMEN’S AUTONOMY

Social dislocation, economic deprivation, increased transactional sex and increased contact with potentially infected populations put refugees, especially women and young girls, at heightened risk (Jacqueline 2005). Among the category of 15-24 year old respondents in the Agnuak community, a larger proportion of females (68.5%) in comparison to males (31.5%) had had sex, while in the same age category among the Nuer community compared to the females (43.7), males who had had sex were slightly higher (56.3%). While the sample population of the Agnuak had more female than male respondents, and while gender difference was more level for the Nuer sample, the fact is that the figures for females who had had sex were relatively high for both sampled populations within this category. This relates to and is an indication of the harsh conditions under which the female refugee participants live and have to endure, which is relevant to the research question – ‘what socio-cultural, economic and behavioural factors account for the differential HIV statuses’.

A dearth of information exists on adult women's sexual activity in developing countries, however, low education attainment and greater number of lifetime sexual partners are factors most strongly associated with early sexual debut. Women with low educational levels may have poorer knowledge and less control over reproductive and sexual decision-making. As evidences suggest, while it may seem paradoxical that an early sexual debut is associated with low educational levels, higher levels of education may increase women's financial autonomy but not affect the high number of sexual partners. Higher levels of education may increase a woman's financial autonomy, allowing her to have greater independence in the number of intimate relationships. Women's economic constraints could also lead them to early sexual engagements in search of economic security. A wide range of social, cultural and economic factors shape the expectations on women's behaviour and their actual behaviour as partners, wives and mothers. These issues could further be investigated in other research focusing on early sexual debut and women's autonomy.

5.3 SOURCE OF INCOME

Refugees whose source of income was business or humanitarian/ development group (working for a humanitarian organization in the refugee camp and being a paid a monetary incentive based on an agreed scale for refugee workers) had a positive association with practicing risky behaviour among both Agnuak and Nuer refugees. This could be because those who were engaged in business or humanitarian group earned adequate income to buy sex from transactional sex workers and still meet their basic household needs. They may also buy a lot of alcohol with their spending power, which could be compromising their judgement resulting in engaging in risky behaviour.

5.4 FORCED SEX

Among both the Agnuak and Nuer communities, equal proportion of the respondents (12.2%) had been forced to have sex among the 15-24 age groups. Female respondents have been affected disproportionately in the Agnuak community. However, the data clearly suggests that not only women but also men experience forced sex. This supports the findings of other studies providing evidences that HIV transmission in Africa, which was previously attributed to heterosexual practices can also be due to mixed patterns of sexuality of the population including penile anal intercourse. After many years of denial, evidence is also emerging about men who have sex with men (MSM) in populations of East African countries. Therefore, in order to have effective remedy to the epidemic, this and other forms of alternative sexualities need to be identified and measured in refugee camps.

The focus group discussion and other informal discussions in the camp have also highlighted the gravity of the issue within the refugee community. Agnuak refugees who had experienced forced sex were 7 times (OR=7.3, 95% CI [2.9-18.8] $p < 0.05$) more likely to practice risky behaviour. On the contrary, there was no significant relationship between experiencing forced sex and practicing risky behaviour among the Nuer refugees. This could be due to a better societal 'post-rape' adjustment and coping mechanisms in the Nuer community than in the Agnuak community. It would seem that the Nuer community reach out to the survivors of rape and comfort them to the extent that they do not counter-react by engaging in risky behaviour. However, this needs further investigation to understand the "post-rape" coping mechanisms within the two tribes.

5.5 TRANSACTIONAL SEX

An interesting finding is that condom use was highest during transactional sex (83.3%). This could be a factor as to why condom use appears to be highest during last transactional sex, compared to condom use during last casual sex and during last regular sex. Based on the

FGD conducted with 8 host community sex workers living in Fugnido camp, refugees are also clients of the sex workers and the standard pay for a transactional sex is ETB150-200 (USD8-12). Of those respondents both from Agnuak and Nuer communities who have been involved in transactional sex, 80.4% belong to the 25-49 year age group. In this study, no refugee sex worker was identified for interviewing, but the KI informed that these do exist though they are few in number. The comparison between Agnuak and Nuer was not clear but the main difference was that the Agnuak sex workers would have clients from host community and refugees whereas the Nuer sex workers only had Nuer clients highlighting the closed nature of the community as well as the difficulty in their interacting freely with Agnuak.

The sex workers in Fugnido town highlighted the need for an intensive awareness raising campaign on condom use for the refugee men who are clients of sex workers because refugee clients do not usually agree to using condoms because they prefer the direct (skin to skin) contact and that the sex workers have a difficult time trying to convince them to use one. HIV spreads through the behaviour of individuals, but these behaviours are influenced by the social, economic and cultural context. The impact of displacement may lead to behaviours that increase vulnerability to HIV, and affects the way that the community responds to the epidemic (IRC 2001).

Furthermore, sex workers said they get the condoms themselves by buying them from the brothels they work in and that the refugees do not come with condoms because some do not want to be seen by other refugees while they pick up the condoms, therefore, issues of availability, accessibility and confidentiality or privacy when accessing condoms should be carefully addressed. Despite this behaviour, condoms are freely available in the refugee camps at designated outlets managed by the HIV Programme implementing agency.

5.6 KNOWLEDGE, OPINION AND ATTITUDES TOWARDS HIV/AIDS

Another interesting finding was that Nuer refugees who had knowledge of HIV were 2 times (OR=2.1, 95% CI [1.2-3.7] $p < 0.05$) more likely to have risky behaviour compared to those who had inadequate knowledge. Knowledge of HIV was not significantly associated with risky behaviour among the Agnuak refugees. This could be due to a negative perception about HIV prevention among those Nuer community members who had good knowledge about HIV/AIDS having low risk perception and may have tended to ignore the prevention methods. This finding also confirms findings of other studies that knowledge about HIV, without it being coupled with behaviour changes, does not reduce either HIV risk behaviour nor acquired infection.

5.7 ACCEPTING ATTITUDES TOWARDS PEOPLE INFECTED WITH HIV/AIDS

Interestingly, males tended to have more accepting attitudes towards PLHIV than females in the study. The finding which was more difficult to interpret is that, Agnuak refugees who had accepting attitude towards HIV were 2 times (OR=2.1, 95% CI [1.3-3.7] $p < 0.05$) more likely to have risky behaviour compared to those who had a negative attitude towards HIV. In contrast, there was no significant association among the Nuer refugees. Attitude towards HIV was the most significant predictor of willingness to embrace and not stigmatize and discriminate against PLHIV. Nevertheless, the finding that Agnuak refugees who had accepting attitudes towards HIV were 2 times more likely to have a risky behaviour is a very strong statement that indicates that more needs to be done to create awareness in the community, to promote, educate and support PLHIV but at the same time to sensitize the general community and increase awareness as well as to dispel negative attitudes towards PLHIV or those at the health centre who have negative perceptions about HIV.

5.8 HIV TESTING AND COUNSELLING

In Fugnido refugee camp, the United Nations refugee agency, UNHCR, together with the Government of Ethiopia is currently providing a comprehensive reproductive health programme that includes safe motherhood, including emergency obstetrics, family planning, the prevention and management of sexually transmitted infections and HIV/AIDS, and the prevention and management of gender-based violence in two separate camp health centres each located in the Agnuak and Nuer community sites with translators in Agnuak and Nuer languages, respectively. Additionally, within Fugnido refugee camp, there is a government-run host health centre, which both refugee communities and the surrounding host community have access to the health services there.

Only a small proportion of the survey participants in both researched communities went to a health facility for HIV testing. Among the few who had been tested from both communities, female respondents used HIV testing and counselling services more than the male respondents had. This finding also suggests that there is a gap in couple counselling and a need for more engagement of the men in the reproductive health of their partners, which is essential and needs to be strengthened through focused awareness raising interventions. Overall, more Agnuak refugees tested for HIV and received their test results than the Nuer refugees. This shows there is a higher tendency among the Agnuak to be open to using health services than among the Nuer. As the result showed, access to HIV (VCT) services was significantly associated with risky behaviour among both Agnuak (OR=1.8, 95% CI [1.1-2.9] $p < 0.05$) and Nuer (OR=2.9, 95% CI [1.6-5.1] $p < 0.05$) communities. The finding indicates that there is still more awareness raising work required to bring community members to the health facilities or for health centres to take the services to the community through mobile voluntary counselling and testing.

5.9 ALCOHOL AND SUBSTANCE ABUSE

The proportion of those who take alcohol every day is significantly higher (47.5%) in the Nuer community compared to the Agnuak community (17.8%). However, the proportion for alcohol consumption at least once in a week and once in a month is higher among the Agnuak respondents (47.5% and 34.7% respectively). In Sudanese refugee camps in northern Uganda in 1996, beer brewing and selling were common activities for young refugee women, most of who were separated or widowed due to war. Unprotected sex with multiple partners while under the influence of alcohol was common (Akwir et al. 1998). The finding from one FGD was that men and/or women were more likely to have unprotected sex while under the influence of alcohol. However, this study did not find a significant association with engagement in risky behaviour and alcohol intake and substance abuse among both Agnuak and Nuer possibly because the figures were already high.

5.10 CONCLUSION

To conclude the chapter, although the two target populations' socio-cultural, economic and behavioural factors are essentially similar, e.g. marital practices, ethnic origins, religion and traditional beliefs and practices, such as no circumcision of males as well as engaging in similar types of economic lifestyle such as pastoralism, there were significant differences in their HIV statuses. This chapter discussed, using an interpretive approach, the findings from the data presented in chapter 4.

It finds that risky sexual behaviour is more present among the Agnuak refugees than the Nuer refugees for example, having multiple sex partners and being involved in transactional sex. It notes a major reason why there are a significantly lower number of refugees among the Nuer community living with HIV as the fact that the Nuer are more closed and reserved to having sexual relations outside of their ethnic group and tends towards trusted partnerships, which contributes to their relatively lower HIV prevalence. However, compared to the Agnuak community, the finding of the research indicates that there is a very low condom use among

the Nuer community. On the contrary, the Agnuak community who regularly use condoms have higher HIV prevalence.

The findings support the view that while refugee status should not be equated with an increased risk of contracting HIV, the nature of a refugee environment may increase the vulnerability of people to the disease. Therefore, humanitarian workers and community partners need to collaborate to develop culturally acceptable ways of condom use that goes beyond traditional strategies of distributing condoms, but focus also on advising on correct and consistent use of condoms, understanding the socioeconomic context of the communities and the influence of culture and intervene strategically to curb the epidemic.

CHAPTER SIX

6. CONCLUDING REMARKS AND RECOMMENDATIONS

The success of any HIV/AIDS policy intervention depends on a broad and accurate understanding of the socio-economic, environmental, and cultural factors that contribute to the spread of the disease. In this study, the researcher set out to explore why a significant difference exists in known HIV infections between the two main refugee communities, the Agnuak and the Nuer, living in the same refugee camp in Fugnido, Ethiopia. It was observed that socio-economic, cultural, historical, and environmental factors do influence both the high prevalence of HIV infection in the Fugnido Refugee Camp as well as help further explain the marked differences in infection rates between the two main ethnic groups sheltered at Fugnido Refugee Camp, Ethiopia.

The little understanding of the contextual, social, and cultural factors that lead some communities among refugees to have a significantly higher prevalence and risk of HIV than others was an objective and purpose for undertaking the research. This apparent gap in knowledge of what underpins higher risk and higher HIV prevalence among refugee communities points to a clear need for more research of these contexts. Therefore, another purpose of this research was to explain the reasons why Agnuak refugees, coming from the same country and currently living in the same geographic location as that of the Nuer refugees, South Sudan, have significantly higher HIV prevalence between the two groups of refugees.

The study explored the various insights brought out in previous literature on refugee communities in chapter two, the literature review chapter. The literature highlighted that some types of conflicts and, or displacements have brought about much more particular risks of HIV infection and that refugees and other displaced populations are at increased risk of

contracting the virus during and after displacement due to an increase in sexual violence and abuse and in socio-economic vulnerability, particularly that of women and youth (Khaw et al. 2000, International Rescue Committee 2002, Smith 2002). Furthermore, The separation from one's homeland, one's elders, and one's traditional culture may create a situation in which risky behaviour is less condemned, thus increasing the risk of unplanned or unwanted pregnancy, sexually transmitted infections (STIs), drug abuse, violence, and such (Action for the Rights of Children 2001: 9).

In chapter four, which presented the data gathered, generally, the two target populations have some socio-economic and cultural similarities such as religious affiliation and traditional practices, and they both engage in similar economic livelihoods such as agro-pastoralism. Culturally, male circumcision is not practiced by both groups. Despite these and other similarities, however, the findings of the study indicate that the Agnuak were almost four times more likely to practice risky behaviour than the Nuer.

Factors associated with differences in risky behaviour between Agnuak and Nuer refugees were studied. These factors included co-factors for HIV transmission and accessibility factors apart from the socio-economic and cultural factors. It was also found that a higher level of education and better access to VCT services among the Nuer refugees compared to the Agnuak refugees were among the factors influencing the lower prevalence of HIV infection in the Nuer community.

The study revealed that a significantly higher number of Agnuak than Nuer engage in risky sexual behaviour like having multiple sex partners and being involved in transactional sex. The major reasons identified for low prevalence of HIV among the Nuer community was being culturally conservative thus not having sexual relations outside of their ethnic group,

having positive attitude towards being faithful to a sexual partner and monogamous marital relations. In contrast, condom use was found to be lower among the Nuer community than among the Agnuak. The study identified the reasons for low condom use among the Nuer to be attachment of condom use to distrust and unfaithfulness to a sexual partner. In this regard, the research indicates that humanitarian workers and community partners should collaborate to develop culturally acceptable ways of distributing condom focusing on dissemination of messages on correct and consistent use through understanding the socioeconomic context and cultural differences by involving the community.

The nature of a refugee environment increases the vulnerability of people to the disease. Cognisant of these differences in vulnerability, UNHCR and other humanitarian organisations working on reproductive health in the camp should pay special attention to the existing social and cultural differences during the design of appropriate HIV prevention intervention strategies. Meanwhile, in collaboration with the government of the hosting country, UNHCR and other humanitarian actors need to advocate for the promotion of supportive policies and regulations that protect refugees' rights and respects their societal values to practice their unique culture and religions by minimizing the risks of HIV infection.

Targeted and culturally sensitive reproductive health and HIV programmes could be designed and implemented by involving the refugee community. The design and implementation of IEC/BCC programmes should take into account the heterogeneous characteristics of the population that affect their sexual behaviours. Furthermore, humanitarian partners need to equally involve both men and women community members at all levels in the design and planning stages of intervention measures that would help to promote low risk behaviours. These could take the form of educational and information sessions while still being sensitive to the cultural dynamics of the communities.

A further recommendation is made to scale-up HIV and RH services at the camp health facility in order to increase accessibility and acceptability of services by the refugee communities and intensify overall community awareness raising activities to improve favourable health seeking behaviours. Improving access to confidential and private HIV prevention measures like counselling and testing, and proper use of condoms has significant impact on preventing the risks of HIV infection. This should therefore be given a proper focus. Heterosexual, homosexual as well as a mixed pattern of sexual practice within the refugee population should be identified and targeted with appropriate educative interventions.

Most HIV intervention programmes targeting populations living in a similar geographic location as the one undertaken in the study usually do not take into account the different socio-cultural and other factors affecting the level of risk and vulnerability. Similarly, interventions for reducing of the risks and vulnerability among the Agnuak and Nuer groups had been designed previously without considering these factors. Both groups had been exposed to similar approaches of intervention since the introduction of HIV preventative programmes in the camp. However, the difference in risk and vulnerability between the two groups has finally ended up in a disproportionately higher level of HIV prevalence among the one group.

This research indicates that the design of HIV intervention programmes should take into account the examination of the contextual social, economic, and cultural factors. The findings of this study will help programmes to endorse the call for a focus on socio-cultural "vulnerability risk assessment" before introducing HIV intervention programmes. HIV programmes should be able to support efforts that address different structural and enabling approaches in a different manner in communities having different risks and vulnerabilities. Moreover, unlike in the past, when HIV intervention programs in Fugnido Refugee Camp traditionally focused on individuals ,this study calls for a shift of focus to the whole

community perspective, to understand the broader setting within which individual risks exist. This change in focus will enable the address of social and contextual risk factors that predispose individuals and communities to HIV, and to develop more effective intervention programmes that fundamentally reduces the vulnerability of the community to HIV in general.

LIST OF REFERENCES

- Action for the Rights of Children. (2001). *Critical Issues Sexual and Reproductive Health*.
- Adelekan, M. (2006). *Rapid assessment of substance use and HIV vulnerability in Kakuma refugee camp and surrounding community*. Kakuma, Kenya: Joint UNHCR/WHO project on rapid assessment of substance use in conflict-affected and displaced populations.
- Advisory Council on the Misuse of Drugs (ACMD), (2005). *Khat (Qat): Assessment of Risk to the Individual and Communities in the UK*.
- Ahlburg, D. A., Jensen, E. R. & Perez, A. E. (1997). *Determinants of extramarital sex in the Philippines*. *Hlth Trans. Rev.* 7 (supplement), pp. 467–479.
- Marc .T, Lynett .S, Katherine J. & Susan . S (2006). *HIV Education Needs Among Sudanese Immigrants and Refugees in the Midwestern United States, AIDS and Behaviour*, Vol. 10. Number 3.
- Akwir, M., Arkangel A, Moluma D, Idro JW, Homby J. (1998). *Vulnerability of refugee women to HIV/AIDS infection in refugee camps in northern Uganda*. XII World AIDS Conference, Geneva, abstract 44209].
- Anarfi, J. K. (1993). *Sexuality, migration and AIDS in Ghana: a socio-behavioural study*. *Hlth Trans. Rev.* 3 (supplement).
- Blanc, A., Wolf, B., Gage, A., Ezeh, A., Neema, S. & Ssekamatte-Ssebulba, J. (1996). *Negotiating Reproductive Outcomes in Uganda*. Macro International, Inc., Calverton: MD.
- Boo, T. (2007). *The HIV Situation in Southern Sudan: An Overview of Available Data with Comments upon Programme Implications*.
- Caldwell, J. C., Orubuloye, I. O. & Caldwell, P. (1999). *Obstacles to behavioural change to lessen the risk of HIV infection in the African AIDS epidemic: Nigerian research*. *Hlth Trans. Rev.* 9, 113–124.
- Central Statistical Agency [Ethiopia]., ORC Macro. (2005). *Ethiopia Demographic and Health Survey*. Addis Ababa, Ethiopia and Calverton, Maryland, USA: Central Statistical Agency and ORC Macro.
- Central Statistical Authority (CSA)., United Nations Population Fund (UNFPA). (2008). *Ethiopia, Summary and Statistical Report of the 2007 Population and Housing Census*.
- Cleland, J. (1995). *Risk perception and behavioural change*. In: *Sexual Behaviour and AIDS in the Developing World*, pp. 157–192. Edited by J. Cleland & B. Ferry. Taylor and Francis, London.
- Cohen, B. & Trussell, J. (eds.). (1996). *Preventing and Mitigating AIDS in Sub-Saharan Africa: Research and Data Priorities for the Social and Behavioural Sciences*. Washington, DC.: National Academy Press.

- Collins, S. (1996). *Ignoring the host: the impact of recent refugee crises on health infrastructure in Ngara district, Tanzania*. Amsterdam: Médecins Sans Frontières 1996: 1–89.
- Convention Relating to the Status of Refugees*. (1951). Adopted 28 July 1951, entered into force 21 April 1954, 189 U.N.T.S. 137
- CRC General Comment 3. (Thirty-second session, 2003): ‘HIV/AIDS and the Rights of the Child’, A/59/41 (2004) 89 at paras. 30 and 38.
- Dixon-Muller, R. & Wasserheit, J. (1990). *The Culture of Silence: Reproductive Tract Infections among women in the Third World*. International Women’s Health Coalition, New York.
- Dowell, S.F. (1995). *Journal of the American Medical Association*, Vol. 273 (22), June 14, 1995: 18-2-1806.
- Fapohunda, B.M & Rutenberg, N. (1999). *Expanding Men's Participation in Reproductive Health in Kenya*. Nairobi, Kenya: African Population Policy Research Centre.
- Fritz, K. E, Woelk G.B, Basset M.T. et al. (2002) *Alcohol use, sexual risk behavior and HIV infection among men attending beer halls in Harare, Zimbabwe*. AIDS and Behaviour, 6(3):221-223.
- Furuta, M. & Salway, S. (2006) *Women's position within the household as a determinant of maternal health care use in Nepal*. Int Fam Plan Perspect. 2006;32:17–27.
- Gaje, A. J. & Njogu W. (1996). *Gender Inequalities and Demographic Behaviour: Ghana and Kenya*. The Population Council, New York.
- Goyens, P., Porignon, D., Soron’gane, E.M., Tonglet, R., Hennart ,P., Vis, H.L. (1996). *Humanitarian aid and health services in Eastern Kivu, Zaïre: collaboration or competition?* J Refugee Stud 1996; 9: 268–80.
- Hankins, C.A, Friedman,S.R, Zafar,T. and Strathdee, S.A. (2002).*Transmission and Prevention of HIV and Sexually Transmitted infections in War Settings: Implications for current and Future Armed Conflicts*. Aids 16(17): 2245-52.
- Harvey,P. (2004). *HIV/AIDS and humanitarian action, Humanitarian Policy Group Briefing*, Number 14, (April 2004).
- Hulton, L. A., Cullen, R. & Khalonkho, W. S. (2000). *Perceptions of the risks of sexual activity and their consequences among Ugandan adolescents*. Stud. Fam. Plann. 31, 35–46.
- Humanitarian policy Group. (2004). *Measuring the impact of humanitarian aid: A review of current practice*. HPG Report 17, ODI.
- Hynes, M., Sheik, M., Wilson, H., Spiegel ,P. (2002). *Reproductive health indicators and outcomes among refugee and internally displaced persons in post-emergency phase camps*. Journal of the American Medical Association, 288 (5): 595-603.

- Ingham, R. & van Zessen, G. (1997). *Towards an alternative model of sexual behaviour: from individual properties to interactional processes*. In: *Sexual Interactions and HIV Risk: New Conceptual Perspectives in European Research*. pp. 83–99. London.
- Inter-agency Working Group. (2010). *Interagency Field-manual on Reproductive health in humanitarian Settings*.
- Inter-Agency Standing Committee (2005). *Guidelines for Gender-based Violence Interventions in Humanitarian Settings, Focusing on Prevention of and Response to Sexual Violence in Emergencies*.
- International Rescue Committee. (2002). *Protecting the Future: A Guide to Incorporating HIV Prevention and Care in Refugee and Post-conflict Settings*. Kumarian Press, New York.
- Jacqueline, Papo. (2005). *Promoting the Female condom to Refugees*.
- Jessica, H., Richard, L. & Rogers. (2009). *Cultural Factors Influencing HIV-Related Attitudes and Behaviour in the Third World: Ethnicity and Religion in Guyana Race/Ethnicity: Multidisciplinary Global Perspectives - Volume 3, Number 1, Autumn 2009*, pp. 97-114.
- Khaw, A, Salama, P., Burkholder, B.and Dondero T. (2000). *HIV risk and prevention in emergency-affected populations: A review of Disasters 24(3):181-97*.
- Konings, E., Blattner, W. A., Levin, A., Brubaker, G., Sisio, Z., Shao, J., Goedert, J. J.& Anderson, R. M. (1994). *Sexual behaviour survey in a rural area of northwest Tanzania*. AIDS 8, 987–993.
- Lawday, A. (2002). *HIV and Conflict: A Double Emergency*, Save the Children, London.
- Marion, C. and Maurice, H.(2010). *Forced Migration Review: HIV/AIDS, Security and Conflict: Making the Connections*.
- Marks, G., Crepaz, N., Senterfitt, J. W., & Janssen, R. S. (2005). *Meta-analysis of high-risk sexual behaviour in persons aware and unaware they are infected with HIV in the United States: Implications for HIV prevention programs*. JAIDS Journal of Acquired Immune Deficiency Syndromes, 39, 446-453.
- Massimo,L., Spiegel, P. , Ciantia,F. (2005). *AIDS, Conflict and the Media in Africa: Risks in Reporting Bad Data Badly*.
- Meekers, D. & Calvès, A.(1997). *Main girlfriends, girlfriends, marriage, and money: the social context of HIV risk behaviour in sub-Saharan Africa*. Hlth Trans. Rev. 7 (supplement), 361–375.
- Mengistu, M.and Khodakevich, L. (1990). *Sexual Behaviour s and some social features of female sex workers in the city of Addis Ababa, Ethiopia*, Journal of health Development 4:183-90.
- Mufune, P., Fox, T., LeBeau, D. (2000). *Poverty, alcohol, migrancy and AIDS: Social factors that facilitate HIV/AIDS transmission in Rural Northern Namibia*. XIII International Conference on AIDS, Durban, July 2000 [abstract WePeD4613].

- Nzioka, C. (1996). *Lay perceptions of risk of HIV infection and the social construction of safer sex: some experiences from Kenya*. AIDS Care 8, 565–579.
- Nzioka, C. (2001). *Perspectives of adolescent boys on the risks of unwanted pregnancy and sexually transmitted infections: Kenya*. Reprod. Hlth Matters 9, 108–117.
- Ngo, A.D., Ratliff, E.A., McCurdy, S.A., Ross, M.W., Markham, C., Pham, H.T. (2007). *Health-seeking behaviour for sexually transmitted infections and HIV testing among female sex workers in Vietnam*.
- OAU/AU (1969). *Convention Governing the Specific Aspects of Refugee Problems in Africa*. Addis Ababa, 10 September 1969, United Nations, Treaty Series, vol. 1001, p. 45.
- Orach, G.C. & De Brouwere, (2006). *Integrating refugee and host health services in West Nile districts, Uganda*. Health Policy and Planning 21, 1, 53–64.
- Orach, G.C. & De Brouwere. (2004). *Post-emergency health services for refugee and host populations in Uganda, 1999–2002*. The Lancet 364: 611–12.
- O Shisana, N., Zungu-Dirwayi, Y., Toefy, L., Simbayi, C., Malik, S., Zuma, K. (2004). *Marital status and risk of HIV infection in South Africa*, July, Vol. 94, No. 7 SAMJ).
- Prohaska, T. R., Albrecht, G., Levy, J. A., Surgue, N. & Kim, J. (1990). *Determinants of self-perceived risk for AIDS*. J. Hlth social Behav. 31, 384–394.
- Prunier, G. (1995). *The Rwanda Crisis, 1959-1994: a history of genocide*.
- Pottier, J. (1996). “Why aid agencies need better understanding of the communities they assist”, in *Disasters*. Vol. 20(4), December 1996.
- Salama, P., Laurence, B., Nolan, M.L. (1999). *Health and human rights in contemporary humanitarian crises: is Kosovo more important than Sierra Leone?* BMJ 1999, 319:1569–1571.
- Smith, A. (2002). *HIV/AIDS and Emergencies: Analysis and Recommendations for Practice*. Network HPN paper 38, Overseas Development Institute, London
- Southern Sudan AIDS Commission, United Nations High Commissioner for Refugees, World Bank, Inter-Governmental Authority on Development. (2010). *HIV Behavioural Surveillance Survey in Kajo Keji County, Central Equatorial State, Southern Sudan*.
- Spiegel, P. (2004). *HIV/AIDS among conflict-affected and displaced populations: dispelling myths and taking action*.
- Suckling, A. (2005). *Gender in emergencies*.
- Thaddeus, S., Maine, D. (1994). *Too far to walk: maternal mortality in context*. Soc Sci Med. 1994;38:1091–1110. doi: 10.1016/0277-9536(94)90226-7.
- The Office of the United Nations High Commissioner for Human Rights (OHCHR). (1951). *‘The Status of Refugees and Stateless Persons convened under General Assembly resolution 429 (V) of 14, Chapter 1, Article 1, Section 2’*.

- Tompkins, M. , Smith, L. , Jones, K. , Swindells, S. (2006).*HIV Education Needs Among Sudanese Immigrants and Refugees in the Midwestern United States*, February 2006, *AIDS and Behaviour* (journal article) Volume 10. Number 3/May, 2006).
- Toole MJ, Waldman RJ. Prevention of excess mortality in refugee and displaced populations in developing countries. *JAMA* 1990; 263: 3296–302. [Online article?]
- Toole MJ, Waldman RJ. Refugees and displaced persons. War, hunger, and public health. *JAMA* 1993; 270: 600–05. [Online article?]
- UNAIDS, United Nations High Commissioner for Refugees.(2007). *HIV and Refugees, Policy Brief*. UNAIDS, UNHCR, January 2007.
- UNAIDS & World Health Organization. (2007).*Technical Consultation on Male Circumcision and HIV Prevention*.
- United Nations High Commissioner for Refugees 2006. *The State of the World's Refugees*.
- United Nations High Commissioner for Refugees. (2010). *HIV and sex work in refugee situations: A practical guide to launching interventions an issue affecting women, men, girls, boys and communities*.
- United Nations High Commissioner for Refugees, Ethiopia.(2009).*Refugee Registration Database (ProGress)*. December 2009.
- United Nations High Commissioner for Refugees, Ethiopia. (2010). *Refugee Registration Database (ProGress)*. May 2010.
- United Nations High Commissioner for Refugees, IGAD, Southern Sudan AIDS Commission.(2010). *HIV Behavioural Surveillance Survey in Kajo Keji County, Central Equatorial State, Southern Sudan*
- United Nations High Commissioner for Refugees. (2008). *Handbook for the Protection of Women and Girls*, January 2008
- United Nations High Commissioner for Refugees. (2002). *HIV/AIDS and Refugees: UNHCR's Strategic Plan 2002-2004*.
- United Nations High Commissioner for Refugees. (2006). *Introducing the Female Condom in Refugee Settings, A Guide for Implementation*, March 2006.
- United Nations High Commissioner for Refugees. (2005). *Refugees and HIV and AIDS, UNHCR's Strategic plan 2005-2007*.
- United Nations High Commissioner for Refugees. (1999). *Reproductive Health in Refugee Situations: An Inter-Agency Field Manual* (Geneva: UNHCR, 1999)
- United Nations High Commissioner for Refugees. (2003). *Sexual and Gender-Based Violence against Refugees, Returnees and Internally Displaced Persons, Guidelines for Prevention and Response*, May 2003.
- United Nations High Commissioner for Refugees. (2006). “Solar task light – Fugnido refugee camp”. Accessible at:
<http://www.bogolight.com/v/vspfiles/photos/Fugnidoreport2.pdf>

- United Nations High Commissioner for Refugees. (2010). Briefing Notes, 10 August 2010-
www.unhcr.org
- United Nations High Commissioner for Refugees, World Health Organization. (2008). *Rapid Assessment of Alcohol and Other Substance Use in Conflict-affected and Displaced Populations: A Field Guide*.
- United States Agency for International Development. (USAID). *The Potential Cost and Impact of Expanding Male Circumcision in Gambella, Ethiopia*, September 2009, Health policy Initiative.
- Wallace, J.M., Meyers V.L., Osai, E.R.(2004). *Faith matters: Race/ethnicity, religion and substance use*. Baltimore MD: Annie E Casey Foundation; 2004.
- Wilhelm-Solomon. M. (2010). *Stigmatization, Disclosure and the Social Space of the Camp: Reflections on ARV Provision to the Displaced in Northern Uganda*. Centre for Social Science Research, Aids and Society Research Unit
- World Health Organization.(1999). *Reduction of maternal mortality. A joint WHO/UNFPA/UNICEF/World Bank statement*. Geneva. 1999.
[http://www.who.int/reproductive health/publications/monitoring/9789241561952](http://www.who.int/reproductive_health/publications/monitoring/9789241561952)
- World Health Organization. (1998). *Coverage Survey. WHO Expanded Programme on Immunization*. Geneva (WHO/EPI/MLM/COV/88), 1988.
<http://www.measuredhs.com/pubs/pdf/wp28/wp28.pdf>

APPENDICES

RESULT OF HOUSEHOLD RECRUITMENT		
RESULT	OF	HOUSEHOLD
RECRUITMENT.....		__
1 = Head of household agreed to household participation		
2 = Head of household refused household participation		
<i>Reason for refusal</i>		
3 = Household not eligible		
4 = Household temporarily absent		
Date and time of first visit		
Date and time of second visit		
Date and time of third visit		
Reason for household's absence		
5 = Household abandoned		
6 = Household on extended travel		
7 = Other (specify)		

Appendix 1
HOUSEHOLD RECRUITMENT INFORMATION

If the household is present: Only one household information sheet to be completed for the head of household or his/her representative.

If the household is absent/abandoned: Only one household information sheet to be completed for household.

HEAD OF HOUSEHOLD									
PARTICIPANT IS HEAD OF HOUSEHOLD OR REPRESENTATIVE OF HEAD OF HOUSEHOLD									
__									
1 = Yes									
2 = No									
3 = No head of household or representative present									
NUMBER OF PEOPLE IN HOUSEHOLD									
Total number of people living in household									
..... __									
Total number of eligible people aged 15-49 living in household									
..... __									
RELATIONSHIP TO HEAD OF HOUSEHOLD									
PARTICIPANT'S RELATIONSHIP TO HEAD OF HOUSEHOLD									
..... __									
1 = Head of household									
2 = Spouse									
3 = Son/Daughter									
4 = Father/Mother									
5 = Brother/Sister									
6 = Other relative									
7 = Living in household but not a relative									

PARTICIPANT RECRUITMENT INFORMATION

3.1.1.1.1 RESULT OF PARTICIPANT RECRUITMENT

RESULT	OF	PARTICIPANT
RECRUITMENT.....		__
1 = Agreed to participate and interview was completed		
2 = Agreed to participate but interview was not completed		
3 = Refused to participate		
<i>Reason for refusal</i>		
4 = Absent		
Date and time of first visit		
Date and time of second visit		
Date and time of third visit		
Reason for participant's absence		
5 = Other (specify)		

To be completed for every eligible person in household including the head of household.

If participant is not recruited because refuses (3), is absent (4) or for other reason, record age and sex of non-participant:

Record sex of the respondent	1 = Male 2 = Female __
How old are you? Record age in years	Record number of years 99 = DON'T KNOW __ __

CONSENT FORM

Hello Sir/ Madam,

My name isI am an interviewer. We are conducting a survey that looks into the behaviour of people in relation to HIV/AIDS in the community. This is important because it will assist us in providing better health services in order for your community to protect themselves from HIV transmission.

[Ask consent of the head of household: Your household has been randomly selected and we wish to have permission to interview eligible members of your household. May we proceed?
___Yes ___No

You've been selected randomly and we wish, with your permission, to interview you.

Be assured that we want to learn from your experience and all the information we collect will be used to help us fight against AIDS in your community and the region. Some of the questions asked, are of a sensitive nature, but please note that your name will not be recorded in the questionnaire, and any details related to your privacy will be kept confidential. It will not be used in relation to registration, food distribution or any other services.

Your participation in this survey is very important and we rely on you to provide us with accurate information that will help us to develop effective activities to fight HIV spread.

The interview will take approximately 30 minutes, but with your cooperation it can be done quickly. May I have your permission to undertake this interview?

Yes No

If you do not want to participate, why.....

Signature of the interviewer that a verbal consent was obtained:

SECTION I: BACKGROUND CHARACTERISTICS (18 questions)

No	QUESTIONS	ANSWERS	SKIP
A. SOCIO-DEMOGRAPHIC			
101.	Record sex of the respondent	1 = Male 2 = Female __	
102.	How old are you? Record age in years	Record number of years 99 = DON'T KNOW __ __	
103.	In which country were you born?	1 = Uganda 2 = Ethiopia 3 = Sudan __ 4 = Other (Specify) _____	
104.	What is your current nationality?	1 = Uganda 2 = Ethiopia 3 = Sudan __ 4 = Other (Specify) _____	
105.	What is your tribe?	1 = Agnuak 2 = Nuer __ 3 = Dinka 4 = Shiluk 8= Other (Specify) _____	
106.	What is your religion?	1 = Catholic 2 = Protestant 3 = Moslem __	

		<p>4 = Christian Orthodox</p> <p>5 = Evangelical</p> <p>6 = Other (Specify)</p> <p>_____</p>	
107.	<p>What is the highest level of schooling you have completed? (different from a literacy program)</p>	<p>0 = Have never attended school</p> <p>1= Did not complete primary education</p> <p>2 = Primary</p> <p>3 = Secondary __ </p> <p>4 = Post-secondary school (including college, university, other diploma)</p>	
108.	<p>How easy is it for you to read a paper written in</p> <p>i. Agnuak?</p> <p>ii. Nuer?</p> <p>iii. Arabic?</p> <p>iv. English?</p> <p><i>(Hold up a paper written in each language)</i></p> <p>CIRCLE ONE ANSWER FOR EACH QUESTION</p>	<p>1 = Easy 2 = Difficult 3 = Do not read at all</p> <p>1 2 3</p> <p>1 2 3</p> <p>1 2 3</p> <p>1 2 3</p>	
109.	<p>Do you have a job?</p>	<p>1 = Yes</p> <p>2 = No __ __ </p> <p>98 = No answer</p> <p>99 = Don't know</p>	
110.	<p>How do you earn a living?</p> <p><i>(Only one answer is possible. Record the principal income sector.)</i></p>	<p>0 = No income</p> <p>1 = Agriculture</p> <p>2 = Business</p> <p>3 = Pastoralism __ __ </p>	

		4 = Private services 5 = Public services 6 = Humanitarian or development group 7 = Other (Specify) _____	
B. ALCOHOL AND DRUG USE			
Note to interviewers: Before proceeding with this section, re-emphasize that the survey is completely confidential and the participant will not be penalized for any of the responses that they give.			
111.	Do you ever take drinks containing alcohol?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	If NO go to 113
112.	In the past 4 weeks, how often have you taken drinks containing alcohol?	1 = Everyday 2 = At least once a week __ 3 = At least once a month	
113.	There are some people who take recreational drugs that they do not get from a medical facility. In the past 12 months, have you taken any recreational drugs that you did not get at a medical facility? (This can include orally, sniffing, injection, other locally common methods for using drugs) Note: A medical facility does not include a traditional medical practitioner. A recreational drug does not include tobacco unless it is mixed with another drug.	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	If NO go to 117
114.	What recreational drugs have you taken in the past 12 months?	1 = Marijuana __ 2 = Chat/miraa/ __	

		3 = Heroin __ 4 = Opium __ 5 = Amphetamines __ 6 = Drugs/herbs from traditional healer __ 7 = Other (Specify) _____ __	
115.	In the past 12 months, have you injected any drugs that you did not get at a medical facility? Note: A medical facility 1 does not include traditional medical practitioners	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	If NO go to 117
116.	Have you used a needle or syringe to inject the drugs that had already been used by another person in the past 12 months?	1 = Yes 2 = No __ __ 98 = No answer 99 Don't know	
C. CIRCUMCISION			
117.	Some men and women have been circumcised, have you been circumcised?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	If No , go to 201
118.	At what age were you circumcised?	Record number of years 99 = DON'T KNOW __ __	

SECTION II: MARRIAGE, SEXUAL HISTORY AND RISK BEHAVIOUR (48 questions)

N°	QUESTIONS	ANSWERS	SKIP
A. MARITAL HISTORY			
201.	Have you ever been married?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	If NO go to 207
202.	Are you married now?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	
203.	How old were you when you first married?	Age in years 99 = Don't Know __ __	
204.	How many wives/husbands do you have?	Record number of wives __ __	
205.	WOMEN ONLY Are you in a co-marriage with other wives?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	
206.	How old is your spouse? <i>Note: If more than one spouse, record the age of the oldest and youngest spouses</i>	Record age of oldest spouse in years 99 = Don't know __ __ Record age of youngest spouse in years	

		99 = Don't know __ __	
207. MEN ONLY	Have you ever inherited the wife of a close relative?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	
208. WOMEN ONLY	Have you ever been inherited by a close relative?	1 = Yes 2 = No __ __ 98 = No answer 99 = Don't know	
209.	What is your current relationship status?	1 = Never married 2 = Currently married and living with spouse 3 = Currently married but not living with spouse 4 = Divorced __ 5 = Separated 6 = Widow/ Widower	

Appendix 2

FGD Guide

Introduction

We appreciate your time to participate in this study. Your participation is voluntary and we in turn will maintain confidentiality in whatever we discuss. We encourage you to share with us information that will enable us understand your perceptions and experiences regarding the behavioural factors that have contributed to “high” HIV prevalence in your community.

There will be two facilitators; one will ask questions and the other will translate words and phrases that may need to be understood better in a more familiar language.

We request to record the information you give us to assist in the analysis of this information.

The discussions will take from 30-45minutes in a question and answer session, please contribute fully and ask for clarification for questions that may not be clear to you. A focus group is really just a discussion group. We want to include everyone’s ideas and suggestions, so please do not hesitate to voice your opinions. You might feel uncomfortable disagreeing with others in the group, but different opinions are important to this process and to the discussion.

I want everyone here to understand that this is a confidential discussion. We must all agree not to discuss what is said outside this room. The results of this discussion will be included with the results of other focus group discussions in the final report. We will not identify any person individually. Does everyone agree to maintain confidentiality of this discussion?

Signature:

The interviewer signature implies interviewee has consented to the interview.

Appendix 3

FGD Questions

(Women's association groups, Refugee central committee and Peer educators)

1. What do you know about HIV in this community? Is HIV affecting your community? If yes, how did you come to know?
2. What is people's attitude towards HIV in your community? Do people think there is HIV?
3. What measures do your community members take to prevent themselves from HIV that you know of?
4. Which social and cultural practices do you think contribute for the spread of HIV among your community?
5. Who do you think is responsible to stop the spread of HIV in this community?
6. What is the view of community members towards HIV and AIDS? (probe reasons for negative and positive views)
7. What are the advantages of undergoing VCT?
8. What is the view of the community towards HIV testing?
9. What are the constraints to undergo counselling and testing? (probe stigma, financial, transport, cultural inhibitions etc.)
10. Are there any risks in practicing sex without condoms?
11. What are the traditional beliefs/ practices around condom use?
12. What services does your community need to prevent the spread of HIV that it can't get? If so, what are they and why can't the community get them?

Thank you for participating in today's group.

Appendix 4

FGD Questions

(Host community women who live very close to refugees and practice sex-work)

1. What do you know about HIV in the refugee community? Is HIV affecting refugees? If yes, how did you come to know?
2. Do you have refugee clients?
3. What is the view of your refugee clients towards HIV and AIDS? (probe reasons for negative and positive views)
4. What is the view of your refugee clients towards condom use?
5. What are the traditional beliefs/ practices of your refugee clients around condom use?

Thank you for participating in today's group.

Appendix 5

KI Guide

Introduction

We appreciate your time to participate in this study. Your participation is voluntary and we in turn will maintain confidentiality in whatever we discuss. We encourage you to share with us information that will enable us understand your perceptions and experiences regarding the behavioural factors that have contributed to “high” HIV prevalence in your community.

The discussions will take from 20-30 minutes in a question and answer session, please contribute fully and ask for clarification for questions that may not be clear to you.

There will be two facilitators; one will ask questions and the other will translate words and phrases that may need to be understood better in a more familiar language.

We request to record the information you give us to assist in the analysis of this information.

Do you agree to take the interview with the understanding as explained above?

Signature:

The interviewer signature implies interviewee has consented to the interview.

Appendix 6

KI Questions (Medical director and VCT Nurse)

1. How long have you been working at the camp health centre ?
 2. In general, what are some major concerns in this community?
 3. What are the major health concerns in this community?
 4. How much drug and alcohol use is there in this community?
 5. What drug is used most often? Where do most people use? When do most people use?
 6. How serious is HIV infection compared to other problems in the community?
 7. Do people in this community feel that they are at risk of getting infected with HIV? Why or why not?
 8. Who are the people in this community you feel are most at risk of getting infected with HIV? Where do they hang out? How can we reach them?
 9. What do you think is going on in the community that puts people at risk for HIV infection? What do you think can be done to reduce these risks?
 10. How do people feel about HIV testing in this community?
 11. What are the reasons why someone would not want to get tested? Why or why not?
 12. How do people feel about condom use in this community? Is it something they even think about? Why or why not? Are condoms easy to get? Why or why not?
 13. What do you think can be done to help people learn about HIV and other STDs?
 14. What succeeded and what failed in prior HIV program(s)?
 15. Is there anything else that you would like to add?
- Thank you for your participation!