

**PARENTS' PARTICIPATION IN ADOLESCENTS' HOME BASED HIV/AIDS
PREVENTION EDUCATION: A CASE STUDY OF MUSOMA MUNICIPALITY,
MARA REGION, TANZANIA**

BY

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ABSTRACT

Whenever a discussion on AIDS comes up one cannot escape talking about sexuality issues. Education and communication are currently the only weapons we have against HIV/AIDS. Communication and information can help to fight HIV/AIDS by changing young people's behaviour through protective education schemes. Communication between parents and their children about sex is often difficult. Although most adults want youth to know about how to prevent HIV and other sexually transmitted infections (STIs), they still have difficulties in communicating about sex. The general objective of this study was to determine factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education, in order to provide necessary information to policy makers in order to design more relevant and efficient programmes to combat HIV/AIDS specifically targeting adolescents specifically. The study adopted a cross sectional design using an interview schedule for 120 parents/guardians from ten streets (*mitaa*) of Musoma Municipality. The Statistical Package for Social Sciences (SPSS) Version 11.5 was used to analyse data. Descriptive statistics were used for identifying cultural, demographic and socio-economic factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education. However, prior to this step index scales were developed and used to gauge participation, religiosity and HIV/AIDS awareness. F-test was used to test the hypotheses at 5% level of significance. Key findings indicate that parents' participation in adolescents' home based HIV/AIDS prevention education was affected by cultural factors including norms such as feeling shame to discuss with adolescents about sex related issues; lack of knowledge about the technical aspects of HIV/AIDS and sex; as well as adolescents are told issues related to sex when they undergo rite of passage. Values such as adolescents should not know about sex, and open communication leads to children's loss of respect to elders were revealed. Socio- economic factors such as education level of parents significantly affected their

participation in adolescents' home based HIV/AIDS prevention education. Levels of knowledge about HIV/AIDS were found to be high. Parents' participation in adolescents' home based HIV/AIDS prevention education was significantly affected by parents' religiosity, occupation and level of education, but not affected by type of family, family size, economic status, and HIV/AIDS awareness. The study recommended that the government, and the community respectively should develop policies/programmes and strategies that encourage or involve parents to take part in HIV prevention approaches.

DECLARATION

I, Asteria Magubu Ruzangi, do hereby declare to the senate of the Sokoine University of Agriculture that the work presented is my own and has not been submitted for a higher degree in any other University.

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(MA. Rural Development)

Date

The above declaration is confirmed

Prof. E.A. Mwangeni
(Supervisor)

Date

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DEDICATION

This work is dedicated to my parents Mr. Arbogast Ruzangi and Mrs. Virginia Patrick Ruzangi who laid down the foundation of my education. My beloved husband, Sabath Makuke and my children Mishael, Debora, Mbonabhibhi, Arbogast (Msela), and Japheth.

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Tanzania Commission for AIDS, Zanzibar AIDS Commission, National Bureau of Statistics, Office of the Chief Government Statistician, and Macro International Inc.,	

(2008). Tanzania HIV/AIDS and Malaria Indicator Survey 2007-2008. Dar es Salaam,
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LIST OF ABBREVIATIONS

AIDS	-	Acquired Immunodeficiency Syndrome
CDS	-	Centre for Disease Control
DSI	-	Development Studies Institute
FGDs	-	Focus Group Discussion
HIV	-	Human Immunodeficiency Virus
ICT	-	Information Communication Technologies
NACP	-	National HIV/AIDS Control Programme
NSGRP	-	National Strategy for Growth and Reduction of Poverty
SES	-	Social Economic Status
SNAL	-	Sokoine University of Agriculture National library
SPSS	-	Statistical Package for Social Sciences
SSA	-	Sub-Saharan Africa
STIs	-	Sexually Transmitted Infections
SUA	-	Sokoine University of Agriculture
TACAIDS	-	Tanzania Commission on AIDS
TDHS	-	Tanzania Demographic Health Survey
THIS	-	Tanzania HIV/AIDS Indicator Survey
UNAIDS	-	United Nations Programme on HIV/AIDS
UNICEF	-	United Nations Children's Fund
UNFPA	-	United Nations Population and Development Fund
URT	-	United Republic of Tanzania
US	-	United States
USAIDS	-	United States Agency on AIDS
WB	-	World Bank

- WHO - World Health Organization
- WHO/GDA - World Health Organization's Global Programme on AIDS

CHAPTER ONE

INTRODUCTION

1.1 Background Information

HIV and AIDS pandemic is a health and development crisis throughout much of Sub-Saharan Africa (SSA), including Tanzania. The Joint United Nations Programme on AIDS (UNAIDS, 2008) estimated the number of infections worldwide at about 33 millions (30 - 36 million) people living with HIV in 2007, of which two thirds (67%) were found in SSA. About 2.7 millions become infected in 2007, 1.9 of whom was from SSA. World wide, about three quarters (75%) people died from AIDS-related causes in 2007 were from SSA. HIV/AIDS has emerged as a global health problem with serious medical, economic and social implications (WHO, 2000). Throughout history, a few crises have presented such a threat to human health, social and economic progress as does the HIV/AIDS epidemic (WHO, 2000).

In addition to human suffering and loss of life, AIDS in Africa is reversing the development and socio-economic gains. Life expectancy is dropping by decade, growth of the already fragile economies decrease yearly and governments experience increasing difficulty in delivery of the health care, welfare and national defence (Mayer, 2003).

The HIV/AIDS is prominent among the economically active section of the population (Errickson, 1990). This greatly affected production, causing loss of labour, and results into loss of income. The spread of HIV/AIDS among the most productive age groups of the population, seriously affects the economic development of any country in the world. It is increasingly clear that youth must be at the centre of AIDS prevention strategies, especially in hard-hit countries. Special priority to young people will change the future course of the pandemic. Changing behaviours and expectations early results in a life time of benefit-both

in HIV prevention and in overcoming HIV related stigma. Educating young people about HIV, and teaching them skills in negotiation, conflict resolution, critical thinking, decision making and communication, improves their self confidence and ability to make informed decisions, such as postponing sex until they are mature enough to protect themselves from HIV (UNICEF *et al.*, 2002)

Silence about AIDS has denied people information which could have saved their lives (UNICEF *et al.*, 2002). It has not been easy for an African parent to sit and talk to their children about sexual matters. A barrier to positive communication is the parents' and adolescents' difficulty in talking about sexual issues. The topic has been a taboo for as far back as African tradition goes. But our teenagers today are going around getting wrong information from their peers and from magazines, and they end up infected with HIV/AIDS. Young people make the wrong decisions about sex because their parents do not inform them (Kirangu, 2001). Addressing the HIV/AIDS pandemic among young people requires reaching not only the youth themselves but also others who influence their lives. Parents and other family members can help prevent HIV/AIDS among young people. At the same time, traditional ways of educating the young about sex have diminished or disappeared altogether. This study examines factors affecting parents' participation in adolescents' HIV/AIDS prevention education.

1.2 Problem Statement

Since 1983 when the first case of HIV/AIDS was diagnosed in Tanzania, the disease has spread much and has shown no signs of slowing in urban and rural areas (Duck, *et al.*, 1995). Thus the epidemic continues to have a devastating effect on the urban and rural communities (Edwards, 2002). The most affected groups are the youth and women, at the ages between 20-34 for women and between 15-19 for both women and men accounting

for 2% of people (Samuel, 2006). New studies from across the globe have established that the vast majority of young people have no idea of how HIV/AIDS is transmitted or how to protect themselves from the disease. The family, not the school as many think is the first centre for sex education (UNICEF *et al.*, 2002). Parents find it difficult to talk to their children about sex because of the cultural view that the subject is a taboo. Many adults fear that informing young adolescents about sex and teaching them how to protect themselves will make them sexual active (UNICEF *et al.*, 2002). Silence about AIDS has denied people information that could have saved their lives (UNICEF *et al.*, 2002).

In response to the HIV/AIDS epidemic, the Government of Tanzania with technical support from the World Health Organization's Global Programme on AIDS (WHO/GDA) formed the National HIV/AIDS Control programme (NACP) aiming at developing strategies to prevent, control and mitigate the impact of HIV/AIDS through health education, multi-sectoral response and community participation (URT, 2001). In the absence of vaccine and therapeutic cure, communication programs represents a key ingredient in the social vaccine against HIV/AIDS (UNAIDS, 2001). Parent-adolescent sex based communication is now being considered a primary mode for HIV prevention for young people (Thomas *et al.*, 2000). Parent-child communication about sexual topics is associated with delays in initial sexual activity, fewer sexual partners, more responsible sexual behavior, and greater efforts to avoid AIDS (Ckernanmckay, 2004). Parents who engage in frequent dialogues about sexual matters with their adolescents may be able to reduce their youngsters' sexual risk-taking behavior (Ckernanmckay, 2004). Parents' participation in the prevention for the epidemic at the family level is not fully documented in Tanzania. It is now important to examine factors that are associated with this communication so as to enhance parent's participation in adolescent's home based HIV/AIDS prevention education.

1.3 Justification

Young people are at the centre of the global HIV/AIDS pandemic. They are also the world's greatest hope in the struggle against this fatal disease (UNICEF *et al.*, 2002). In response to the HIV/AIDS epidemic, the Government of Tanzania with the technical support from the World Health Organization's Global Programme on AIDS (WHO/GDA) formed the National HIV/AIDS Control programme (NACP) aiming at developing strategies to prevent, control and mitigate the impact of HIV/AIDS through health education, multi-sectoral response and community participation (URT 2001). The National Policy on HIV/AIDS developed in 2001 was to providing a framework for leadership and coordination of the national multi-sectoral strategic response to the HIV/AIDS epidemic. This included formulation by all sectors of appropriate intervention strategy which will be effective in preventing transmission of HIV/AIDS (TACAIDS, 2005b).

The National Policy on HIV/AIDS is consistent with the National Strategy for Growth and Reduction of Poverty (NSGRP) emphasizing people on how best to protect themselves against HIV/AIDS. Further spread of HIV/AIDS undermines the foundation for development and attainment of the Millennium Development Goals, especially Goal Number Xix (6) which emphasizes combat of HIV/AIDS, Malaria, Tuberculosis and other diseases aiming at stopping the progress of and reverse the spread of killer diseases. The achievement of the policy will largely depend on the reduction of risky behaviours practiced by individuals, specifically adolescents who need adult assistance to deal with the toughs, feelings and experiences that accompany physical maturity. This study aims at assessing parents' participation in adolescents' home based HIV/AIDS prevention education. Therefore the study will provide important information that would contribute to strategies of reducing incidences of HIV/AIDS in the country.

1.4 Objectives

1.4.1 General objective

To determine factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education.

1.4.2 Specific objectives

The specific objectives are to:

- i. Identify cultural factors (norms, values, religiosity, type of family) affecting parents' participation in adolescents' home-based HIV/AIDS prevention education
- ii. Examine demographic factors (family size, family composition) affecting parents' participation in adolescents' home-based HIV/AIDS prevention education
- iii. Determine socio-economic factors (education, occupation, economic status, and HIV/AIDS awareness) affecting parents' participation in adolescents' home-based HIV/AIDS prevention education

1.5 Conceptual Framework

In order to meet the information of the above stated objectives and identify the variables for data collection, a conceptual framework was developed. The conceptual framework prevents fragmentation of knowledge into diverse segment of unconnected statement. Mbwanbo, (2000) argues that framework can bind facts together and hence provide guidance towards realistic collection of data and information. The conceptual framework for this study is presented in (Fig.1), It is a narrative outline presentation of variables to be studied and hypothetical relationships between and among variables. It details the variable that was examined and their expected relationship. It groups the variables into background, independent and dependent variables. The types of variables shown in the conceptual framework are; background variables, which include age, sex, marital status, and ethnicity

of the head of households. The independent variables are demographic variables such as family size, and family composition; cultural factors such as norms, values, religiosity, type of family, communication skills about HIV/AIDS; socio-economic factors such as parents' education level, occupation, economic status and HIV/AIDS awareness.

The background variables are expected to have little influence on independent variables. Demographic, socio-cultural and socio-economic variables were also expected to influence each other. Independent variables which include demographic, cultural and socio-economic variables were expected to have influence on dependent variable.

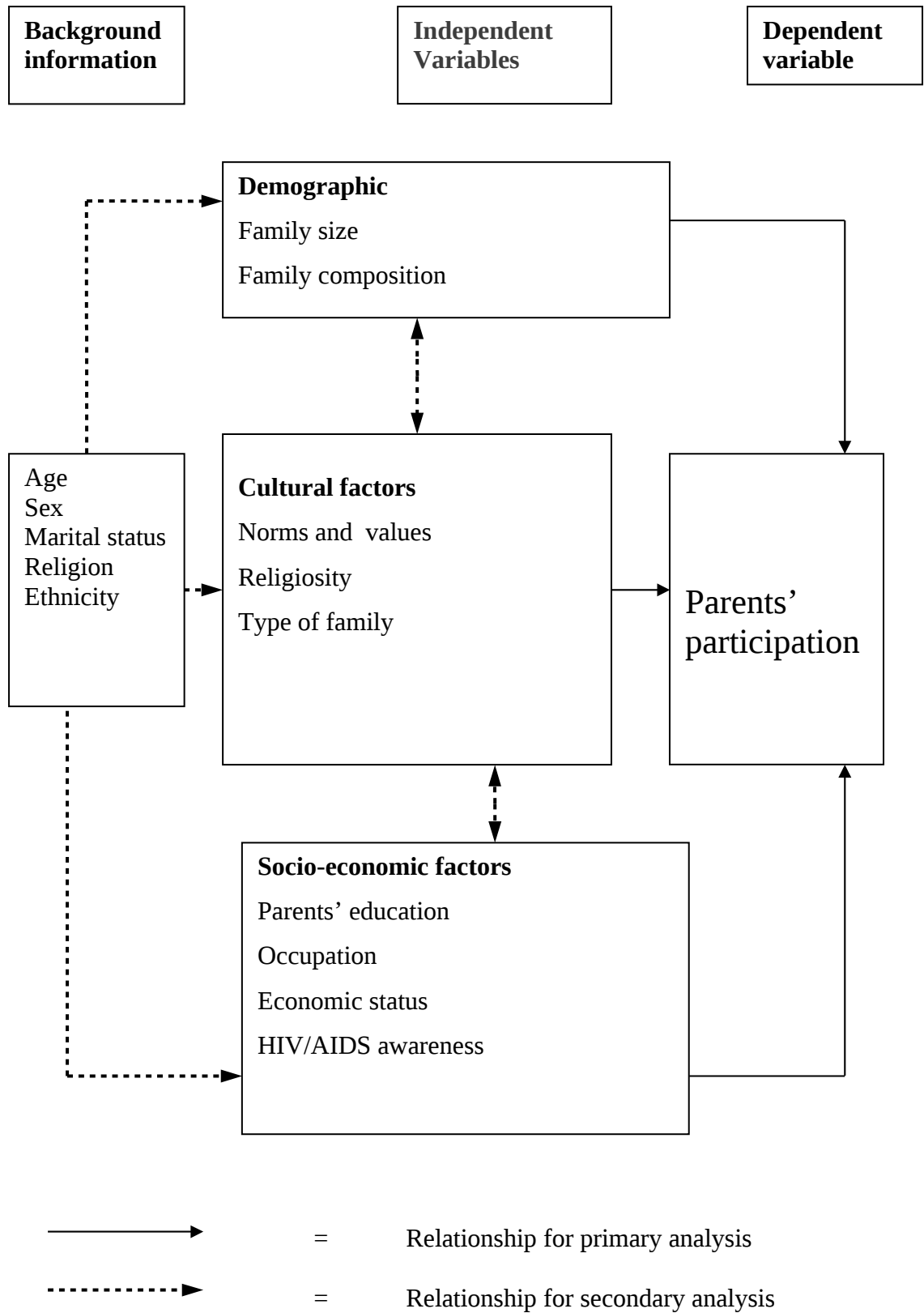


Figure 1: Conceptual framework

1.6 Hypotheses

Two hypotheses were tested in this study based on parents' level of education and strength of religious beliefs.

(a) Parents' religious beliefs

- (i) Null hypothesis: Parents with strong religious beliefs do not participate in adolescent' home based HIV/AIDS prevention education
- (ii) Alternative hypothesis: Parents with strong religious beliefs do participate in adolescents' home based HIV/AIDS prevention

(b) Parents' education levels

- (i) Null hypothesis: Parents with secondary education and above do not participate in adolescents' home based HIV/AIDS prevention education
- (ii) Alternative hypothesis: Parents with secondary education and above participate in adolescents' home based HIV/AIDS prevention education

CHAPTER TWO

LITERATURE REVIEW

2.1 Overview

This chapter reviews literature on factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education. The general overview of HIV/AIDS status is in section 2.2, the global situation of HIV/AIDS is presented in section 2.3, section 2.4 is about the need of HIV/AIDS communication, while protecting young people against HIV/AIDS is discussed in section 2.5. Section 2.6 is about cultural factors, while section 2.7 is about the demographic factors and socio-economic factors in section 2.8. This information is important because adolescents fall in the age bracket that is vulnerable to HIV/AIDS and STDs infection. Croswell (1994) reported that literature review is important as it provides a framework for establishing the importance of the study, as well as a benchmark for comparing results of a study with other findings.

2.2. General Overview of HIV/AIDS Status

Acquired Immune Deficiency Syndrome (AIDS) is caused by the human immunodeficiency virus (HIV). This virus is transmitted via human body fluids. Globally most infections occur through sexual intercourse between men and women. The virus attacks the immune system and ultimately makes it ineffective. The disease tends to affect people in the age group that is broadly defined as "sexually active" between 15 and 50 years, although this is not imply that there are no infections below and above this age ranges (15 and above 50 years) (Erickson, 1990).

HIV/AIDS was a major development crisis that affected all sectors during the last decade. Globally, the pandemic has spread relentlessly affecting people of all walks of life and

decimating the most productive segments of the population (UNAIDS, 2004). By the end of 2007, it was globally estimated that 33.6 million adults and children were living with HIV/AIDS (UNAIDS, 2008) and 25 million had already died (UNAIDS, 2006). In 2008, there were 2.7 million new infections of which 1.9 million were in SSA (UNAIDS, 2008). Cumulatively, it is estimated that 15 million children have been orphaned globally by HIV/AIDS and about 11.5 million are in Africa alone (UNAIDS, 2008).

In Africa, AIDS is the global epicentre and it is estimated that 83% of all the world's AIDS cases/deaths are from this continent and the most affected part of Africa is SSA (UNAIDS, 1999). According to the 13th International AIDS Conference in Africa, the pandemic has reached epic proportions. The virus has spread into every corner of the continent- nearly 25 million Africans are HIV positive with infection rates in many areas climbing as high as 50 to 70% (UNAIDS, 2004). The first cases of HIV/AIDS were reported in the Africa continent in the early 1980. By the 1987 the pandemic had become concentrated in most SSA where nearly 33.6 million cases are in SSA, Tanzania being one of the most affected countries (UTR, 2001).

In Tanzania, the first three cases were reported in 1983 in Kagera Region. By 1986 all the regions in Tanzania mainland had reported cases of HIV/AIDS. According to UNAIDS, (2008) Tanzania has an estimated 2.2 million people living with HIV/AIDS, or a seroprevalence rate of approximately 6.5 percent. HIV/AIDS has also orphaned an estimated 1.1 million children (UNAIDS, 2008). It was also estimated that about 1.4 million people [1.3 million – 1.6 million] (6.5 of adult [5.8%- 7.2%]) were living with the HIV in 2005, highlighting the challenges of improving prevention efforts and substantially expanding access to treatment and care (UNAIDS, 2006). In Tanzania, annual deaths from AIDS are presently estimated at 96,000 people (UNAIDS, 2007). AIDS is believed to have

recently surpassed malaria as the leading killer among diseases in adults and is likely to do so for children in the very near future.

Some parts of the country are much more affected than others. For example, in Kagera region, where the epidemic first manifested itself in Tanzania, reported AIDS deaths were about 16% of all deaths and the actual figure may be higher due to underreporting (Over *et al.*, 1989). This will depend on whether there are differences among regions with regard to the extent of sexual activity outside marriage and the prevalence of sexual transmission infections (STIs) in the population, although information on these factors remains sketchy (NACP, 2001). Other regions which have reported high rates of HIV/AIDS include Iringa (16) and Dar es Salaam (9), Mbeya (9), Mara (8), Shinyanga (7), Pwani (7). Generally, the prevalence of HIV/AIDS in Tanzania is 6 percent (TACAIDS *et al.*, 2007-08). There are also great disparities across different subgroups of the population. For example, it is reported that HIV infection levels are highest in people between 15 and 45 years, and in new-born infants (NACP, 2001).

HIV infection rates are highest and increasing rapidly especially among adolescents. Women and men are about equally infected. On average women appear to become infected at a younger age than men (WB, 1992). These facts are consistent with what is known now about how the disease is transmitted in Tanzania. By far, the most important transmission route is heterosexual contact, which is estimated to account directly for close to 80% of all infections in the country (WB, 1992). This greatly affects production and availability of labor, resulting into loss of income, which reduces the available financial resources for the household. The World Bank estimates that AIDS will reduce average real GDP growth rate in the period of 1985-2010 from 3.9% without AIDS to between 2.8 and 3.3 with AIDS (WB, 1992).

The likely future prospects of the pandemic will critically depend on a number of vital and difficult-to-predict variables including sexual behavioral patterns, and in particular, to the proportion of the adult population with multiple sexual partners. If, for example, both partners in 45% of married couples are “sexually monogamous”, it has been estimated that by the year 2000, about 1.2 million people will be carrying the virus and another 450,000 will have died of AIDS, with these numbers increasing to about 2.3 million and 1.7 million respectively by the year 2010 (Over *et al.*, 1989). On the other hand, only 15% of married couples are mutually monogamous, as many as 3.6 million could be infected by 2000 and AIDS deaths could be as high as 1.6 million, growing to 6.1 million infected and 5.6 million deaths by 2010. These figures imply that 3.9 to 12.4% of the population will be infected by 2000 and 5.8 to 17.4% by 2010 (Over *et al.*, 1989).

According to Mpango wa Kukuza Uchumi na Kuondoa Umaskimi (MKUKUTA), equitable and sustained resources to care, support and treatment are essential to improve the well-being and life expectancy of people living with HIV and AIDS. Issues pertaining to finances, infrastructure, human and logistical weaknesses need to be resolved first, to avoid further weakening of an already constrained health system. HIV and AIDS erode productivity, and cut down on effective manpower (NSGRP, 2004). This is in appreciating that the HIV/AIDS pandemic has raised many complex issues that demand extensive well funded and well coordinated research programmes.

2.3 The Global Situation of HIV and AIDS

Since the identification of AIDS, 25 million people have died (UNAIDS, 2006) and 33 million people live with AIDS or HIV in the world (UNAIDS, 2008) and the pandemic is spreading worldwide. Among those affected, 95% live in developing countries and Africa alone accounts for two third of current HIV/AIDS cases. The increase in adult mortality

has left and will continue to leave many children without parents who are the principal caregivers and breadwinners in the households. On the other hand, affected households by HIV/AIDS often move from relative affluence into poverty. This is a very big challenge to poor resource households that cannot even meet the basic needs (USAIDS, 2002). There is a need to recognize that the risk is a global problem, a human problem, but one which will affect societies differing in their histories, cultural level and ways of life (Barnelt and Blakie, 1992). The spread of HIV epidemic has varied considerably between developed and developing countries, depending on culture as well as other social and behavioral patterns. Incidence rates have been highest in developing countries where sexual transmission is most common. Definitely, sexual transmission is by far the most important accounting for over 75% of all HIV infections worldwide (Muhondwa, 1997).

In Tanzania, HIV/AIDS is a national disaster that calls for concerted efforts and unprecedented initiatives at the national and global levels. Tanzania, like other SSA countries faces a serious health and socio-economic problem of unprecedented magnitude as a result of the epidemic as shown by the National AIDS Control Program (NACP, 2001). Since 1983, when the first cases of AIDS were reported in Tanzania, HIV/AIDS epidemic has spread both in rural and urban areas. In Tanzania, most infections are sexually transmitted through heterosexual intercourse and therefore the youth being the sexual active groups are the main population group that is most affected. Concerted efforts to control the epidemic started in 1985 with the formulation of short-term plans. Since then the national response to the epidemic has been diverse and variable both in nature and scope. Nevertheless, HIV infection epidemic is worsening (NACP, 1998). By 1986 all regions in Tanzania mainland had reported AIDS cases. By the end of 1999 there, were some 600,000 cases of HIV/AIDS and a similar number of orphans making it a major development crisis that affects all sectors (NACP, 2001).

The national HIV/AIDS policy in Tanzania formulated in 2001 provides a framework for individual response to HIV/AIDS pandemic and this works through the Tanzania commission for AIDS (TACAIDS), placed under the Prime Minister's Office (URT, 2001). The policy is geared to fight against the HIV/AIDS pandemic and everyone has a role to play and must be fully involved in the struggle against the HIV/AIDS pandemic. However, the policy will continue to be reviewed and updated in relation to emerging development life styles (cultural or economic) in society and the trend as well as the impact of the pandemic (URT, 2001). The policy will be reviewed from time to time in order to address emerging issues (URT, 2001). The ultimate objective of the National HIV/AIDS policy is to provide for a framework for leadership and coordination of the national multicultural response to the HIV/AIDS pandemic. It also provides a framework for strengthening the capacity of institutions, communities and individuals in all sectors to contain the spread of the epidemic (URT, 2001). It specifically includes prevention and transmission of HIV/AIDS, HIV testing, care for people living with HIV/AIDS, sectoral roles and financing, research, legislation and legal issues (URT, 2001).

2.4 Need for Communication

Adolescence is a period when a child is being transformed into an adult. The age of adolescence is an age of changes, development, experimentation, when curiosity rises at its peak in this stage, people feel confused, weighed down, full of questions and doubts, especially if the questions are about changes in the body. It is also the age where the new feelings are experienced and especially anything to do with sex. In order to resolve them, adolescents look up or depend on their parents or trained people such as doctors, psychologists, etc for guidance. However, through lack of confidence and maturity, adolescents turn to their friends in many instances. Friends too do not know the truth about

things, and instead of solving the problem; they create more confusion thus giving rise to major dilemmas (UNICEF *et al.*, 2002).

Parents, community and religions leaders need to recognize the importance of their roles in providing lifesaving information and skills (UNICEF *et al.*, 2002). Programmes have responded by acknowledging that face to face communication is the most effective means of influencing individual behaviour (UNAIDS, 2004). There is unwilling on the part of parents to accept that children and adolescents should know about sex and sexuality. Usually there is a public uproar or objection by parents and teachers when sex education is introduced or if children have to be taught about condoms. However, when it comes to communicating with children and the young adults on these issues especially those related to sexuality, people hesitate. It has been observed that many older people seem unwilling to discuss these things openly (UNFPA, 2003).

Young people cannot protect themselves if they do not know the facts about HIV/AIDS. Adolescents must learn the facts before they become sexually active, and the information needs to be regularly reinforced and built on, both in the classroom and beyond (UNFPA, 2003). Even if young people have the information they need, they may find it impossible to take appropriate action to protect themselves unless appropriate programmes and services are available and accessible to them. Hence the need is not only to help them access appropriate information but also to empower them and build emotional intelligence by enabling them to do what they know is right and to do it at the right time. When young people receive knowledge on inter-related issues they are in a better position to make wise choices (UNFPA, 2003).

2.5 Protecting Young People

UNAIDS estimates that people aged less than 25 years account for half of all new HIV infections. Young people's risk of HIV infection is closely correlated with age of sexual debut (UNAIDS, 2006). Accordingly, abstinence from sexual intercourse and delayed initiation of sexual behaviour are among the central aims of HIV prevention efforts for young people (Santelli *et al.*, 2006). For the many young people who are sexually active, access to comprehensive prevention services, including prevention education and provision of condoms, represents an urgent global health necessity and a fundamental human right. Young people who need HIV prevention services include both males and females, students and young people who do not attend school, sexually inexperienced young people and those who are sexually active, and a substantial percentage especially among girls who are already married. No single prevention also involve young people living with HIV, and support balanced and comprehensive prevention strategies that promote abstinence, faithfulness, women's equality and empowerment, reduction in the number of partners, and consistent condom use is effective (UNICEF, 2005). Young people themselves are often especially effective deliverers of HIV prevention interventions to their peers and thus have an important role to play in the development, implementation and evaluation of youth-oriented HIV prevention programmes. Open discussion of sex is necessary to the provision of effective HIV prevention for young people. In some cultures, many young people, especially girls seeking to preserve their virginity, may engage in anal or oral sex in the belief that such behaviours do not constitute sex. Veiled or euphemistic discussion of sexuality may inadvertently permit such misconceptions to persist, potentially placing young people at risk of HIV infection. Contrary to common fears or stereotypes, extensive research has detected little evidence that sex education leads to an increase in sexual activity (Meschck *et al.*, 2000).

2.6 Factors Affecting Parents' Participation in Adolescents Home based HIV/AIDS

Prevention

Parents have a major role in influencing children sexual behavior (Hare *et al.*, 2007). Parental involvement in educating adolescents about sex has taken on a new sense of purpose in the era of AIDS. Although studies are not comprehensive and their results tend to be mixed, there is evidence to suggest that adolescents who talk to their parents about sex are likely to initiate sexual intercourse later than their peers (DiIorio *et al.*, 2000), and are more likely to use condoms and contraception when they become sexually active. Each of these outcomes is also associated with HIV prevention efforts (DiIorio *et al.*, 2000). That is, adolescents who delay the initiation of sexual intercourse or use condoms reduce their risk of contracting HIV. Because parent adolescent sexual based communication is now being considered a primary mode for HIV and pregnancy prevention for young people (Holtzmann & Rubinson, 1995), it is important to examine factors that are associated with this communication. There are findings that point to the fact that regardless of who the adolescent are talking to about sexuality, the extent and depth of such dialogues may depend on individuals, socio-economic situation, religious affiliations and education level (Lefkowitz *et al.*, 2003). Although the content and pattern of parent adolescent sexual based communication have received considerable attention in the literature (Miller *et al.*, 1998; DiIorio *et al.*, 2003), there has been little study of parental factors that might foster such communication. In order to better understand why some parents talk to their children about sex/HIV and others do not, the study will examine the role of cultural, demographic, and socioeconomic factors predicting sexual/HIV based communication.

2.6.1 Cultural factors

Traditionally, in many societies, the issue of sexuality was considered secretive and the domain of adults. Sexual knowledge and education was part and parcel of initiation into

adulthood for both males and females (Santelli *et al.*, 2002). In many cultures, parents did not traditionally discuss sex with their children. Instead, grandparents, aunts, and uncles played this role. The breakdown of traditional cultures has left many parents with the challenge of talking to their children about HIV/AIDS as well as sex, and many are ill-prepared (Kirangu, 2001).

2.6.1.1 Feeling shame (parental discomfort and embarrassment)

Parents and children alike are often embarrassed to talk about sex and avoid the topic. In South Africa adolescent women said they were afraid to talk to their parents about sex, in Zimbabwe young people said that communication with parents about sex was often one-sided, with parents mainly warning about the dangers of sex (Kirangu, 2001).

Research findings consistently reveal that the predominant barrier to HIV/AIDS and sexuality communication is parental discomfort and embarrassment (Meschke *et al.*, 2000; Pattman and Chenge, 2003; Odimegwu *et al.*, (2002). Studies conducted by UNICEF in Eastern and Southern Africa indicated that in Tanzania, the majority of children reported, that they seldom shared their worries on issues related to sexual matters with their parents. Instead, they were much more likely to share such information with their friends. In most countries, parents did not discuss sex with their children except in the negative sense in the context of rebuke (Pattman and Chenge, 2003). In US one of the most widely reported barriers to sexuality communication in Latino families is parental discomfort and embarrassment (Golamo-Ramos, *et al.*, 2007). Teachers in Rwanda and South Africa pointed out that it was difficult for them to discuss issues of sexuality because their religious and cultural norms prohibited it, and because terms related to sex and sexual organs were perceived as swear words in their native language (Pattman and Chenge,

2003). Young people cannot protect themselves if they do not know the facts about HIV/AIDS (UNFPA, 2003).

Life skills, skills in negotiation, conflict resolution, critical thinking, decision making and communication are critical for young people (UNFPA, 2003). Parents and other family members are in a unique position to help socialize adolescents into healthy sexual adults by providing accurate information about sex and by fostering accurate information responsible for sexual decisions making skills (Odimegwu *et al.*, 2002).

2.6.1.2 Lack of knowledge about the technical aspects of HIV/AIDS and sex

Another recognized barrier to sexuality communication stems from parent's lack of knowledge about the technical aspects of HIV/AIDS and sex. Studies conducted in US found that Latino parents were feeling like they do not have the necessary knowledge or skills to talk about sex with their children (Guilamo-Ramos *et al.*, 2007). Many parents know little about HIV/AIDS and worry that they do not have the information to give their children (Kirangu, 2001). Further research findings reveal that in the US, parents said one reason for poor communication was that their teenage children might ask questions the parents could not answer (Guilamo-Ramos *et al.*, 2007). In developing countries, especially in rural areas, parents are often less educated than their children and worry that they lack the knowledge to talk with them about sex (Wilson *et al.*, 1994).

2.6.1.3 Rite of passage

Most researchers agree that parent-child communication about HIV/AIDS and sexuality should begin early so that it can evolve comfortably as the child matures (Meschck *et al.*; Kirangu, 2001). A single serious talk about sex as a child enters puberty is likely to be

strained and awkward. Literatures reveal that in many cultures parents traditionally did not discuss sex with their children (Kirangu, 2001). A study conducted in Kenya revealed that some parents declared that discussion on sexuality in family was not considered important because there existed an alternative during the passage of rites (Namisi, 2005).

2.6.1.4 Adolescent should not know about sex

Whenever a discussion on AIDS comes up one cannot escape talking about sexuality issues. In most traditional cultures there is unwillingness to accept that children and adolescents should know about sex, normally due to the fear of encouraging adolescent about unintended sexual behaviour.

2.6.1.5 Open communication leads to children's loss of respect to elders

It is generally acknowledged that parents traditionally did not discuss sex with their children. These cultural values are commonly shared in many societies. Research conducted in US reported that, parents were also critical of mainstream American parents' open, friendly communication with children, arguing that these ideals contributed to children's loss of respect for elders (Kim *et al.*, 2007). Research done In Kenya revealed that parents and adolescent informants explained that, mentioning reproductive organs or sexual intercourse is considered disrespectful, in particular when this occurs between parents and their children (Namisi, 2005). As their earlier socializing agents, parents have the unique opportunity to provide children with sexual facts, values, and beliefs that will ground their understanding of sexuality and may, in turn, have enduring effects on their sexual decision making (Kim *et al.*, 2007).

2.6.1.6 Religiosity

Religious beliefs and acculturation differences between parents and adolescents may serve as a barrier to communication. Religious parents may perceive that their faith community discourages open discussions about sexual behavior ((Guilamo-Ramos *et al.*, 2007). Research findings reported by Guilamo-Ramos *et al.* (2007) in the US concluded that religious beliefs between parents and adolescents served as a barrier to communication. Religious parents perceived that their faith community discourages open discussions about sexual behavior. Previous findings on sexuality communication and religion are varied. Religiosity has been found to be both negatively and positively predicting parent-adolescent communication on morality issues. For instance, Lefkowitz *et al.* (2003) found that being less religious was associated with adolescents discussing safe sex with their mothers. According to Dolorio *et al.* (2000), mothers with strong religious beliefs have a heightened sense of duty as a parent to educate their children on moral and ethical issues including issues related to sexuality. Past studies exploring demographic predictors of parental sexual communication have produced a rather mixed body of findings. For example, higher maternal education, socioeconomic status, and religiosity have each been linked to receiving more sexual communication from parents (Kim *et al.*, 2007), compared to less sexual communication from parents.

2.6.1.7 Type of family

Research conducted by CDS (1991), reported that in most families parental gender was most strongly associated with whether or not AIDS was discussed. In another study conducted by Odimegwu *et al.* (2002), it was revealed that in the US, youth living in single parent households are at increased risk of early initiation of sexual intercourse. Parents generally have talked to same-sex children about sexual issues. For example in a study conducted by Meschke *et al.* (2000) results revealed that in both single and dual-parent

households, mothers (74.2%) were much more likely than fathers (48.9%) to discuss AIDS. Therefore father and mother communication must be considered as unique predictors of adolescent sexual behavior (Meschke *et al.*, 2000). Additionally, family structure may affect family interaction patterns and resources (Mckernanmckay *et al.*, 2004). Parents need substantial support for parenting tasks if they are to promote healthy development. Authors who have talked about this issue have revealed one parent families' reports of inadequate support to meet daily tasks of life (Mckernanmckay *et al.*, 2004).

2.7 Demographic Factors

2.7.1 Sex of parent

Research suggests that mothers talk to their children about sexuality more frequently than fathers (Lefkowitz *et al.*, 2003). Parent child communication varies with gender, in one study among African American; research findings on parental discussions with adolescents about sex reveal that mothers were more likely than fathers to assume the role of sexuality educator for both sons and daughters (Dilorio *et al.*, 2003). Research suggests that mothers and daughters are more likely to discuss issues of sexuality than are fathers and sons or mothers and sons (Plural and Kuriloff, 2004; Hutchson *et al.*, 2003; Cornelius and Legrand, 2007). Consistent with prior research conducted with primarily non-Latino samples [Raffaelli *et al.* \(1998, 2004\)](#) gender was a primary influence on the extent of parent-child communication. In general, mothers were more likely than fathers to communicate with their children about sexual issues, and daughters reported higher levels of communication than sons.

2.7.2 Parent/adolescent age

Research conducted in the US among African American mothers revealed that sexual communication between grandparents and grandchildren was minimal. Because of generational differences, sex related discussions between grandparents and grandchildren present a variety of challenges that grandparents may feel unprepared for (Brown *et al.*, 2000). Some researchers have found that older adolescents talk to their mothers more about sexual topics than younger adolescents, whereas others have found more communication among younger than older adolescents, to no relation (Lefkowitz *et al.*, 2003). These conflicting findings may partly be due to differences in the topics included in questionnaires. Mothers may find certain topics more appropriate for younger adolescents (e.g. abstinence) and others for older adolescents (e.g. safer sex). Mothers of older and more physically mature adolescents are more likely to recognize the importance of protecting their adolescents from STIs (Lefkowitz *et al.*, 2003).

2.8 Socio-Economic Factors

2.8.1 Education

Education is a key determinant of the life style and status an individual enjoys in a society. Education provides people with knowledge and skills that can lead to a better quality of life. As a matter of fact, education is normally the key to better opportunities for employment, accessibility to information services and to independent and correct actions with regard to survival and development (Malala, 2006). Studies have consistently shown that educational attainment has a strong effect on reproductive behaviour and contraceptive use, fertility, infant and child mortality (TDHS, 2005). According to Meschke *et al.* (2000), higher levels of parental education have been associated with lower adolescent sexual activity, delay in intercourse initiation, greater use of contraception, and lower risk of pregnancy. In a study conducted in US among Asian-American school children, results

indicated that parents with more formal schooling were perceived as providing higher overall amounts of sexual communication to their children (Kim *et al.*, 2007). In support of earlier work (Lefkowitz *et al.*, 2003), mothers who discussed safer sex tended to be more educated than those who did not. In short, individuals of lower socio economic status (SES) tend to know less about HIV/AIDS and, thus, may know less about safer sex practices than more educated individuals.

2.8.2 Occupation

Occupation is to a large extent determined by education. It is argued that there is a strong relationship between earning from paid employment and education level of household head economic status. In a study conducted in Nigeria by Odimegwu *et al.* (2002) results revealed that; in three of the occupational categories (low, medium, and high) more males adolescents than females reported sexual activity. Unlike in the study of Thinton and Cambium where no discernable effect of mother's employment was found on adolescents' sexual attitudes and behavior, it was found that the proportion of males who were sexually active decreased as the occupational categories become more socially prestigious.

2.8.3 Economic status

Lugalla, (1995) in a study of urban poverty and survival politics in Tanzania reported that adolescents from a family with a poor or average standard of living were significantly more likely than those from a family with a high living standard to engage in risk taking behaviour. A study conducted in Kenya by Filmer, (1998) to examined sexual behaviour patterns by socio-economic status concluded that higher SES was associated with later debut and marriage among adolescents aged 15 to 24 years. According to (Namisi *et al.* 2008), better SES was associated with less silence with regard to parents in the two South African sites. High SES levels may mean easier access to credible information from books,

the internet, and other media. Such access is important in order to provide parents with the knowledge, insights and skills that are necessary for competently communicating about sexuality issues with their offspring. Not only in the level of communication, but also the quality of the information provided by parents (mothers), as well as the communication style, may be more adequate in affluent families. According to (Miller *et al.* 1998) have represented that household income was not associated with any of the communication variables.

2.8.4 Parental HIV/AIDS awareness

After the first AIDS cases were reported in 1980s, AIDS awareness increased rapidly in Tanzania. About 91.5% of women and 94% of men had heard about AIDS in 1989/90. By 1999, AIDS awareness was almost universal among both men and women. Specific knowledge about AIDS also increased overtime (TDHS, 1996). Although AIDS awareness was high, misconception about HIV/AIDS were also common. In 1999, only 54% of women and 59% of men thought it was not possible to get AIDS from mosquito bites, while 41% of women and 36% of men thought that sharing food or eating with an AIDS patient could transmit HIV. In a study conducted in Kenya by Namisi (2005) it was revealed that some parents who participated in discussing sexual education in their family reported that knowledge about HIV/AIDS makes people feel free to discuss about the subject.

2.9 Status of Research on Parents' Participation in Adolescents' Home Based HIV/AIDS Prevention Education in Tanzania

Substantial research has been conducted on matters that are fuelling the HIV pandemic in the world as well as in Africa (Kajura, 2005). However, there are still research gaps among other things, on problems of communication about sexuality to young people in Tanzania

and Africa as a whole (Freudenthal, 2001). Most of the research done so far on matters concerning sexuality communication to adolescents has been in Europe and America and it is not known for sure whether it may be applicable to an African setting (Kajura, 2005). It has been reported by previous research in Tanzania that children infrequently obtained reproductive health information from their parents (Muhondwa, 1999; Leshabari and Kaaya, 1997). However factors that may make parents reluctant or less likely to discuss with their offspring about sexuality and HIV/AIDS prevention are not made clear. From most of the previous research, only a few have addressed the issue of factors associated with the extent of parent-child sexual and HIV/AIDS communication in Tanzania (Kajula, 2005; Namisi *et al.*, 2008). This study seeks to examine factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education in Musoma Municipality Mara region.

CHAPTER THREE

RESEARCH METHODOLOGY

3.1 Overview

This chapter presents the methods used to collect and analyse data on parents' participation in adolescent home based HIV/AIDS prevention education. It is divided into six sections: section one presents the study location. The second section presents research design while the third section presents the sampling procedures employed. Section four describes data collection procedure, followed by data processing and analysis in section five. The last section presents the limitations of the study.

3.2 Description and Geographical Location of the Study Area

3.2.1 Establishment and justification of the study area

Musoma town began to be built in the late years of 19 century by the German as a fortification point. The name Musoma is derived from a local dialect-meaning promontory or a peninsula. During the German era, it was regarded as a military post. Later the town assumed administrative and service centre roles. The military role ceased with the declaration of Tanganyika as a British protectorate territory in 1945 after the 2nd World War, when it remained as an administrative and service centre. These roles were enhanced after independence when Musoma was declared the Regional Headquarter of the newly formed region Mara region.

Musoma Municipality was selected due to the presence of many risk factors of contracting HIV/AIDS. These factors includes existence of the culture of ritual cleansing, presence of many fishing sites with migrating fishermen, its connection to neighbouring countries, that

is Kenya and Uganda via water boundaries allows unlimited movement of people from one country to another via unauthorized routes, further more being the headquarter of the region it receives various type of people coming in the region for different purposes. Not only that but also the regional annual HIV/AIDS report indicated that Musoma Municipality were having high prevalence rate, which were estimated at 6% (Mara region HIV/AIDS report, 2006). According to THMIS, (2007-08) report Mara region was found to have HIV prevalence rate of 8 percent.

3.2.2 Location

Musoma Municipality covers an area of 6300 ha² and is composed of plains with small - scattered hills. It lies between latitude 1 ° 30' south of equator and 28 ° 48' East of Greenwich. In addition, the area of Musoma Municipal slopes, towards Lake Victoria. It lies on altitudes 1,140 and 1,320 metres above sea level. The highest peak is 1,320 metres. The whole town area is a peninsula East of Lake Victoria (Fig. 2).

3.2.3 Administratively

Musoma Municipality is in Mara Region, which comprises five councils namely Musoma Municipal, Bunda District, Serengeti District, Tarime District and Musoma District Council. The town's influence extends beyond the regional boundaries to the rest of East Africa. This is due to the proximity and the good communication network by road and water transport to Kenya and Uganda. The town is well linked to other centres by both surface and air transport services. A tarmac road links Musoma to Mwanza and Sirari (Kenya border). The town is also linked by water transport to Mwanza, Bukoba, Kisumu (Kenya), and Etebe (Uganda). Musoma is also connected by air to Dar es salaam via Kilimanjaro and Mwanza.

3.2.4 Climate

Musoma has two rain seasons. The short rain period occurs between in September - December and the long rain season (locally called *echitiku*) occurs in February – May. The average rainfall amount is between 0-350 mm per year.

3.2.5 Administration

Musoma Town Council falls under the administration of 57 Sub-urban (*Mitaa*), 13 wards namely Buhare, Bweri, Iringo, Kitaji, Kigera, Kamunyonge, Mukendo, Mwigobero, Makoko, Mwisenge, Nyakato, Nyasho, and Nyamatare. The town has one division and one parliamentary constituency. Each Sub-urban/Mtaa is represented by Mtaa leader. There are, 13 elected Councillors from each ward and 5 nominated Councillors representing minority and other special groups e.g. women. The Municipal is led by a full council headed by a chairperson elected from among the councillors. The local Member of Parliament also attends council meetings. The chief executive is the Municipal Director who is assisted by 8 heads of departments namely: Education, Health, (Agriculture, Livestock, Trades and Cooperatives), Works and Fire division, Community Development, Town Planning and Economics, Finance, and Administration

3.3 Research Design

A cross sectional research design was used in this study. The design allows data to be collected at a single point in time and can be used for a descriptive study as well as determination of relationship between variables (Bailey, 1998). Limited resources and time justify the use of the selected design (Casley and Kumar, 1998). And also lends itself better for producing good results.

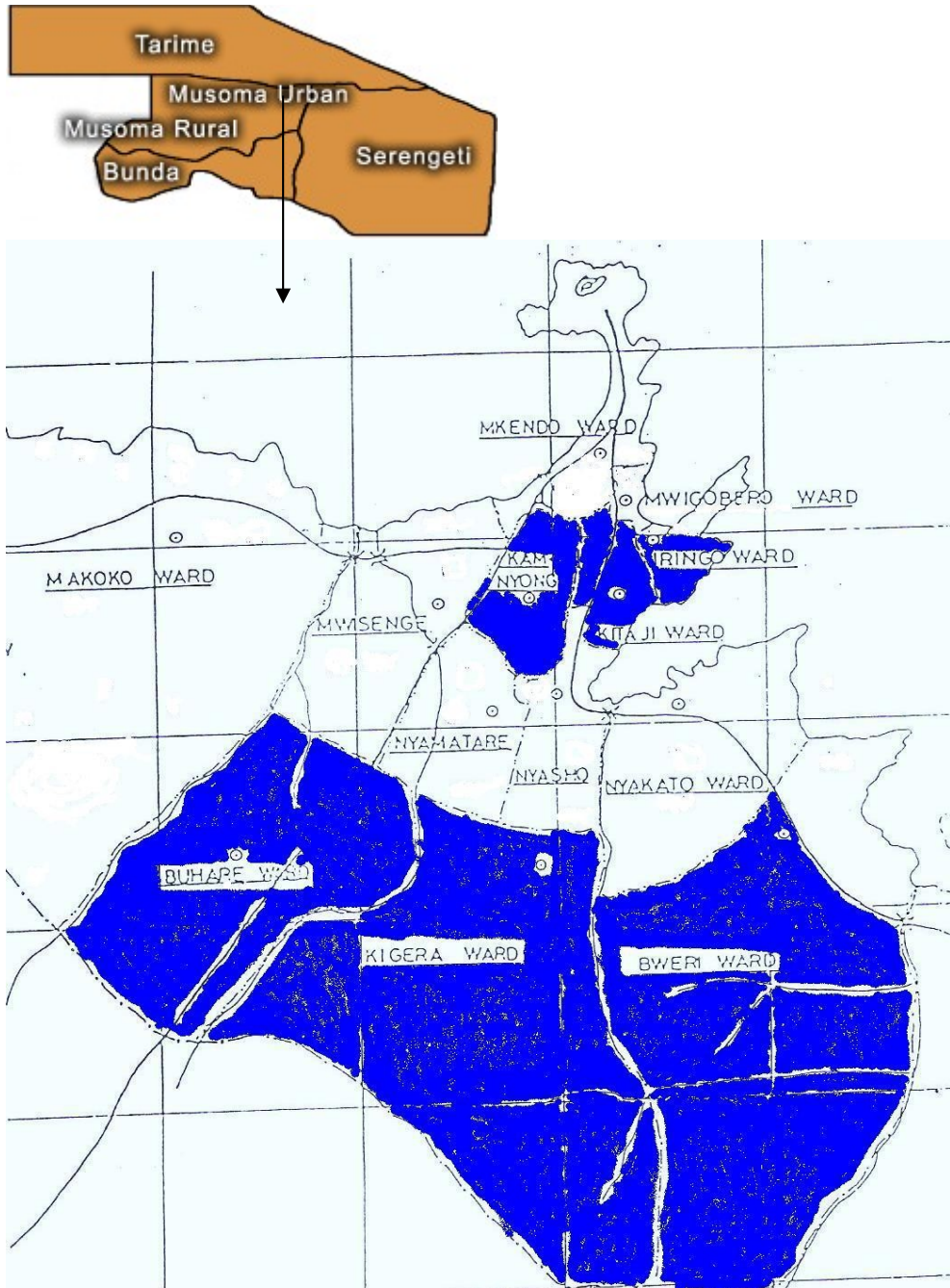


Figure 2: Map of Mara region showing studied area

Key

- Studied Wards
- Ward boundary
- Town boundaries

3.4 Sampling Procedures

3.4.1 Sample population

The target population for this research was all households of Musoma Municipality. According to the Population and Housing Census of 2002 the area was found to have a total of 108,242 people of which 51,848 were males and 56,394 females URT, 2003).

3.4.2 Sample size

A sample size of 120 was used in this study to represent the whole population in Musoma municipality based on probability sampling procedures. The sample size was arrived at in accordance to Bailey (1999), who proposed a sample size of 100 individuals to be significant for statistical analysis. In this study the head of the household was the appropriate unit from which measurement was taken.

3.4.3 Sampling method

Multistage sampling design was employed. This method allows more than one sampling method to be used and involves sampling in phases (Singleton *et al.*, 1993). In this study a combination of simple and systematic random sampling techniques were used to obtain respondents. This method is useful in large and diverse populations (Singleton *et al.*, 1993). Simple random sampling techniques were used to obtain six wards, three of them from the urban area and another three from the sub-village area. Further random sampling techniques were adopted to obtain two Streets (*mitaa*) from each sampled wards, where systematic sampling was used to obtain ten (10) respondents for interview from each street (*mitaa*).

3.4.3.1 Simple random sampling

Simple random sampling allows each subject to have equal chance of being selected (Kothari, 2004). A list of all names of urban and sub urban wards was obtained and written on pieces of papers which were then folded. The number of wards to be involved was determined and papers were randomly selected to get the wards to be involved in the study. In each particular ward a similar procedure was repeated to get the street to be involved in research.

3.4.3.2 Systematic random sampling

In systematic random sampling, subjects are selected at regular interval (Kothari, 2004). A street (*mtaa*) list comprising names of all heads of households was used as a sampling frame. This list was obtained from the street (*mitaa*) executive officers. The sampling interval was obtained by dividing the total number of head of households in the street (*mtaa*) by the required sample size from each street (N). The starting point was randomly selected, and then every Nth head of the household in the list was selected until the required sample in the hamlet was completed. Similar procedures were repeated in each hamlet to get the total respondents that were used in the study.

3.5 Data Collection Procedures

Data were collected from heads of households. Consent of interviewee was sought before beginning the interviews. Privacy and confidentiality of collected data were maintained.

3.5.1 Primary data

Primary data collection in this study was mainly based on an interview schedule. As shown in Appendix 1, a structured questionnaire containing both closed and open ended questions

was used for data collection to get the original data. The questionnaire contained questions to determine parents' participation in adolescents' home based HIV/AIDS prevention education. The process of data collection was preceded by a pilot study, which was done to test the clarity, sequence of questions and to reveal potential field problems and the information obtained were used for modifications of the questionnaire to fit the objectives of the study.

3.5.1.1 Interview schedule

A structured questionnaire was used as a tool for interviewing heads of households. The questionnaire was designed to permit acquisition of both quantitative and qualitative information, using open and closed ended questions, formulated in English and translated in Kiswahili to facilitate easy communication during data collection. The focus was to determine factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education. Data collection was done by the principal researcher assisted by three interviewing research assistants.

3.5.1.2 Focus group discussions

The researcher used focus group discussions FGDs to obtain in-depth information and ideas of the group on factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education. Four FGDs each made up of ten discussants were conducted, two from urban wards and the other two from sub-urban wards. In each setting one FGD was held for male and female discussants respectively. An interview guideline was used to help make the interview process more flexible and focused on issues being investigated. The guideline was designed in open-ended form, thus, it employed participation of the respondents, and discussions were conducted in Kiswahili. One person was invited to take note of the discussion.

3.5.2 Secondary data

Secondary data was used to improve the primary data source, and was documented from existing published and unpublished information/literature. These were accessed from Sokoine University of Agriculture National library (SNAL), as well as from electronic database such as CD-ROMs and websites.

3.6 Data Processing and Analysis

Data collected was coded, entered into the computer, verified and cleaned before analysis. The Statistical Package for Social sciences (SPSS) version 11.5 was used for data analysis. Descriptive statistics such as mean, frequencies and percentages were computed. Cross tabulations involving chi-square test were used for bivariate analysis to test association between different pairs of variables of parents' participation in adolescents' home based HIV/AIDS prevention education. The 5% level of significance was used for testing hypotheses. Some variables in this study were analysed by constructing an index with a compute statement. Consequently factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education were determined.

3.7 Limitations of the study

- a) The approach adopted in the study accord the researcher and the interviewee to have face to face dialogue for interview and group discussion on a topic that is not extensively researched in the Tanzania context. Firstly, this was appropriate for elucidating and documenting factors affecting parents' participation in home based HIV/AIDS prevention education. Secondly, the findings of this study serve to provide a basis for possible large-scale quantitative research activities by identifying various research themes.

- b) Access to public literature of relevance to the Tanzania situation on the subject of parents' participation in adolescents' home based HIV/AIDS prevention was limited at the time of study hence heavy reliance on studies from other countries. The Information Communication Technologies (ICT) through internet communication made it possible to access literature materials required for this work.
- c) The study focused almost exclusively on parent reports without taking into account adolescents' perception. Regardless of this, the study obtained the required information which enabled the process of data analysis to be carried on successfully.

CHAPTER FOUR

RESULTS AND DISCUSSION

4.1 Overview

In this chapter, the results of the study are presented and discussed in line with the study objectives and hypotheses. The chapter is divided into six sections. The first section gives the overview, the second section describes the background characteristics of the sampled respondents, while the third section deals with parents participation and its index, the fourth section presents cultural factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education. The fifth section discusses the demographic factors that influence parents' participation. The sixth section describes the social economic factors influencing participation.

4.2 Demographic and Socio-Cultural Characteristics of Respondents

A pertinent starting point for presentation of findings in a study of this nature is the examination of the demographic and socio-cultural characteristics of respondents. This provides the background for other findings of the study. Parameters described include age, sex, marital status, religion and ethnicity. Household characteristics provide an understanding of the general social, cultural behaviours and attitude of people in the area (Mzimiri, 2007). Therefore the description of the household characteristics provides the general understanding of the people studied. Data in Table 1 summarize these findings.

Table 1: Age and sex, marital status, ethnicity, household head, and religion of respondents by sex in % (N = 120)

Characteristic	Female (n = 64)	Male (n = 56)	Total
Age			
20-24	6.3	5.4	5.9
25-29	14.1	7.1	10.8
30-34	7.8	17.9	12.5
35-39	15.6	12.5	14.2
40-44	6.3	16.1	10.8
45-49	12.5	7.1	10.0
50-54	6.3	8.9	7.5
55-59	7.8	8.9	8.3
60-64	6.3	8.9	7.5
+65	17.2	7.1	12.5
Marital status			
Married	45.3	78.6	60.8
Widow/widower	25.0	7.1	16.7
Single	10.9	12.5	11.7
Cohabiting	9.4	0	5.0
Separated	4.7	1.8	3.3
Divorced	4.7	0	2.5
Ethnicity			
Jita	31.3	25.0	28.3
Kwaya	20.3	19.6	20.0
Jaluo	6.3	8.9	7.5
Kurya	3.1	10.7	6.7
Sukuma	6.3	3.6	5.0
Luli	3.1	7.1	5.0
Haya	3.1	5.4	4.2
Kelewe	1.6	5.4	3.3
Kiroba	6.3	0	3.3
Others	18.8	14.3	16.7
Religion			
Christian	79.7	71.4	75.8
Muslim	20.3	28.6	24.2
Household headship	22.5	77.5	100.0

4.2.1 Age and sex

The age distribution of respondents is presented in Table 1. In order to facilitate comparison between this study and other studies the age was presented in five-year age groups. Respondent's ages ranged between 20 and 77 years. The majority in these groups

belong to the group of reproductive age, sexually active people and economically productive. Results show that more than half of the respondents (53.3%) were females and the remaining were males.

4.2.2 Marital status

Marriage is an important factor of exposure of women and men to sexual intercourse which is the leading mechanism to HIV infection in Tanzania (TACAIDS *et al.*, 2005). Respondents in this study were requested to state their marital status, the categories used to classify marital status of respondents were; single, married, divorced, widow/widower, cohabiting and separated. In this report the term “marriage” refers to both formal and informal unions. Informal unions are those in which a man and woman stay together, intending to have a lasting relationship, without conducting a formal, civil or religious ceremony. The demographic significance of marriage patterns derive from the fact that formal or informal unions are primary indicators of exposure to the risk of pregnancy and HIV infection (TACAIDS *et al.*, 2005). In this study findings indicate that over half of the respondents (60.8%) were married. The proportion of respondents who were widow/widower stood at 16.3% of total respondents. The results further reveal that respondents who were living single accounted for of 11.7%of the respondents. The remaining respondents were in the categories of cohabiting, separated and divorced. There were more widowed females than males. This difference may be attributed to the high life expectancy of females compared to males. Since evidence shows that generally men die earlier than women (Malala, 2006).

4.2.3 Religion

Religion is considered to be an important cultural variable, since it is believed to play a strong role in family socialization, especially in relation to values (Meschke et al, 2000). Religions have always been important forms of social control, especially in the area of sexuality (Namisi, 2005). In this study respondents were asked to mention their religious affiliations, whether Muslim, Christian, traditional or none. Results show that the majority of them were Christian (75.8%).

4.2.4 Ethnicity

The study was also interested in establishing the ethnic group from which respondents belonged. Respondents were asked to mention their ethnicity in terms of tribe. Findings from the study indicate that there was a diverse number of tribes in the study area. Research findings continuously reveal that communication about sexuality varies within the population of adolescent and their parents. This variability has been related to demographic factors like gender and ethnicity. Ethnicity and socio-economic status have also been related to parent- adolescent communication (Kim *et al.*, 2007).

4.2.5 Characteristics of the general population

This sub-section provides a brief description of the population in surveyed households in terms of age and sex. Age is the most important characteristics of a population. It is used for a wide range of planning and administrative purposes such as determining the segments of population qualified for voting, school enrolment, pensions and so forth (Malala, 2006). Age in this study is presented in five years age groups by sex to facilitate data analysis. Results show that the area has a large proportion of its population in the young age than in the older ages. Further findings reveal that the population composition for both sexes

decrease with increasing age, reflecting the young structure of the studied population. These are summarized in Table 2 and (Fig, 3).

Table 2: Family members by Age and sex (%) in surveyed household

Age group (N= 608)	Percent (%)		Total
	Female	Male	
0-4	16.3	16.9	16.6
5-8	14.7	15.3	15.0
10-14	11.7	12.0	11.8
15-19	10.4	10.0	10.2
20-24	9.8	8.3	9.0
25-29	7.5	7.6	7.6
30-34	5.5	7.0	6.3
35-39	4.9	5.6	5.3
40-44	4.6	4.0	4.3
45-49	3.9	3.3	3.6
50-54	2.9	3.0	3.0
55-59	2.3	1.7	2.0
60-64	2.0	2.0	2.0
65+	3.6	3.3	2.5
Total			100.0

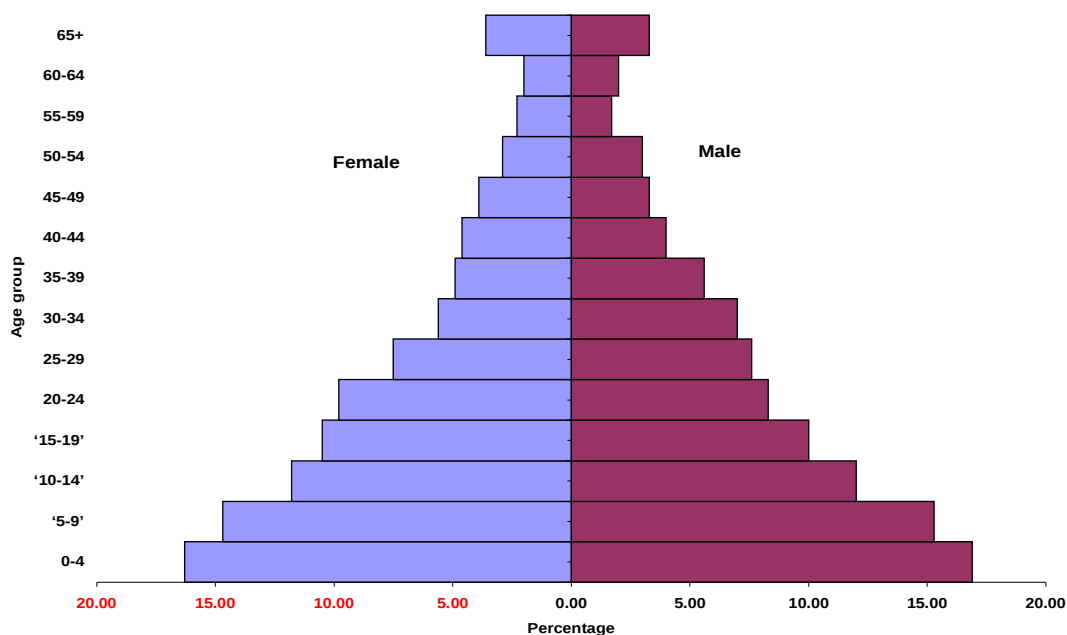


Figure 3: Population pyramid for surveyed households in Musoma Municipality

Table 3: Musoma Municipality, census records age by sex (%)

Age group (N= 108,242)	Percent		Total
	Female	Male	
0-4	15.2	16.2	15.7
5-9	13.4	13.9	13.6
10-14	12.7	12.9	12.8
15-19	11.6	12.7	12.2
20-24	11.2	10.5	10.9
25-29	8.6	7.9	8.2
30-34	6.4	6.3	6.3
35-39	4.8	4.6	4.7
40-44	3.9	4.0	3.9
45-49	2.9	3.1	3.0
50-54	2.4	2.4	2.4
55-59	1.5	1.5	1.5
60-64	1.4	1.3	1.4
+65	3.7	2.6	3.2
Total			100.0

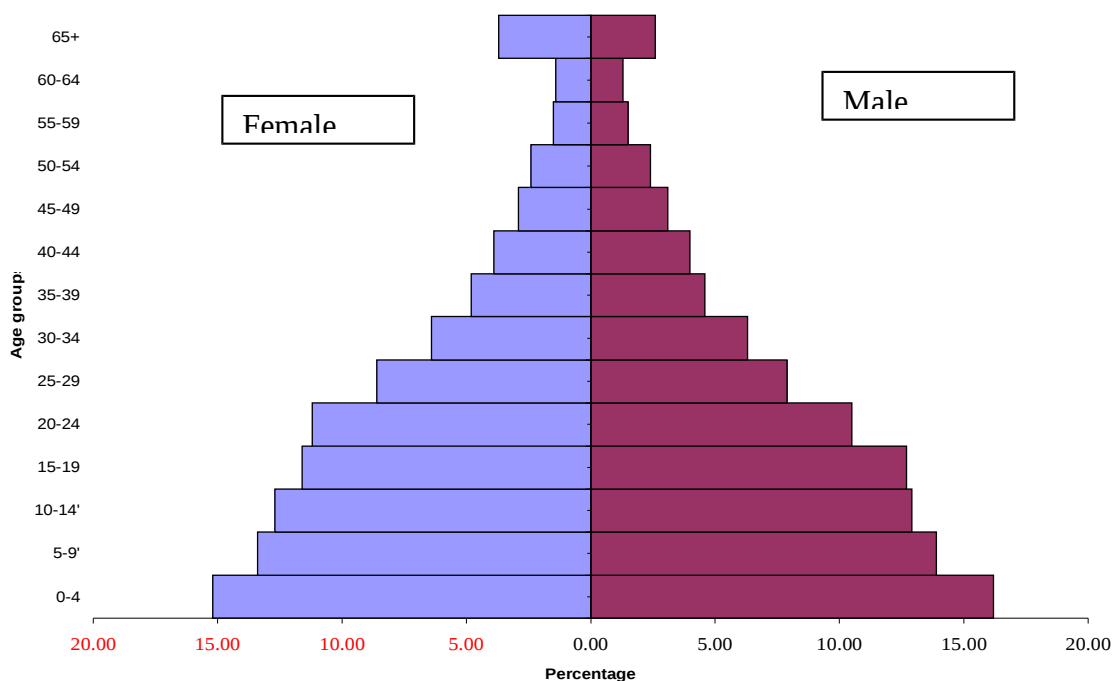
**Figure 4: Population pyramid for Musoma Municipality using census data**

Figure 3 and 4 above do not resemble exactly, this could be due to the differences in method used to collect data for their preparation. Census data are obtained by enumeration

of all population in the area, therefore are free from errors, while the survey drew a small sample from the studied population, which are subject to sampling errors such as age misreporting.

4.3 Parents' Participation in Adolescents' Home Based HIV/AIDS Prevention Education

This section provides a brief description with respect to procedures used to determine parents' participation in home based adolescents' HIV/AIDS prevention. This includes identification of participating and non participating parents, in line with construction of an index for participation.

4.3.1 Identification of participating and non participating parents

The study wanted to determine parents' participation in adolescents' home based HIV/AIDS prevention education. The study included a series of questions related to HIV/AIDS prevention methods. Respondents were asked if within one month period they have discussed one or more topics of HIV/AIDS prevention; whether they have discussed with adolescents about HIV/AIDS prevention through: abstaining from sex; consistent use of condom each time they had sex; limiting sex to one uninfected faithful partner; avoid sharing sharp objects and razor blades; avoid using unsafe injection; limit sex with someone already infected; limit blood transfusion from infected person; infected mother avoiding breast feeding.

The study found that parents discussion on HIV/AIDS prevention with their adolescents in their homes is less practiced, since only about one third (32.5%) of respondents reported to have participated in adolescents' home based HIV/AIDS prevention education. These findings are consistent with what is documented by Kirangu (2001), which showed that in a

US study that asked students who most influenced their decisions about sex, 37% cited their parents. In Zimbabwe young people said that communication with parents about sex was often one-sided, with the parents mainly warning about the dangers of sex. In Kenya, less than half of the parents of teenage children had discussed HIV/AIDS with their adolescents in the preceding year (Kirangu, 2001).

Further analysis of data by sex indicated that (41.4%) of female respondents compared to (29.4%) of male respondents participated in providing the same knowledge. According to study conducted by the Centre for Disease Control mothers (74.2%) were much more likely than father (48.9%) to discuss HIV/AIDS (CDC, 1991). HIV/AIDS is a particularly sensitive topic which many parents avoid. This was revealed in the 1991 CDC study where more than half (70%) of respondents indicated that they do not participate in adolescents' home based HIV/AIDS prevention. Many parents would like to discuss with adolescents about HIV/AIDS but are hindered by some factors. In many cultures, parents traditionally did not discuss sex with their children. Instead, grandparents, aunts, and uncles played this role, but with the breakdown of traditional cultures, many parents have been left with the challenge of talking to their children about HIV/AIDS as well as sex.

Abstaining from sex, being faithful to one faithful uninfected partner, and using condoms are important ways of avoiding the spread of HIV and AIDS. The findings summarized in Table 4 further show that a third, (30.8 %) of the respondents discussed about HIV/AIDS prevention through abstaining from sex, 25.0% through avoiding using unsafe injection, 20.8% of parents advised their children avoid sharing sharp objects and razor blades, 12.5% discussed about infected to mother to avoid breast feeding, 11.7% discussed that HIV/AIDS can be prevented through blood transfusion from an infected person, 7.5% emphasized use of condoms as a method of HIV/AIDS prevention, and few about 6.7%

discussed about HIV/AIDS prevention through limiting sex to one uninfected faithful partner.

Table 4: Responses on Parents' participation

Items asked (N= 120)	Percent		
	Yes	No	Not applicable
Within one month period whether participated in adolescents' home based HIV/AIDS prevention education	32.5	58.3	9.2
Within one month period whether discussed about HIV/AIDS prevention through abstain from sex	30.8	60.0	9.2
Within one month period whether discussed about HIV/AIDS prevention through avoid using un safe injection	25.0	65.8	9.2
Within one month period whether discussed about HIV/AIDS prevention through avoiding sharing sharp objects and razor blades	20.8	70.0	9.2
Within one month period whether discussed about HIV/AIDS prevention through infected mother avoid breast feeding	12.5	78.3	9.2
Within one month period whether discussed HIV/AIDS prevention through limiting blood transfusion from an infected person	11.7	79.2	9.2
Within one month period whether discussed about HIV/AIDS prevention through consistent correct use of condom each time have sex	7.5	83.3	9.2
Within one month period whether discussed about HIV/AIDS prevention through limiting sex to one uninfected faithful partner	6.5	84.2	9.2

Studies elsewhere have consistently revealed that many supporters of abstinence-based sex education have a background in or connected to Christian organizations that have a strong view about sex and sexuality (Kirby, 2002). As a result of the strong of faith basis for their beliefs about sex they see the main objective as being to equip and encourage young people to refuse or avoid sex altogether (Hollander, 2003). Unfortunately, however, adults have been trying to stop young people from having sex for many, many years with little success. Given this situation, this method alone seems unlikely to offer any real relief in terms of the global AIDS pandemic (Santelli et al., 2006).

Studies continue to show that being informed about the facts and the dangers of HIV/AIDS enables young people to protect themselves and is a crucial tool in the battle against HIV. There is no cure or vaccine for HIV, so prevention is the only way in which we can place any limits on the epidemic (UNAIDS, 2002). One of the most economical and effective means of HIV prevention is education – involving young people themselves in the HIV prevention effort.

4.3.2 Index of parent's participation

To analyse further parent's participation in adolescents' home based HIV/AIDS prevention, an index was developed using a list of eight variables. One of them identified participating parents in home based adolescents' HIV/AIDS prevention, while the remaining identified the topics of HIV/AIDS prevention which were frequently discussed. The eight (8) variables were indicated in section 4.3.1. Respondents' responses to each variable statement were initially recoded as 'Yes', 'No', or 'Not applicable'. Those who said 'not applicable' were then grouped together with those who said 'no'. This grouping was found to be logical since those who indicated 'not applicable' do not basically participate in adolescents' home based HIV/AIDS prevention education. For each variable statement, a value of 1 was given for the 'Yes' response and 0 for the 'No' or 'Not Applicable' response. The responses for the eight statements are summarized in Table 5 in descending order of participation.

Table 5: Responses in descending order of parents' participation in adolescents home based HIV/AIDS prevention education

Statements (N= 120)	Percent	
	Yes = 1	No = 0
Within one month period parents discussed with adolescents in their home about limiting sex to one un infected faithful partner	6.5	93.3
Within one month period parents discussed with adolescents in their home about HIV/AIDS prevention through proper use of condom each time have sex	7.5	92.5
Within one month period parents discussed with adolescents in their home about HIV/AIDS prevention through avoid blood transfusion from an infected person	11.7	88.3
Within one month period parents discussed with adolescents in their home about HIV/AIDS prevention through infected mother avoid breast feeding	12.5	87.5
Within one month period parents discussed with adolescents in their home about HIV/AIDS prevention through avoid sharing of sharp objects and razor blades	20.8	79.2
Within one month period parents discussed with adolescents in their home about HIV/AIDS prevention through avoid using un safe injection	25.0	75.0
Within one month period parents discussed with adolescents in family about HIV/AIDS prevention through abstaining from sex	30.8	69.2
Within one month period parents participated in adolescents' home based HIV/AIDS prevention	32.5	67.5

To further analyse their responses, the study computed the index of parents' participation for all 8 variables whereby all positive responses were given a value of 1 and the negative responses a value of 0. Through this approach, a respondent with an index of 8 will be viewed as having high participation since she/he responded positively to all 8 participation statements. Similarly, the one with 0 index will be regarded as not participating in adolescents' home based HIV/AIDS prevention education because of responding negatively in participation statements. The computed index for each respondent and the percentage of respondents in each index is summarized in Table 6.

Table 6: Index of parents' participation and their categorisation

Index (N =120)	Percent
0.0	67.5
1.0	0.0
2.0	0.8
3.0	4.2
4.0	15.8
5.0	3.3
6.0	5.0
7.0	2.5
8.0	0.8
Mean Index	1.5
Categories of participation	
No participation	67.5
Low participation	20.8
High participation	11.7

Moreover, the values of the index of participation were categorized in 'no participation', 'low participation', and 'high participation' in order to get a meaningful analysis. Scores of 0 were considered to be no participation, 1 to 4 as low participation, 5 to 8 as high participation in adolescents' home based HIV/AIDS prevention education as shown in Table 6. According to Table 6, the majority of respondents are in no participation category (67.5%). Those who are in low participation category were (20.8%), and those in high category were (11.7%) suggesting that the majority of them do not participate in adolescents' home based HIV/AIDS prevention education. The mean index of participation was 1.48 (approximated to 1.5) which is categorized as being low. The estimated index was further used to examine the relationship between parents' participation and cultural, demographic and socio-economic factors. F-test was used to determine the relationship between these variables and parents' participation.

4.4 Cultural Factors Affecting Parents' Participation in Adolescents' Home Based HIV/AIDS Prevention Education

This section provides a brief description of some cultural factors of individual respondents that affect parents' participation in adolescents' home based HIV/AIDS prevention education. These cultural factors include norms, values, religiosity, and type of family. Under this section, factors obtained from FGDs are also presented and discussed. These include; biasness of women right organizations, HIV/AIDS prevention programmes message and parent's time schedule.

4.4.1 Norms

This study sought information from non participating parents on whether there were any cultural factors (norms) which affect their participation in adolescents' home based HIV/AIDS prevention education. Respondents identified factors such as: 'feel shame' to discuss with adolescents in their family about sex related issues; lack of knowledge about the technical aspects of HIV/AIDS and sex; HIV/AIDS at schools settings; rite of passage, adolescents should not know about sex, and open communication leads to children's loss of respect to elders. These were the mentioned factors which discouraged parents from participating in adolescents' home based HIV/AIDS prevention education. Likewise factors such as religious disapproval of sex out of marriage, counselling adolescents on how to protect themselves from become infected with HIV/AIDS, and warning them not to engage in sex since they can get pregnant especially for girls. These were identified by respondents as factors that encouraged their participation. See Table 7.

Table 6: Cultural factors (norms and values) affecting parents' participation (%)

Cultural factors	Percent (%)
Cultural factors (Norms) discouraged parents' participation	
(N= 70)	
Feeling shame to discuss with adolescents about sex related issues	100.0

Adolescents are told about HIV/AIDS prevention and sex at school	70.0
Lack of knowledge about the technical aspects of HIV/AIDS and sex	60.0
Adolescents are told about sex when they undergo rite of passage	31.4
Cultural factors encouraged parents' participation (N=39)	
Religious disapproval of sex out of marriage	82.1
Educate adolescents how to protect themselves from get infected with HIV/AIDS	71.8
Not to engage in sex since as they can get pregnant	61.5
Values discouraged participation (N=70)	
Adolescent should not know about sex	94.9
Open communication leads to children's loss of respect to elders	66.7

4.4.1.1 Feeling shame to discuss with adolescents about sex related issues (parental discomfort and embarrassment)

Results from the study show that (100%) of respondents who did not participate in adolescents home based HIV/AIDS prevention replied that they feel ashamed to discuss with adolescents about sex related issues. Research results consistently reveal that parents and children alike are often embarrassed to talk about sex and avoid the topic. In South Africa, adolescent women said they were afraid to talk to their parents about sex.

Studies conducted by UNICEF, in Eastern and Southern Africa indicated that in Tanzania, the majority of children reported that, they seldom shared their worries on issues related to sexual matters with their parents. Instead, they were much more likely to share such information with their friends (Pattman and Chenge, 2003). Fathers reported that they could not discuss with their daughters about bodily changes or the sexual act because it would be like sexual harassment (Kajula, 2005). Communication between parents and their children about sex is often difficult. Young people cannot protect themselves if they do not know the facts about HIV/AIDS (UNFPA, 2003). Adolescents must learn the facts before they become sexually active, and the information needs to be regularly reinforced and

updated, both in the class room and beyond. Life skills, skills in negotiation, conflict resolution, critical thinking, decision making and communication are critical for young people (UNFPA, 2003). Parents and other family members are in a unique position to help socialize adolescents into healthy sexual adults both by providing accurate information about sex and by fostering accurate information which is a prerequisite for sexual decision making skills (Cornellius *et al.*, 2008; Martino *et al.*, 2008).

4.4.1.2 Lack of knowledge about the technical aspects of HIV/AIDS and sex

Results from the study show that (60%) of non participating respondents indicated that, the barrier to HIV/AIDS communication stems from parent's lack of knowledge about the technical aspects of HIV/AIDS and sex related issues. These findings are in line with the observations made by (Guilamo-Ramos *et al.*, 2007; Allen *et al.*, 2008), who found that Latino parents did not talk to their adolescents about sex because they felt that they did not have the necessary knowledge or skills to talk about sex with their children. In another research, findings revealed that parents in US reported that another reason for poor communication was that their teenage children might ask questions the parents could not answer (Guilamo-Ramos *et al.*, 2007; Allen *et al.*, 2008). In developing countries, and especially in rural areas, parents are often less educated than their children and worry that they lack the knowledge to talk with their children about sex (Wilson *et al.*, 1994). In Tanzania, parents reported that they lack the relevant information about HIV/AIDS communication (Kajula, 2005; Namisi *et al.*, 2008).

4.4.1.3 HIV/AIDS prevention knowledge through rite passage

More than a quarter (31.4%) of non participating respondents continued to follow the old traditional culture of rite of passage because they reported that adolescents are told issues

related to sex when they undergo rite of passage. According to Namisi (2005), some parents in Kenya declared that discussion on sexuality in family was not considered important because there existed an alternative during the passage of rites. Literatures consistently reveal that in many cultures parents traditionally did not discuss sex with their children (Kirangu, 2001). Many researchers agree that parent-child communication about HIV/AIDS and sexuality should begin early in order to evolve comfortably as the child matures (Kirangu, 2001). A single serious talk about sex as a child enters puberty is likely to be strained and awkward.

4.4.1.4 HIV/AIDS prevention at schools

Schools are highly effective and an appropriate place to teach young people about HIV prevention, information, and skills before they begin the behaviours that put them at risk for HIV infection (UNAIDS, 2002). Results from this study revealed that some parents (70 %) do not discuss about HIV/AIDS prevention with their children because they believe that children are told about it at schools. These findings collaborate Namisi *et al.* 2008; who reported that parents expect their children to get sexuality instruction at school. In a review of studies of school-based HIV prevention programmes in Africa, 10 of 11 studies found that schools were associated with significant improvements in young people's HIV-related knowledge, and that all studies' that assessed students' attitudes detected positive behavioural changes (Namisi *et al.*, 2008). The review found evidence that school-based programmes can contribute to delayed sexual initiation, a reduction in the number of sexual partners, and increases in condom use, although producing sustained behavioural change appears more difficult than increasing knowledge, (Namisi *et al.*, 2008).

4.4.1.5 Religious disapproval of sex out of marriage

Further study findings reveal that participating respondents (82.1%) said that religious disapproval of sexual out of marriage influenced their participation. Literature reveal that most religions permit sex only in marriage since it is felt that only this formal commitment will allow for responsibilities, both physical and emotional, that come with the sexual act (Kanyi, 2002). Various religious bodies tend to advocate premarital abstinence and marital fidelity as preferred forms of HIV/AIDS prevention (Takyi *et al.*, 2005).

4.4.1.6 Educate adolescents on how to protect themselves from become infected with HIV/AIDS

It was earlier disclosed in this study that some of the participating parents (71.7.8%) indicated that they discussed HIV/AIDS with adolescents in their homes so as to educate them on how to protect themselves from becoming infected with the disease. According to UNAIDS (2006) sexual health education to adolescents can help protect them from being infected with HIV by promoting healthy lifestyles and avoidance of risky behaviours.

4.4.1.7 Not to engage in sex as they can get pregnant

Data in Table 7 show that participating parents (61.5%) indicated that their reason for participation in adolescents' home based HIV/AIDS prevention were to warn their adolescent not to engage in sex to avoid becoming pregnant. Research conducted by UNICEF in Eastern and Southern Africa revealed that the few parents who reportedly discussing sexuality issues with their children, generally discussed issues of STD, HIV/AIDS, menstruation and the breaking of boys voice. They also stressed the avoidance of pregnancy, even threatening dire consequences (Pattman and chege, 2003).

4.4.2 Values

This section is made up of two sub-sections, each presents discussions on respective cultural values. This study sought information from non participating respondents on whether there were any cultural values which prevented their participation in adolescent home based HIV/AIDS prevention education. Respondents identified two values namely adolescent should not know about sex and that open communication about sex leads to children's loss of respect to elders, as reasons for participating in adolescents' home based HIV/AIDS prevention education.

4.4.2.1 Adolescent should not know about sex

Study findings indicate that non participating respondents (94.9%), were of the view that in their culture there is unwillingness to accept that children and adolescents should know about sex mainly because they feared encouraging adolescent about unintended sexual behaviour. Studies reveal that many adults particularly those of the religious right believe that teens need to be prevented from indulging in these high-risk activities. They believe that young people should not and do not need to be provided with any education about these subjects. They should rather be told that they are 'wrong', and not to do such things. Findings summarized in Table 7.

4.4.2.2 Open communication leads to children's loss of respect to elders

Results summarised in Table 7 reveal that (66.7%) of non participating respondents disapproved open communication about sex with adolescents arguing that this idea might make children lose respect for elders. This cultural value is commonly shared in many societies Research conducted in US reported that parents were also critical of mainstream American parents' open, friend-like communication with children, arguing that these ideals

contributed to children's loss of respect for elders, (Kim *et al.*, 2007). Research done in Kenya revealed that parent and adolescent informants explained that mentioning reproductive organs or sexual intercourse is considered disrespectful, in particular when this occurs between parents and their children (Namisi, 2005). As their first socializing agents, parents are placed in a the unique opportunity to provide children with sexual facts, values, and beliefs that will ground their understanding of sexuality and may, in turn, have enduring effects on their sexual decision making (Kim *et al.*, 2007).

4.4.2.3 Factors affecting parents' participation revealed from male group discussion

Although during the interview approximately one third of the respondents reported that they participate in adolescent home based HIV/AIDS prevention, in FGDs discussion, male participants also indicated that their participation was very low. Results of their discussions are summarised below.

Women Right Organizations were blamed to be bias towards women and girls, and neglected men and boys. *“There are many organizations which address the rights and social issues of women and girls while there are none for men and boys. As a result our voice in the family is neglected by women, we have lost the power to control our family in favour of women”*. *Even if a woman is misbehaving in your home you can't do anything to correct the situation, because once you attempt, you will find yourself under the police control and then in court, we are afraid of the hands of the law, we are forced to leave them to behave the way they like. In that situation you can't talk anything to the children adolescents' about behaviour”*.

HIV/AIDS prevention messages were also identified as a factor affecting parents' participation in adolescents home based HIV/AIDS prevention education. Male discussants

revealed that they start talking to their adolescent when they notice that they have started to engage in boy-girl relationships. Hence they counsel them not to engage in love affairs, since they are still schooling. While advising those who are not in school to wait until when they get married. However they argued that their efforts are neutralized by the contradictory messages from HIV/AIDS stakeholders. The Government and Non government organizations insist on abstinence, one uninfected faithful partner and use of condom for HIV/AIDS prevention. It is difficult for a parent to tell their children to use the last two alternatives because they contradict to religious teaching and societal expectations. These messages were blamed for encouraging adolescent to enter into sexual relationships while they are still schooling.

The media was also blamed since it contradicts HIV/AIDS prevention by broadcasting songs with themes which encourage youth to involve in love affairs which eventually could lead into sexual relationship. Magazines were blamed for displaying pornographic pictures which could convince adolescent to practice what is displayed in these types of publications.

Parent time schedule showed by lacks of time, being busy all the time were also reported to be a barrier for parent-child communication. Discussants revealed that most of the parents go away from home and come back very late at night when children are already fallen asleep.

4.4.2.4 Factors affecting parents' participation as revealed from female group discussion

Female discussants revealed that age of children, sense of feeling shame on adolescent side, as well as lack of skills and knowledge on subject matter to be barriers for their

participation in home based HIV/AIDS prevention education. Their discussions are summarised as: *“our children are still young 12-14 years, they have not started to engage in sexual relationship. That is why we haven’t started educating them about HIV/AIDS prevention”*.

They also added that male adolescents feel shame to talk to their mothers, *“we want to talk to our sons about HIV/AIDS but the problem is that they do not say anything because, they are shy, they look down and leave”*.

Lack of skills and knowledge about the subject matter of HIV/AIDS was also revealed to affect their participation. We are giving them instructions on expected behaviour and warning them about negative side effects of early initiation of sex, such as contracting HIV/AIDS. *“We are advising that it is better to be supplied with books about HIV/AIDS prevention so that when we introduce the lesson we instruct them to refer to it”*.

4.4.3 Religiosity

The study was also interested in analyzing the influence of religiosity on parents’ participation in adolescents’ home based HIV/AIDS prevention education. In order to compute religiosity, the study included a series of questions related to the subject. Respondents were asked whether: they believe in God; go church or mosque; have the habit of having self prayers; fast during the holly month of “Ramadhani” or “Kwaresima” in swahili; if have other period of fasting; give offering to the poor or disabled or orphans; and if they pay ten percent of ties. Study findings indicate that all respondents belong to certain religious affiliation as (100%) answered that they do believe in God. Further findings are summarized in Table 8.

Table 7: Responses on religiosity statements

Items asked (N = 120)	Percent	
	Yes=1	No=0
Do you believe in God?	100	0
Do you go to church or mosque	99.2	0.8
Do you have habit of self-prayers	94.2	5.8
Do you fast during the holly month of Ramadhani or Kwaresima	78.3	21.7
Do you have other periods of fasting	2.5	97.5
Do you give offering to the poor or disabled or orphans	85.0	15.0
Do you pay ten percent of ties	85.0	15.0

4.4.3.1 Index of religiosity

To analyze further on religiosity, an index was developed using a list of seven variables. The seven variables are those stated in section 4.3.3 above. The responses to each variable statement were initially recorded as Yes and No. For each variable statement, a value of 1 was given for 'yes' responses and 0 for the 'no' responses. The responses for the 7 variable statements are summarized in descending order in Table 8.

To further analyse their responses the study computed the index of religiosity for all 7 variables. Through this approach, a respondent with an index of 7 would be viewed to be highly religious since she/he has managed to answer all 7 religious statements correctly. Similarly, the one with a 0 index would be regarded as not being religious for failing to answer religious statements. The computed index for each respondent and the percentage of respondents in each index are summarized in Table 9. Moreover the values of the index of religiosity were categorized in low, medium, and high religious in order to get a meaningful analysis. Scores of 0 to 3 were considered as low, 4 to 5 as medium and 6 to 7 as high religious as shown in Table 9. According to Table 9, the majority of respondents were in the high category (64.2%).

Table 8: Index of religiosity

Index (N = 120)	Percent
1	0.8

3	5.8
4	7.5
5	21.7
6	61.7
7	2.5
Mean index	5.4
Categories of religiosity	
Low	6.7
Medium	29.2
High	64.2

4.4.3.2 The effect of religiosity on parents' participation in adolescents' home based HIV/AIDS prevention education.

The study results reveal that the relationship between strength of religious beliefs and index of parents' participation was statistically significant ($P=0.052$) implying that parents with different religious beliefs strength their participation levels is not equal. From Table 10, the mean index score was higher for highly religious parents, and lower for low religious parents, indicating that highly religious parents were more likely to participate in adolescents' home based HIV/AIDS prevention education than low religious parents. Data in Table 10 therefore reject the hypothesized relationship between strength of religious belief and parents' participation. It was hypothesized that parents with high religious belief do not participate in adolescents' home based HIV/AIDS prevention education. These findings contradict study findings from the US by Guilamo-Ramos *et al.* (2007) who concluded that religious beliefs between parents and adolescents may serve as a barrier to communication. Religious parents may perceive that their faith community discourages open discussions about sexual behavior (Guilamo-Ramos *et al.*, 2007). Religiosity has been found to both negatively and positively predict parent-adolescent communication on moral issues. For instance, Lefkowitz *et al.* (2003) found that being less religious was associated with adolescents discussing safe sex with their mothers. According to Dolorio *et al.* (2000),

mothers with strong religious beliefs have a heightened sense of duty as a parent to educate their children on moral and ethical issues including issues related to sexuality.

Table 9: Effect of Parents' religiosity on participation in adolescents' home based HIV/AIDS prevention education (%)

Parents' religiosity (N = 120)	Mean	F	P
Highly religious	1.81	3.031	0.052
Medium religious	1.11		
Low religious	0.00		
Mean index	1.5		

4.4.4. Type of family

In this study type of family represents household headships, whether male or female headed. The study also wanted to establish the influence of household heads in parents' participation in adolescents' home based HIV/AIDS prevention education. Respondents were asked to give the sex of the household head, whether female or male. Study findings indicate that more than three quarters of studied households (77.5%) were headed by males, and the remaining (22.5%) were headed by females. Literatures consistently reveal that in Patriarchal societies most of the households are headed by males, but also the existence of HIV/AIDS has fuelled the increase of female headed households

4.4.4.1 Effect of Types of family on parents' participation in adolescents' home based HIV/AIDS prevention education

The study was also interested to analyse the influence of sex of the head of household on parents' participation in adolescents' home based HIV/AIDS prevention education

Table 10: Effects of sex of household head on parents' participation in adolescents' home based HIV/AIDS prevention education%

Sex of head of household	Mean	F	P
(N = 120)			
Male	1.53	0.15	0.699
Female	1.33		
Mean index	1.5		

Survey results show no significant relationship between sex of head of household and parents' participation in adolescents' home based HIV/AIDS prevention education.

4.5 Demographic Factors

This section presents the results and discussions about demographic factors.

The examination of the influence of family size and composition on parents' participation was one of the objectives in this study. In this study, demographic factors stand for family size and family composition, the former signifies the number of usual members of family while the later represents the same by age and sex.

4.5.1 Family size

In order to achieve this objective, the study gathered information about usual members of household. Family size has been analysed by considering the number of individuals in the household. The size of the family was grouped into three groups basing on the Tanzania Demographic Healthy Survey (2005) i.e. less than five, between five to ten and above ten. Research finding indicate that the majority of households (61.7%) consist of 6-10 people with the average family size of 5.1, (Table 12 and Figure 1). These findings are similar to those obtained by 2002 population census report, where urban areas of Tanzania, the family

size were reported to be 5.1. These was slightly large from the actual family size of 4.7 of Musoma Municipality reported by the Tanzania Population and Housing Report (2002).These difference might be due to rural urban migration.

Table 11: Family size, mean family size and family categories

Characteristics	percent
Family sizes (N =608)	
1	2.5
2	5.0
3	10.8
4	20.0
5	23.3
6	20.8
7	10.0
8	12.5
Total	100.0
Mean	5.0
Family size groups	
1-5	60.8
6-10	39.2
Family size categories	
Small family size	60.8
Medium family size	39.2
10 and above	0.0
Total	100.0

4.5.1.1 Effect of family size on parents' participation in adolescents' home based HIV/AIDS prevention education.

Family size was used to represent the number of people in the household. Analysis of the results indicated that, the F-test for index of participation and family size did not show significant relationship.

Table 12: Effect of family size on parents' participation in adolescents home based HIV/AIDS prevention education %

Family size (N = 120)	Mean	F	P
Medium size family	1.64	0.356	0.552
Small size family	1.38		
Mean index	1.5		

4.5.2 Family composition by age

In order to analyse family composition by age, the study sought information about family members by age. These were then categorized into five years age interval for easing further analysis. The study findings revealed that the relationship between family members' age and index of parents' participation in adolescents' home based HIV/AIDS prevention did not show any significant relationship. Data in Table 14 show that the mean index score was highest, that is 1.50 in 10-14 age groups, reflecting high parents' participation and lowest that is 1.22 in (30-34 as well as 40-44) age groups implying infrequent parents' participation. These mixed findings might be due to existence of people of different age groups in the families. Researchers indicate that parents usually started talking about sex education to their children during the preteen years, while some introduced the subject

before adolescents reached age of 13. Some initiate discussing when their children are in late adolescent and some never discussed with their children (Schutt-Aine, 2003).

4.5.2.1 Effects of family members' sex composition on parents' participation in adolescents' home based HIV/AIDS prevention

The family composition by sex was found by using the number of male and female members in the particular household. Then the members in the family were grouped into more male members, equal number of male and female and more female members for further analysis.

Table 13: Effects of family members' age composition on parents' participation in adolescents' home based HIV/AIDS prevention education %

Family member age composition (N = 608)	Mean	F	P
0-4	1.44	0.062	0.736
5-9	1.44		
10-14	1.50		
15-19	1.45		
20-24	1.49		
25-29	1.39		
30-34	1.49		
35-39	1.22		
40-44	1.08		
45-49	1.18		
50-54	1.22		
55-59	1.30		
60-64	1.26		
+65	1.24		
Mean index	1.5		

Table 14: Effects of family members' composition by sex on parents' participation in adolescents' home based HIV/AIDS prevention education %

Family members' sex composition (N =608)	Mean	F	P
More female members than male	1.66	0.622	0.538
More male members	1.55		
Male members equals female	1.07		
Mean index	1.5		

Results in Table 15 show that the mean index was highest for “more female members than male” families and lowest for “male members equals female” families. These findings are in line with previous research findings, which consistently indicate that daughters are more often the recipients of sexual instruction within the family than sons (Meschke *et al.*, 2000; Lefkowitz *et al.*, 2003). Results show no statistical significance. The F-test for index of parents' participation and family members' sex composition did not show any significant relationship. This may reflect the constraining influence of male children on family communication regarding sexuality. Literature revealed that having older brothers (but not sisters) at home while growing up was associated with lower levels of sexual communication with both parents. (Raffaelli *et al.*, 2003).

4.6 Socio-Economic Factors

This section provides a brief description of socio-economic characteristics affecting parents' participation in adolescents' home based HIV/AIDS prevention education. This includes education, occupation, economic status (income) and HIV/AIDS awareness.

4.6.1 Education level of respondent

Education is a key determinant of the life style and status an individual enjoys in a society. Education provides people with knowledge and skills that can lead to a better quality life. Studies have consistently shown that educational attainment has a strong effect on reproductive behaviour and contraceptive use, fertility, infant and child mortality, morbidity, attitudes and awareness related to family health and hygiene (TDHS, 2005). The results from this study revealed that there is a variation in education levels attained by respondents with the majority of respondents (69.2%) having attained primary education, and (0.8%) attended adult education (see Table 16 and Fig. 5).

Further analysis of data by sex, indicates that the majority of female respondents attended primary school (73.3%) compared to male (64.3%). Moreover, the majority of male respondents (25%) attended secondary school compared to (9.4%) of women and for those who didn't go to school, women constitute the majority (14.4%) in relation to men (8.9%). This discrepancy is consistent with societies in which gender inequalities and cultural norms grant men priority over women to receive schooling.

Table 15: Highest education of respondents by sex in (%) N = 120

Education level	Sex		Total
	Female	Male	
None	14.1	8.9	11.7
Adult education	1.6	.0	.8
Primary school	73.4	64.3	69.2
Secondary school	9.4	25.0	16.7

Post secondary school	1.6	1.8	1.7
Total	53.3	46.7	100.0

4.6.1.1 Effect of respondents' education level on parents' participation in adolescents home based HIV/AIDS prevention education

In this section, results of the influence of respondent's education level on participation in adolescents' home based HIV/AIDS prevention are presented and discussed. Results in Table 17 show that the relationship between index of parents' participation and education level of parents was statistically significant ($P= 0.000$). This implies that parents belonging to different education levels do not participate equally in adolescents' home based HIV/AIDS prevention education. The mean index score was higher for respondents with post-secondary education level and lowest for those who did not go to school as well as those who attended adult education, 6.00 and 0.00 respectively. These findings indicate that, parents with post secondary education participate more in adolescents' home based HIV/AIDS prevention education than those who did not go to school as well as those who attended adult education.

Results summarized in Table 17 therefore confirm the hypothesized relationship between parents' education levels and index of parents' participation. It was hypothesized that parents with secondary education and above do not participate in adolescents' home based HIV/AIDS prevention education. Findings are in line with the observation made by Hare and Villarruel, (2007), who demonstrated that female parents with higher educational attainment considered themselves to be more frequent communicators of sexual information than other respondents. In a study conducted in US among Asian-American school children, research results indicated that parents with more formal schooling were perceived as providing higher overall amounts of sexual communication to their children (Kim *et al.*, 2007). In support of earlier work Lefkowitz *et al.* (2003), mothers who

discussed safer sex tended to be more educated than those who did not. Individuals of lower SES tend to know less about AIDS/HIV and thus, may know less about safer sex practices than more educated individuals.

Table 16: Effect of respondents' level of education on participation in adolescents' home based HIV/AIDS prevention education %

Respondents education level (N = 120)	Mean	F	P
none	.00	22.211	0.000
Adult education	.00		
Primary school	.94		
Secondary school	4.40		
Post secondary school	6.00		
Mean index	1.5		

4.6.2 Occupation

This section presents the occupation status of respondents. Occupation to a large extent is determined by education. It is argued that there is a strong relationship between earning from paid employment and education level of household head. Respondents were asked to give their occupation among the list of occupations given to them. Occupation status of respondent was required to present information as the main activity of respondent and probably the major source of income for the particular households. Results reveal that the main occupation of most household was business. (See Table 18 and Figure 5). Further analysis of data by sex reveals that majority of male respondents (35.7%) were involved in business, while the majority of female respondents were engaged in agriculture (40.6%).

Table 17: Distribution of respondents' occupation by sex (%)

Occupation (N = 120)	Sex		Total
	Female	Male	
Agriculture	40.6	17.9	30.0

Business	29.7	35.7	32.5
Employed	9.4	14.3	11.7
Retired officer	6.3	8.9	7.5
Fishing	4.7	8.9	6.7
Others	6.3	7.1	6.7
Manufacturing	3.1	7.1	5.0
Total	53.3	46.7	100.0

4.6.2.1 Effects of respondents' occupation on participation

Study results reveal that the relationship between occupation and index of participation was statistically significant ($P= 0.010$). Meaning that parents with different occupational status do not have the same level of participation in adolescents home based HIV/AIDS prevention education. The mean index score was higher for employed and lowest for parents with petty trades, showing that employed respondents participated more in adolescents' home based HIV/AIDS prevention education than respondents who were engaged in small temporary based business activities.

Table 18: Effect of parents' occupation on participation in adolescents' home based HIV/AIDS prevention %

Respondents' occupation	Mean	F	P
(N = 120)			
Employed	3.86	3.969	0.01
Retired officer	2.33		
Business	1.26		
Manufacturing	1.17		
Fishing	1.13		
Agriculture	0.94		
Others	0.50		

Mean index	1.5
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This might be due to the influence of their educational achievement as was observed in section, 4.5.1.1 above.

4.6.3 Economic status

In this study, the economic status of respondents was estimated using the average amount of money spent on different meals of a day (Breakfast, lunch and supper). Respondents were asked to estimate the amount of money they spent in a day on the above. Study findings were used as the basis for grouping respondents into low economic status to highest. Those who spent up to 5,000 Tanzanian shillings were categorized as belonging to low economic status, 5,001-10,000 shillings medium, 10,001-15,000 high and 15,001-20,000 highest. Results reveal that (63.3%) of respondents fall under the low economic status were female constitute the majority in this group. The mean income per day was found to be 4,500 Tanzanian Shillings which is categorized as low economic status. These findings are summarized in Table 20 and Figure 6.

Table 19: Economic status of respondents by sex %

Estimated income per day in Tanzanian shillings	Sex		Total I
	Female	Male	
Low economic status	71.9	53.6	63.3
Medium economic status	23.4	44.6	33.3
High economic status	3.1	1.8	2.5
Highest economic status	1.6	0.0	0.8
Total	53.7	46.3	100

Table 20: Effect of parents' economic status on participation in adolescents' home based HIV/AIDS prevention education %

Economic status of respondents (N = 120)	Mean	F	P
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Highest income	5.00	1.163	0.327
High income	2.67		
Medium income	1.55		
Low income	1.36		
Mean index	1.5		

4.6.3.1 Effect of respondents' economic status on parents' participation in adolescents home based HIV/AIDS prevention education.

Results in Table 21 show that the mean index was high for highest income respondents and lowest for low income respondents. This means that parents with highest income participated in home based adolescents' HIV/AIDS prevention education than those with lowest income. The F-test for index of participation and economic status of respondents did not show significant relationship. These findings are similar to those observed by Miller *et al.* (1998), who concluded that household income were not associated with any of the communication variables.

4.6.4 Knowledge of HIV transmission and prevention methods (HIV/AIDS awareness)

This section examines HIV/AIDS awareness of respondents. In order to determine HIV/AIDS awareness, the study included a series of questions related to knowledge of HIV/AIDS transmission and prevention methods. Respondents were asked if they have ever heard of AIDS; whether HIV/AIDS can be transmitted from mother to child during delivery; whether HIV/AIDS can be transmitted by abstaining from sex; through consistent use of condom each time they have sex; through sex with someone already infected; through blood transfusion of an infected person; through sharing sharp objects and razor blades; and through eating and sharing utensils with an infected person.

The study results revealed that knowledge of AIDS is wide spread with 100% of respondents having heard of AIDS as shown in Table 22. The 2003-04 THIS and 2004-05

TDHS also found high knowledge among people with 99% of respondents in both surveys having heard of AIDS. Abstaining from sex, being faithful to one uninfected partner, and using condoms are important ways to avoid the spread of HIV and AIDS. The findings summarized in Table 22 show that 95.5% of respondents were knowledgeable about this and knew that HIV/AIDS can be transmitted through blood transfusion. 95.5% of the respondents were of the view that people can reduce their chances of getting the AIDS virus by avoiding sharing of sharp objects (needles and razor blades); 85% were aware that HIV/AIDS can be transmitted from mother to child during delivery; 75% of them reported that abstaining from sex can reduce the spread of the disease; while 65% reported that consistent use of condoms lowers the transmission from one person to another. However, few of them 9.2% had the misconception that the disease can be transmitted by eating and sharing utensils with AIDS sick people.

The study was also interested in assessing their knowledge of HIV and AIDS prevention. The study results that the majority of respondents (see Table 22) were aware of the possibility of preventing infection of the AIDS virus through avoiding use of unsafe injections (95.8%); sharing sharp objects and razor blade (95.8%); having sex with people who inject blood intravenously (95%); and infected mother avoid breastfeeding (93.3%). Results further indicate that those who indicated abstinence from sex were (92%), use of condom (86.7%) and limit sex to one faithful partner (85%). In addition to knowing about effective ways to avoid contracting HIV/AIDS, respondents also were able to identify incorrect beliefs about HIV/AIDS prevention. Study findings presented in Table 22 reveal that the majority of respondents (95.5%) know that people cannot get the AIDS virus from touching an infected person; 94.2% of them reported that people cannot get AIDS virus by sharing a plate of food with a person who has AIDS. Similarly, 92.5% of the respondents were aware that people cannot get the AIDS virus from mosquito or insect bites.

4.6.4.1 Index of knowledge of HIV/AIDS

To analyze further the knowledge of HIV/AIDS transmission and prevention methods among parents an index was developed using a list of 19 variables. Twelve (12) of these tested their general knowledge on HIV and AIDS prevention. Among them four questions were on the common misconception about HIV and AIDS in Tanzania. Seven variables tested their knowledge of transmission. The seven variables were whether AIDS virus can be transmitted from mother to child during delivery, be transmitted by abstaining from sex, be transmitted by infected persons using condom each time they have sex, infect a person who has sex with a partner who is already infected, infect people through blood transfusion from an infected person, infect a person through sharing sharp objects and razor blades, and infect people by eating from the same plate with AIDS sick person.

The twelve (12) variables on prevention of HIV and AIDS include whether it is possible for a person to prevent AIDS virus through abstaining from sex; whether consistent use of condom each time they have sex can lower the chances of getting infected by AIDS virus; whether limiting sex to uninfected faithful partner can lower the chances of being infected by the AIDS virus; whether the infection of the AIDS virus can be limited through avoiding of sharing sharp objects and razor blades; whether infection of the AIDS virus can be limited through seeking protection from traditional healers, whether infection of the AIDS virus can be limited by avoiding blood transfusion; whether it is possible for a person to be infected by the AIDS virus by avoiding unsafe injections; whether avoiding sex with drug abusers can lower the chances of contracting the AIDS virus; whether an infected mother who avoids breastfeeding lowers the chances for her child from contracting the AIDS virus; whether it is possible for a person to lower the chances of contracting AIDS infection by

avoiding mosquito/insects bites, touching a person who has AIDS, and avoiding sharing food with people who have AIDS.

The responses to each variable statement were initially recoded as Yes and No. For each variable statement, a value of 1 was given for the correct response and 0 for the incorrect response. The responses for the 19 Statements are summarized in Table 22 in descending order of lack of knowledge.

To analyze further their responses, the study computed the index of knowledge for all 19 variable whereby all correct responses were given a value of 1 and incorrect responses a value of 0. Through this approach, a respondent with an index of 19 would be viewed as having high knowledge since she/he managed to answer all 19 knowledge statements correctly. Similarly, the one with a 0 index will be regarded as having no knowledge on HIV and AIDS for failing to answer correctly the knowledge statements. The computed index for each respondent and the percentage of respondents in each index are summarized in Table 23. Moreover, the values of the index of knowledge were categorized as low knowledge, medium knowledge and high knowledge in order to get the meaningful analysis. Scores of 0-6 were considered as low knowledge, 7-13 as medium knowledge and 14-19 as high knowledge on HIV and AIDS transmission and prevention as shown Table 23.

According to Table 23, the majority of the respondents were in the high category (98.3%). Those who were in the medium knowledge categories were only (1.6%), suggesting that majority of them have high knowledge on HIV and AIDS. The mean index of knowledge was 17.20 which is categorized as high.

The findings are in line with the general conclusion drawn from other studies including the recent ones (2003-04 THIS and 2004-2005 TDHS) that have indicated that the knowledge of HIV and AIDS in Tanzania to be high (TACAIDS *et al.*, 2005). Results from the analysis of knowledge questions support the above general conclusion.

4.6.4.2 Effect of respondents' HIV/AIDS awareness on parents' participation in adolescents home based HIV/AIDS prevention

Results summarized in Table 24 indicate that the mean index is higher for respondents belonging to the high HIV/AIDS knowledge category and lowest for respondents under medium HIV/AIDS knowledge category.

Table 21: Responses on knowledge of HIV and its transmission in descending order

Statements	Percent (N =120)	
	Yes = 1	No = 0
Can AIDS virus be transmitted by an infected person using condom correctly each time they have sex?	32.2	65.8
Can people be infected by AIDS virus through abstaining from sex?	30	75
Can AIDS virus be transmitted from mother to child during delivery?	85	15
Limiting sex to uninfected partner can lower the chance of being infected by AIDS virus?	85.0	15.0
Consistent correct use of condom each time people have sex can lower the chances of being infected by AIDS virus?	86.7	13.3
AIDS virus can infect people by eating from the same plate with AIDS sick person	9.2	90.8
Is it possible for a person to prevent AIDS virus infection through abstaining from sex?	92.5	7.5
Is it possible for a person to lower the chances of contracting AIDS infection through avoiding mosquito or insect bites?	7.5	92.5
Is it possible to lower AIDS virus infection for a child by an infected mother avoiding breast feeding?	93.3	6.7
Is it possible for a person to lower the chances of contracting AIDS virus through avoid sharing food with people who has AIDS?	5.8	94.2
Can AIDS virus infect a person who has sex with a partner who is already infected?	95	5
Can AIDS virus infect a person through sharing sharp objects and razor blades	95	5
Is it possible for a person to lower the chances of contracting AIDS virus through avoid touching a person who has AIDS	5	95

Can people lower the chances of contracting the AIDS virus by avoid sex with drug abusers?	95	5
Is it possible to lower the AIDS virus infection through avoiding unsafe injections?	95.8	4.2
Is it possible for people to lower the chances of AIDS virus infection through avoid sharing sharp objects and razor blades?	95.8	4.2
Can AIDS virus infect people through blood transfusion from an infected person?	97.5	2.5
if possible for people to lower the chances of contracting the AIDS virus through seeking protection from traditional healers?	0.8	99.2
Have you ever heard of HIV/AIDS	100.0	0.0

Table 22: Index of knowledge and their categorization

Index (N =120)	Percent
12.00	0.8
13.00	0.8
14.00	2.5
15.00	5.8
16.00	14.2
17.00	25.0
18.00	40.0
19.00	10.8
Mean index	17.20
Categories of knowledge	
Low Knowledge	0.0
Medium knowledge	1.6
High knowledge	98.3

Table 23: Effect of parents' HIV/AIDS awareness on participation in adolescents

home based HIV/AIDS prevention education %

Respondents' HIV/AIDS awareness (N = 120)	Mean	F	P
High knowledge	1.50	1.311	2.54
Medium knowledge	.00		

Mean index	1.5
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Further results reveal that respondents' HIV/AIDS awareness and index of parents' participation in adolescents' home based HIV/AIDS prevention did not show any significant relationship using F-test, suggesting that HIV/AIDS awareness has a dual effect on parents' participation in adolescents' home based HIV/AIDS prevention. This means that can affect it positively as well as a negatively, an implication that parents' participation in adolescents' home based HIV/AIDS prevention education is not guaranteed by increase in HIV/AIDS awareness alone, but there are other factors which must be present in order for parents to participate in adolescents' home based HIV/AIDS prevention education.

CHAPTER FIVE

CONCLUSIONS AND RECOMMENDATIONS

5.1 Overview

The main objective of this study was to determine factors affecting parent's participation in adolescents' home based HIV/AIDS prevention education. It was envisaged that information generated will assist programme and policy maker to design relevant intervention programmes and policies concerning adolescents and HIV/AIDS prevention education. In the previous chapter, the presentation and discussion of the major findings of this information have been covered. This chapter presents the summary of the study findings, conclusion, recommendations (for policy makers, community, and household) as well as suggestions for further research.

5.2 Summary of Major Findings

The summary of the major findings is presented in five parts. The first part covers the background characteristics of the respondents, the second part is on characteristics of the general population. While the third part presents a summary of the cultural factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education, and the fourth part covers the demographic factors that affects parents' participation. Part five involves the socio-economic factors affecting that participation in the same.

5.2.1 Characteristics of respondents

This study has shown that majority of respondents were married. Most of the interviewed respondents are in the age group of 20-49. This belongs to the group of economically productive and sexually active people. The number of female interviewed was relatively

high compared to that of males. All respondents belongs to either Christian or Muslim, there were more Christian respondents compared to Muslims. There were a diverse number of ethic groups dominated by the Kurya and Jita ethnic groups.

5.2.2 Background characteristics of the general population

The study has shown that the general population comprises of people with ages ranging from less than one year to 80 years. There were more female than male in the studied households with more of its population in the age group of 0 to 4 years.

5.2.3 Cultural factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education

The research results show that seven cultural factors discouraged parents' participation in adolescents' home based HIV/AIDS prevention education. These include, sense of shame or embarrassment, rite of passage, lack of technical skills, and dependence on school for provision of HIV/AIDS prevention education to adolescents. Likewise, societal reluctance to accept that children and adolescents should know about sex, as well as the societal attitude that open communication can lead to children losing of respect for elders were identified by respondents as their cultural values prohibiting their participation in adolescents' home based HIV/AIDS prevention education. On the other hand, religious disapproval of sex out of marriage, education of adolescents on how to protect themselves from become infected with HIV/AIDS, and warning them not to engage in sex since they can get pregnant were named as factors encouraged parents' participation. Moreover, the strength in religious beliefs (religiosity) was associated with parents' participation despite the fact that family headship did not have significant relationship to parents' participation in adolescents home based HIV/AIDS prevention education.

5.2.4 Demographic factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education

Statistically the family size were not having any effect on parents' participation, although parents with a medium family size had a high mean index score compared to their fellows in small family size. Further more, parents with preteens (10-14 years) their mean was high consequently their participation were also high. Likewise adolescent sex were observed to influence parents' participation, since parents with high mean scores were those with more adolescent girls in their family.

5.2.5 Socio-economic factors affecting parents' participation in adolescents' home based HIV/AIDS prevention education.

This study revealed that parents' education level significantly affects parents' participation, given that increase in education level has a positive influence on parents' participation. Parents' occupation was also observed to significantly affect participation. However, highest economic status category was recorded to have high mean. However, these results were not having any statistical significance. Additionally HIV/AIDS knowledge in transmission and prevention methods were not having any influence on parents' participation, high level of HIV/AIDS awareness were not statistically significant on parents' participation in home based HIV/AIDS prevention education.

5.3 Conclusions

- (a) From this study it is evident that a small number of parents discuss with adolescents in their homes about HIV/AIDS prevention. Furthermore their communication was observed to be one sided, that is, from sender to recipient, in the form of giving direction or warning, with emphasis on abstinence till marriage and the negative side effects of premarital sex.

- (b) Cultural factors (norms, values, religiosity and household headship), affect parents' participation in adolescents' home based HIV/AIDS prevention education in varying degrees. The study has shown that the sense of feeling shame (discomfort and embarrassment) to discuss with adolescents about sex related issues affects to a large extent parents' participation in HIV/AIDS prevention education.
- (c) Presence of adolescents of the age of between 10-14 years as well as a greater number of female members in the family encourages parents' participation in home based HIV/AIDS prevention education.
- (d) Parent's education level is a determinant factor in participation in adolescent's home based HIV/AIDS prevention education. While parents' HIV/AIDS knowledge is a precondition, but not the determining factor for parents' participation.
- (e) Parents need assistance in talking more effectively with their adolescent children about the three major methods of HIV/AIDS prevention. Practitioners can work with parents to reduce the barriers towards effective communication and improve parents' communication skills with respect to home based HIV/AIDS prevention education.

5.4 Recommendations

5.4.1 Government/policy level

- a) The work of HIV prevention is too important to be left to health educators alone. All adults who work with young people should be sensitized to impart HIV prevention information effectively and sensitively to adolescents in their charge. This requires approaches that work that is those designed to work in a given community

that take into account the cultural and traditional holists of the respective communities. These have to be selected and employed.

- b) Help parents overcome the barriers for effective communication about the technical aspects of sex by providing them with knowledge and skills that will help them to communicate effectively when they are ready to do so. Thus, of first primary importance is the provision of accessible and accurate information about HIV/AIDS.
- c) Government and other stakeholders' messages about HIV/AIDS prevention should be mainstreamed and harmonized to reduce the degree of confusion and contradictions in these messages and the messages should be age specific.
- d) Programmes and policies designed to curb the HIV/AIDS pandemic in the country should not be the same in the whole country, but take advantage of cultural norms as an entry point in the society

5.4.2 At the community level

- a) Non governmental Organisations dealing with women issues/problems should be gender balanced so that both sexes should receive equal attention and messages regarding their human rights in the family.
- b) Given that adolescent trust information from parents, school programme designed to deal with HIV/AIDS prevention and sexual relationships in future should include a parent component
- d) Because HIV/AIDS prevention is a gender issue, it is recommended that both female and male adolescents should receive same messages about prevention to avoid gender imbalance in HIV/AIDS prevention skills.

5.4.3 At family level

- a) Parents have a busy schedule, but it is important that they should be available to provide information to their adolescents when they need to speak with them.

- b) HIV/AIDS prevention education should start at a young age for it to evolve slowly as children grow to avoid embarrassment and reduce degree of awkwardness.

- e) Parents should continuously be informed that adolescents need adult guidance in order to grow into responsible health adults. The work which was being previously performed by other adults in the family during rite of passage, following the break of extended families and weakening of traditional culture of rite of passage the work of providing adolescents with sex education, has now shifted to parents.

5.5 Areas for future research

The study recommends further research in the following areas.

- (a) The present findings in this study were a result of a micro-survey done in one district of Mara region. Due to limited funds, less number of respondents were interviewed and these cannot represent the whole population of Mara region as well as population of Tanzania. Therefore there is a need for further research on parents' participation in adolescents' home based HIV/AIDS prevention education.

- (b) The study was based on three variables, cultural, demographic and socio-economic factors. Therefore there is a need to study the effect of other factors on parents' participation in adolescents' home based HIV/AIDS prevention education including cognitive and psychological factors.

- (c) Further research should be done to establish how the local government and institutions involve parents in prevention of HIV/AIDS among adolescents in their areas.
- (d) The study involved only parents to study factors affecting their participation in adolescents' home based HIV/AIDS prevention, further study involving parent and adolescents need to be done.

REFERENCES

- Allen, M., Svetaz, M. V., Hardeman, R. and Resnick, M. D. (2008). What research tells US about Latino parenting practices and their relationship to youth sexual behavior. *National Campaign to Prevent Teen and Unplanned Pregnancy* [www.teenpregnancy.org] site visited 9/7/2008.
- Balley, K. D. (1998). *Methods of Social Research*. The Press Collier. McMillan Publisher, London 478pp.
- Barnett, T and Blakie, P. (1992). *AIDS in Africa: Its present and future impact*. Belhaven Press, 25 Frolal Street, London WC2E 9DC.pp 14-67.
- Benavides, L. and Rosamar, B. (2006). Parent-child communication: A model for Hispanics on HIV prevention. *Journal of Community Health Nursing* 23(2):81–94.
- Casley, D.J. and Kumar, K. (1988). *The Collection Analysis and Use of Monitoring and Evaluation Data*. The International Bank for Reconstruction and Development. Washington D.C. 9pp.
- Centers for Disease Control and Prevention.(1991). Premarital sexual experience among adolescent women-United States, 1970-1988.Morbidity and Mortality Weekly Report.[www.cdc.org/prevention/aids].
- Cornelius, J.B., Legrand, M.S. and Jemmott, L. (2008). African American grandparents and adolescent grandchildren’s sexuality communication. *Journal of Family Nursing* 20 (10): 40-44.
- Cornelius, J.B., Legrand, S.M.S. and Jemmott, L. (2008). African American Grandchildren’s Sexuality Communication. *Journal of Family Nursing* 20: 60-62.

- Dilorio, C., Pluhar, E., Belcher, L. (2003). Parent–child communication about sexuality: a review of the literature from 1980- 2002. *Journal of HIV/AIDS Prevention Education for Adolescent Children* 5:3–4.
- Dilorio, C., Resnicow, K., Dudley, W. N., Thomas, S., Wang, D. T., Van Marter, D. F., Manteuffel, B. and Lipana, J. (2000). Social Cognitive Factors Associated with Mother–Adolescent Communication about Sex. *Journal of Health Communication* 5:4151.
- Duck, J. M., Tery, D. J. and Hogg, M. A. (1995). The Perceived influence of AIDS Advertising: 3rd Person Effect in the Context of positive Media content. *Basic and applied social psychology*. 3: 305-325.
- Edward, A. (2002). *AIDS in the modern world*. Blackwell Science Company, Iowa State University press. 51p.
- Erickson, J.R (1990). International behaviour response to a health hazard: *AIDS Social Science Medicine Journal* 31:951-952.
- Flimer, D. (1998). The Socio-economic correlates of sexual behaviour: A summary of results from an analysis of DHS data. Oxford University press, New York. 67pp. [http://www.iaen.org/lime/ate/pdf/confrot-aids-chapter-07pdf] site visited on 12/August 2007.
- Guilamo-Ramos, V. and Bouris, A. (2007). Parent-adolescent communication about sex in Latino families: A practitioner guide. *The National Campaign to Prevent Teen Pregnancy*. [www.teenpregnancy.org] site visited on 9/7/2008.

- Hare, M.L, Villarruel, A. and FAAN, A.R. (2007). Cultural Dynamics in HIV/AIDS Prevention Research Among Young People. *Journal of Association Nurses AIDS Care* 18(2):1-4.
- Hollander, D. (2003). Has there been a talk about sex? Teenagers and their mothers often disagree. *Family Planning Perspectives*, 32(4), 199-201.
- Holtzman, D. and Rubinson, R. (1995). Parent and peer communication effects on AIDS related behavior among U.S. high school students. *Family Planning Perspectives*, 27:235–240 & 268.
- Hutchinson, M. K., Jemmott, J. B., Jemmott, L. S., Braverman, P. Fong, G. T. (2003). Role of mother-daughter sexual risk communication in reducing sexual risk behaviors among urban adolescent females: a prospective study. *Journal of Adolescent Health*. 33:98–107.
- Jeckonial, J. N. (2007). Knowledge, Attitude and Behaviour of University Students Concerning HIV/AIDS. Dissertation for award of Masters of Art Degree at Sokoine University of Agriculture, Morogoro, Tanzania, 113pp.
- Kajula, L. J. (2005). Cross-generation communication on sexuality in times of HIV/AIDS as perceived by adolescent girls and their parents in Dar es Salaam, Tanzania Dissertation for Award of MPhil, Bergen University, Bergen, Norway, 115pp.
- Kanyi, A. (2002). Premarital Sex Vs Abstinence ‘Wajibu’ *Journal of social & religious concern* 17 (1) 5-7.

- Kim, J. L. and Ward, L. M. (2007). Silence speaks Volume: Parental Sexual communication among Asian American Emerging adults. *Journal of Adolescent Research* 22:3-31.
- Kirangu, K. (2001). Youth and HIV/AIDS: Can we Avoid Catastrophe (Population Reports no L, 12) Batrimore; the Johns Hopkins University Bloomberg School of public Health, population Information Programme. 310 pp.
- Kirby, D. (2002). HIV transmission and prevention in adolescents. [<http://www.hivinsite.ucsf.edu/insitepage=kb-07-04-03>]site visited on 21/5/2008.
- Kothari, C.R. (2004). *Research Methodology, Methods and Techniques*. New age international limited publisher, New Delhi.468pp.
- Lefkowitz, E.S., Boone, T.L., Au, T.K., Sigman, M. (2003). No sex or safe sex? Mothers' and adolescents' discussions about sexuality and HIV AIDS. *Health Education Resource* 18:341.
- Leshabari, M. T. and Kaaya, S. F. (1997). Bridging the information gap: sexual, maturity and reproductive health problems among youth in Tanzania. *Health Transit Review* 7:29-44.
- Lugala, J. (1995). A study of urban poverty and survival politics: Crisis, urbanization and urban poverty in Tanzania [<http://www.worldcatlibraries.org/wcpa/top3mset/31046146>] site visited on 2 August 2007.

- Malala, P.S.M. (2006). Determinants of population growth in Bokombe District, Shinyanga, Tanzania. Dissertation for Award of M.A Degree at Sokoine University of Agriculture, Morogoro, Tanzania, 118pp.
- Mara Region HIV/AIDS Annual Report, (2006). *Report presented to the Mara Regional HIV/AIDS consultancy annual meeting*. Mara, Tanzania. 4pp.
- Martino, S.C., Elliott, M.N. Corona, R., Kanouse, D.E. and Schuster, M. A. (2008). Beyond the "Big Talk": The Roles of Breadth and Repetition in Parent-Adolescent Communication About Sexual Topics. *Journal of Pediatrics* 121 (3) 612-618.
- Mayer, D. (2003). HIV/AIDS and education in Africa, SENCER Summery institute 2002. [<http://www.aacu.org>] site visited on 20/8/ 2007.
- Mbwambo J.S. (2000). The role of Local Knowledge and Organization in Sustainable Conservation of Biodiversity. A Case of Udzungwa Mountain. Dissertation submitted in partial fulfilment for the degree of MSc Degree at Sokoine University of Agriculture, Morogoro, Tanzania. 124pp.
- Mckernanmckay, M., Taberchasse, K., Paikoff, R., Baptiste, L., Dilorio, C., Madison, S. and Bell, C. (2004). Family-Level Impact of the CHAMP Family Program: A Community Collaborative Effort to Support Urban Families and Reduce Youth HIV Risk Exposure. *Family Process* 43: 79–93.
- Meschke, L. L., Bartholomae, S. and Zentell, S. R. (2000). Adolescent Sexuality and Parent-Adolescent Process: Promoting Healthy Teen Choices. *Journal of Family Relations* 49 (2): 143-154.

- Miller, K.S., Kotchick, B.A., Dorsey, S., Forehand, R., Ham, A.Y. (1998). Family communication about sex: what are parents saying and their adolescents listening? *Family Planning Perspectives* 30:218.
- Muhondwa, (1997). Global Situation of HIV/AIDS. Chapter II Strategies for Male Participation in Sexual and Reproductive Healthy Program. [www.joic.org.jp.eng/public] site visited on 18 /7/2007.
- Mzimhiri, H. (2007). *Impact of HIV/AIDS on household livelihood in Dare salaam city, Tanzania*. Dissertation for Award of M.A Degree at Sokoine University of Agriculture. Morogoro, Tanzania, 118pp.
- NACP (National HIV/AIDS Control programme) (2001). *HIV/AIDS/STI Surveillance Report*. Ministry of Health, Tanzania Report No. 16. Dar es Salaam, Tanzania.15pp.
- Namisi, F.S. (2005). Communicating on sexuality within the Kenya family setting in the context of HIV/AIDS: the perceptions of parents and the 14–17 year adolescents. Dissertation for Award of MPhil, Bergen University, Bergen. Norway. 101pp.
- Namisi, F.S., Flisher, A.J., Overland, S., Bastien, S., Onya, H., Kaaya, S. and Aarø L. (2008). Socio-demographic variations in communication on sexuality and HIV/AIDS with parents, family members and teachers among in-school adolescents: A multi-site study in Tanzania and South Africa. *Scandinavian Journal of Public Health* 00: 1–11.
- National AIDS Control Programme (NACP), (1998). *Strategic Framework for Third Medium Term Plan (MTP-III) for prevention and control of HIV/AIDS/STDs*. Ministry of Health, Dar es Salaam. 48pp.

- National Bureau of Statistics (2005). Tanzania Demographic and health Survey 2004-2005. ORC Macro Calverton, Maryland, USA. 250pp.
- NSGRP (United Republic of Tanzania, Vice President's Office. National Strategy for Growth and Reduction of Poverty) (2004). second draft 2005/06-2009/10 33pp.
- Odimegwu, C.O, Solanke, L.B. and Adedokun, A. (2002). Parental Characteristics and Adolescent Sexual Behaviour in Bida Local Government Area of Niger State, Nigeria. *African Journal of Reproductive Health* 6:95-106.
- Over, M., Ainsworth, P., Mujinja, G., Konda, G., Lwihula, L. and Semali, P. (1989). *The Economic Impact of Fatal Adult Illness in Sub-Saharan Africa: A Research Proposal*, World Bank and University of Dar es Salaam, Tanzania. 77pp.
- Pattman, R. and Chenge, F. (2003). Finding our voices: Gender and Sexual Identities and HIV/AIDS in Education. United Nations Children's Fund, Nairobi. 168pp.
- Pluhar, E.I and Kuroloff, P. (2004). What really matters in family communication about sexuality? A qualitative analysis about affect and style among African American mothers and daughters. *Sex education* 4 (3), 303-32.
- Raffaelli M. and Green, S. (2004). Parent-Adolescent Communication About Sex: Retrospective Reports by Latino College Students. *Journal of marriage and family*. 65(2), 474- 481.
- Raffaelli, M., Bogenschneider, K., and Flood, M. F. (1998). Parent-teen communication about sexual topics. *Journal of Family Issues*, 19: 315-333.
- Samwel, J.K. (2006). "A General Temporal Data Model and the Structured Population Event History Register." *Demographic Research*, 15(7):181-252.

- Santelli, J.S., Ott, M., Lyon, M., Rogers, J., Summers, D., and Schleifer, R. (2006). Abstinence and Abstinence-Only Education: A Review of US Policies and Programs. *Journal of Adolescent Health*, 38:72–81.
- Schutt-aine, J. and Maddaleno, M. (2003). Sexual Health and Development of adolescents and Youth in Americas: Programmes and Policy Implications. [<http://www.paho.org/English/hpp/hpf/adoi/srh.pdf>] site visited 2/9/2008.
- Singleton, R.A., Bruce, C. S., Magret, M.S (1993). *Approaches to Social Science Research*, 2nd edition. Oxford University Press, New York. 572 pp.
- TACAIDS (2003). Tanzania Commission for AIDS, National Multi-sectoral Strategic Framework on HIV/AIDS 2003-2007. *National HIV/AIDS Policy*. Dares Salaam, Tanzania. 20pp.
- TACAIDS (Tanzania Commission for AIDS) (2005). A new look at the HIV and AIDS Epidemic in Tanzania. Dar es Salaam 25 pp.
- TACAIDS, NBS AND Macro (2005). *Tanzania HIV/AIDS Indicator Surveys (THIS) 2003-2004*. ORC, Macro Calverton, Maryland, USA. 67 pp.
- Tanzania Commission for AIDS (TACAIDS), National Bureau of Statistics (NBS), and ORC Macro 2005. *Tanzania HIV/AIDS indicator Survey 2003-2004*. ORC macro Calverton, Maryland, USA.
- Tanzania Commission for AIDS, Zanzibar AIDS Commission, National Bureau of Statistics, Office of the Chief Government Statistician, and Macro International Inc., (2008). *Tanzania HIV/AIDS and Malaria Indicator Survey 2007-2008*. Dar es Salaam, Tanzania. 272 pp
- Tanzania Demographic and health Survey (TDHS) (1996). *Bureau of Statistics Planning Commission. Inc.* Calverton, Maryland, USA. 312pp.

Tanzania Demographic and Health Survey (TDHS) (2005). National Bureau of Statistics, ORC Macro Calverton, Maryland, USA. 381pp.

Thomas, S. Wang, D. T., Vanmarter, D. F. (2000). Social cognitive factors associated with mother-adolescent communication about sex. *Journal of health communication* 5: 41-51.

UNAIDS (Joint United Nations programme on HIV/AIDS), (1999). A Review of Review of Household and Community Responses to the HIV/AIDS epidemic in the rural areas of Sub Saharan Africa. [[www.unaids.org.ifad.org/operations/regional/pf/aids-bib.htm](http://www.unaids.org/ifad.org/operations/regional/pf/aids-bib.htm)] site visited on 12 July, 2007.

UNAIDS (Joint United Nations programme on HIV/AIDS), (2002). *Report on the Global HIV/AIDS Epidemic*, Geneva. [<http://www.unaids/report/globalhiv/aids/epidemic>] site visited on 9/7/2007.

UNAIDS (Joint United Nations programme on HIV/AIDS), (2004). *Report on the Global HIV/AIDS Epidemic at the end of 2004*. UNAIDS/WHO, Geneva. 87pp.

UNAIDS (Joint United Nations programme on HIV/AIDS), (2006). *Report on the Global AIDS epidemic*. A UNAIDS 10 Anniversary Special Edition. Geneva, Switzerland. [www.unaids.org]site visited on 10/7/2008.

UNAIDS (Joint United Nations programme on HIV/AIDS), (2007). *Report on the Global AIDS epidemic*. A UNAIDS 10 Anniversary Special Edition. Geneva, Switzerland. [www.unaids.org]site visited on 12/8/2008.

UNAIDS (Joint United Nations programme on HIV/AIDS), (2008). *Report on the Global AIDS epidemic*. A UNAIDS updates. [www.unaids.org]site visited on 19/11/2009.

UNAIDS Joint United Nations Programme on HIV/AIDS, (2006). Report on the global HIV/AIDS epidemic. [www.unaids.org] site visited 20/7/2007.

UNFPA (United Nations Population and Development Fund), (2003). HIV/AIDS and adolescents in: State of the World Population, making 1 Billion Count: investing in Adolescents' Health and Rights 45pp.

UNICEF/UNAIDS/WHO (United Nations Children's Fund, Joint United Nations Programme on HIV/AIDS and World Health Organization), (2002). *Young people and HIV/AIDS Opportunity in Crisis*. 35pp.

United Republic of Tanzania (2001). *National Policy on HIV/AIDS*. The prime Ministers Office, Government Press, Dodoma, Tanzania. 37pp.

United Republic of Tanzania, (2004). *2002 population and Housing Census, Regional and District Census Data in Brief*. National Bureau of Statistics, Dar es Salaam, Tanzania.161pp.

URT (2001) National Policy on HIV/AIDS, PMO, Dodoma Tanzania. Pp 47.

WB (World Bank) (1992). Tanzania AIDS Assessment and Planning Study. Washington, DC. [www.worldbank.org/oed/aids/docs/report/hiv-appendex-b2.pd] site visited on 10.6.2007 WHO (World Health Organisation) global Programme on AIDS, (2000) . Progress Report. Geneva, World Health Organisation [http://www.who.org/global/programme/.asp?iss=o378-6323;year=997; vol=63; issue=4;spage=225;epage=228;aulast=kuruvila] site visited on 3/7/2007.

APPENDICES

Appendix 1: Operational definition of key research variables in the study

No	Variable	Operational definitions	Level of measurement	Units of measurement
Background variables				
1	Age	Absolute years since one was born	Ratio	Numbers
2	Sex	Being male or female biologically	Nominal dichotomous	1 = Female 2 = Male
3	Marital status	Current status of marriage	Nominal	1 = Single 2 = Married 3 = Divorced 4 = Widow/widower 5 = Cohabiting 6 = Separated 7 = Others specify
4	Religion	Religious faith of respondent	Nominal	1 = Christian 2 = Muslim 3 = Traditional 4 = No religion 5 = specify
5	Ethnicity	Ethnic group of original	Nominal	1 = Jita 2 = Kwaya 3 = Jaluo 4 = Kurya 5 = Sukuma 6 = Luli 7 = Haya 8 = Kelewe 9 = Kiroba 10 = Others
Demographic factors				
6	Family size	Number of usual members of the household	Ratio	Numbers
7	Family composition by age	Number of usual members of the household by age	Ratio	Numbers
8	Family composition by sex	Number of usual members of the household by sex	Ratio	Numbers
Cultural factors				
9	Norms	Expected range of reasons affecting parents' participation	Nominal	Statement/Sentence
10	Values	Accepted or not accepted discussions between parents and children	Nominal	Statement/Sentence
11	Religiosity	Strength of religious belief measured by scores in cumulative scale ranging from 0-7	Scale	1 = yes 2 = No

12	Type of family	Sex of head of household	Nominal	1 = Female 2 = Male
Socio-economic factors				
13	Education level	Years of formal schooling	Nominal	1 = None 2 = Adult 3 = Primary school 4 = Secondary school 5 = Post secondary
14	Occupation	Economic activities carried out by respondent	Nominal	1 = agriculture 2 = Business 3 = employed 4 = Retired officer 5 = Fishing 6 = manufacturing 7 = Others
15	Economic status	Estimated amount of money spent in three meals of a day in by respondent	Ratio	Tanzanian shillings
16	HIV/AIDS awareness	Ability to answer correctly HIV/AIDS prevention and transmission method measured by cumulative scale	Scale	1 = Yes 2 = No
Dependent variable				
17	Parents' participation	Response to have communicated one or more topics on HIV/AIDS prevention with adolescents in family within one month period	Scale	1 = Yes 2 = No

Appendix 2: Questionnaire for interview

My name is.....I am from Sokoine University of Agriculture. We are conducting a survey on **parents' participation in home based HIV/AIDS prevention education.**

I will not keep a record of your name if you don't feel like. You have the right to stop the interview at any time, or to skip any questions that you don't want to answer. There are no rights or wrong answer.

Your participation is completely voluntary but your experiences could be very helpful to other Parents in the COUNTRY

Do you have any questions? Yes/No

A. QUESTIONNAIRE IDENTIFICATION

Date of interview.....

Questionnaire No.....

Ward.....Hamlet.....

Name of enumerator.....

B. BACKGROUND INFORMATION

In this section I would like to know your background information, I am requesting you to respond to the following questions about yourself

1. What is your tribe? **(Fill in)**
2. How old are you in years/**(Fill in)**.....
3. What is your religion? **(Check one)**
 - a). Christian
 - b). Moslem
 - c). Traditional

d). No religion

e). Others specify.....

5. What is your marital status? (**check one**)

a) Single

b) Married

c) Divorced

d) Widow/Widower

e). Cohabiting

f). Separate

g). others specify.....

C. Demographic factors of respondents

6. What is the sex of the head of the household? (**Check one**)

a) Female

b) Male

7. Give information about family members by age and sex? (**Fill in table below**)

S/n	Name	Sex	Age	Education
1				
2				
3				
4				
5				
6				
7				
8				
9				
10				

D. Socio Economic factors of respondents

8. What is your main occupation? (**Check one**)

a). Agriculture

- b). Livestock keeper
- c). Employed
- d). Fishing
- e). House wife
- f). Retired officer
- g). Business
- h). manufacturing (specify).....
- i). Does not work
- j). others specify.....

9. What is your highest education? (**Check one**)

- a). None
- b) Adult education
- c). Primary school
- d). Secondary school
- e). Post secondary
- f). Others (Specify).....

10. What is the major source of income for your family? (**Check one**)

- a) Sell of Agriculture products
- b) Sell of Livestock and Livestock products
- c) Doing official work
- d) Doing business
- e) Others (specify).....

11. In average how much do you spent in a day for the following? (**Fill in**)

- a) At Break feast.....
- b) During lunch time.....
- a) At supper.....

E. Respondents' knowledge on HIV/AIDS prevention and transmission

12. Among the following is the ways in which HIV/AIDS can be transmitted from one person to another. From your knowledge please say 'Yes or No' for the following methods of HIV/AIDS or HIV/AIDS transmission. **(Check appropriate answer)**

Way of HIV/AIDS transmission	Response	
	Yes	No
From mother to child during delivery		
For abstain from sex		
Correct use of condom each time you have sex		
By having sex intercourse with someone already infected		
Through blood transfusion of an infected blood		
Sharing of needles and razors which are infected		
Eating and sharing utensils with a person who are already infected		
Does not know		

13. Among the following are the ways to prevent HIV/AIDS transmission from one person to another. From your knowledge please say 'Yes or No' for the following methods of HIV/AIDS prevention. **(Check appropriate answer)**

Method of HIV/AIDS prevention	Response	
	Yes	No
Abstain from sex		

Correct use of condom each time have sex		
Limit sex to one partner/stay faithful to one uninfected partner		
Avoid sharing razors/ blades		
Seek protection from traditional healers		
Avoid blood transfusions		
Avoid unsafe injection or sharing sharp objects		
Avoid sex with persons who inject drugs intravenously		
HIV/AIDS infected mother avoid breast feeding		
Avoid mosquito/insect bites		
Avoid touching a person who has AIDS		
Avoid sharing food with people who have AIDS		
Does not know		

F. In this Section we are going to discuss about your cultural factors

14. What is the sex of the head of household? **(Chose one)**

- a). male
- b). female

Please for the following statements say 'yes' or 'no' about religiosity (check one)

15. Do you believe in God?

- a). Yes
- b). No
- c). No response

16. Do you go to church or mosque?

- a). Yes
- b). No
- c). No response

17. Do you have a habit of having self-prayers?

- a). Yes
- b). No
- c). No response

18. Do you fast during the holly month of “ kwaresima” or “Ramadhani for the Muslims and Christians respectively? ”or other related periods

- a). Yes
- b). No
- c). No response

19. Do you have other periods of fasting?

20. Do you give offering to the poor or disabled or orphans?

- a). Yes
- b). No
- c). No response

21. Do you pay ten percent or ties?

- a). Yes
- b). No
- c). No response

G. In this section we are going to discuss about parents’ participation in Adolescents’ home based HIV/AIDS prevention education and the cultural factors affecting it.

22. In your family within one month period have you ever discussed with adolescents (10 – 24 Years) on any topics about HIV/AIDS prevention method? **(Please check one)**

- a). Yes (If Yes go to Question no, 23, 24, 25)
- b). No (if no go to question no, 26)\

23 Please say Yes for the methods you discussed with your adolescents within one month period in your family). Please check correct answer

Method of HIV/AIDS prevention discussed	Response	
	Yes	No
HIV/AIDS prevention through abstain from sex		
HIV/AIDS prevention through consistent correct use of condom each time have sex		
HIV/AIDS prevention through Limit sex to one uninfected partner/stay faithful to one partner		
HIV/AIDS prevention through avoid sharing razors/blades and sharp objects		
HIV/AIDS prevention through avoid blood transfusions from an infected person		
HIV/AIDS prevention through avoid using unsafe injections		
HIV/AIDS prevention through infected mother avoid breast feeding		

24. Are there any reasons related to your culture (Norms and Values) that encouraged your discussion? **(Please check one)**

a). Yes

b). No

25. If yes list these cultural factors **(Please feel in open spaces)**

a).....

b).....

c).....

d).....

26. Are there any reason related to your culture (Norms and Values) that discouraged you to discussion with adolescents in your family about HIV/AIDS prevention? **(Please check one)**

a) Yes (If yes go to question 27)

b) No

27 What are the reasons that discouraged you to discuss with adolescents in your family about HIV/AIDS prevention (**List them**).

a).....

b).....

c).....

d).....

e).....

f).....

Do you have any question?

Thank you for your Cooperation

Appendix 3: Guideline for Focus Group Discussion (FGDs)

1. Have you heard about HIV/AIDS?
2. How is HIV/AIDS transmitted?
3. How is HIV/AIDS prevented?
4. Which age group is most affected by HIV/AIDS
5. Why young peoples are mostly affected by HIV/AIDS?
6. Have you ever discussed with your adolescents in your home about how to protect themselves against HIV/AIDS?
7. What are the reasons (factors) which make you not to discussion with adolescents in your home about HIV/AIDS prevention?
8. What should be done to help you participate effectively in home based HIV/AIDS prevention.

Thank you for your cooperation