ASSESSMENT OF KNOWLEDGE, ATTITUDE AND PRACTICES ON DRUG AND SUBSTANCE USE AMONG SECONDARY SCHOOL ADOLESCENTS IN KABWOHE-ITENDERO TOWN COUNCIL SHEEMA DISTRICT

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ABSTRACT

Background: The epidemiological transition from communicable diseases to non-communicable diseases such as drug and substance use and their high prevalence is a public health concern due to high morbidity and mortality rates associated with it.

Purpose of the study: The main objective of the study was to assess knowledge, attitude and practices of secondary school going adolescents on drug and substance use in order to provide information to policy makers, program managers and the District Heath Team to control the use of drugs and substances in Kabwohe - Itendero Town Council (KITC), Sheema District.

Methodology: This was a cross-sectional study employing both quantitative and qualitative research methods. The total sample size was 132 adolescents who were studying in the seven secondary schools in KITC. The number of respondents drawn from each school and class was determined by proportion to size. Quantitative data was collected by administration of pre-tested self-administered questionnaires to respondents while Qualitative data was collected by use of pre-tested FGD guide and In-depth Interview guide.

Results: Males constituted 67.4% (89/132) of all the respondents where 66.7% (88/132) were from rural areas. Half of the respondents had inadequate knowledge about drug and substance use, half of the respondents strongly disapproved use of drugs and substances while the other half either only disapproved or didn't disapprove use. The percentage of respondents who had ever used any of the drugs/substances of concern which included alcohol, tobacco, khat, cannabis, volatile solvents and un-prescribed medicines were 36.4% (48/132).

Conclusion: The knowledge of the secondary school adolescents in KITC on drugs/substance use was inadequate, with mixed attitudes and risky behaviors towards use with 36.4% having ever used drugs/substances of concern.

DECLARATION

I, **Mabuga William** declare that I am the author of this paper and that any assistance I received in its preparation is fully acknowledged and disclosed in the paper. I have also cited any sources from which I used data, ideas or words, either quoted directly or paraphrased. I also certify that this paper was prepared by me specifically for the partial fulfillment for the degree of Master of Public Health at Uganda Christian University.

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DEDICATION

This dissertation is dedicated to my family for all the support they have extended to me since I started school up to this level.

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LIST OF ABBREVIATIONS AND ACRYNOMS

ATS - Amphetamine-Type Stimulant

CI - Confidence Interval

CLO- Community Liaisons Officer-Police

DEO – District Education Officer

DHO- District Health Officer

DHT - District Health Team

FGD- Focus Group Discussion

HC – Health Centre

HMIS - Health Management Information System

KAP- Knowledge, Attitudes and Practices

KI – Key Informant

KITC - Kabwohe - Itendero Town Council

MedSPAD - Mediterranean School Survey Project on Alcohol and Other Drugs

MOH - Ministry of Health

MPH- Master of Public Health

NACADA- National Campaign Against Drug Abuse Authority

SACENDU - South African Community Epidemiology Network on Drug Use

UBOS –Uganda Bureau of Statistics

UCU- Uganda Christian University

UNCST-Uganda National Council for Science and Technology

UNODC –United Nations Office on Drugs and Crime

UYDEL - Uganda Youth Development Link

WHO - World Health Organization

OPERATIONAL DEFINITIONS

Adolescent

In this study an adolescent refers to a human being who falls in the age bracket of 10- 24 years irrespective of sex.

Drug use

In this study drug use refers to taking naturally occurring and synthetic preparations for purposes for which they are not intended either knowingly or unknowingly.

Psychoactive

In this study psychoactive refers to a perception, mood and behavior altering preparation.

Secondary School

An institution that offers secondary level of education in Uganda's formal education system that is post primary level and has six levels from senior one to senior six with each level taking three terms of about three months each.

Substance use

In this study substance use refers to taking substances of addiction like tobacco, alcohol, khat (Catha edulis), cannabis (marijuana) and volatile solvents such as petrol and glue.

Dependent Variable/outcome

Dependent variable/outcome was drug/substance use, that was using or having ever used drugs/substances such as alcohol, tobacco, khat, marijuana, volatile solvents and medicines not prescribed by doctor or nurse.

Independent Variables/exposure

Independent variables/exposure were Knowledge of adolescents on (Drug use, Substance use, Sources, effects/benefits, health risks, regulations and policies), Attitudes (perceived benefits and dangers towards health, education and well-being), Practices (tobacco smoking, drinking alcohol, chewing khat, smoking marijuana, sniffing volatile solvents and self-medication) and Drivers(Peer pressure, familial background/ use, availability/ access, source of income).

CHAPTER 1: INTRODUCTION AND BACKGROUND OF THE STUDY

1.1 Introduction

The epidemiological transition from communicable diseases to non communicable diseases such as drug and substance use and their high prevalence is a public health concern due to high morbidity and mortality rates associated with it.

Today there is widespread recognition among member states and United Nations entities that drugs, together with organized crime, jeopardize the achievement of the Millennium Development Goals. (United Nations Office on Drugs and Crime-UNODC, World Drug Report 2011)

Demographic trends suggest that the total number of drug users in developing countries would increase significantly, owing not only to those areas' higher projected population growth, but also their younger populations and rapid rates of urbanization. Moreover, the gender gap may start closing as developing countries are likely to experience higher levels of female drug use in the wake of disappearing socio-cultural barriers and increasing gender equality.

(United Nations Office on Drugs and Crime -UNODC, World Drug Report 2012)

The global, regional and national reports indicate that the disease burden due to drug and substance abuse is abnormally high and according to World Health Organization (WHO) 2005 report Uganda was ranked among the leading consumers of alcohol in the world with a per capita consumption of 19.5 litres of alcohol per annum and there is need to examine / study the reasons that are responsible for this status. Illicit drugs undermine economic and social development and contribute to crime, instability, insecurity and the spread of HIV.

(UNODC, World Drug Report 2012)

The United Nations Office on Drugs and Crime report (2007) ranked Uganda as 13th in world seizure of cannabis, this shows that there is a lot of cannabis that may not be seized that ends up being consumed in Uganda hence the need to conduct such a study to guide the public health experts, policy makers and the law enforcers in designing the control strategies/actions, regulatory policies and the enforcement mechanisms in place in order to handle this important issue with complex social, medical and economic impacts.

Today, illicit drug use is largely a youth phenomenon in most countries. Prevalence rates gradually increase through the teens and peak among persons aged 18-25. Another key characteristic of illicit drug use throughout the world is that more males than females consume such drugs, though some studies indicate that women show a relatively high level of licit substance misuse. (Degenhardt & Hall, 2012)

Drug use refers to pattern of harmful use of any drug for mood altering purposes. It also includes the use of classified and restricted drugs or the abuse of prescription or over-the-counter drugs for purposes other than those for which they are indicated or in a manner or in quantities other than directed .Drug use also includes taking of drugs that have no mood-altering effects or intoxication properties but are rather addictive after prolonged use and have harmful effects on the body and community such drugs include anabolic steroids and antibiotics.

Substance use refers to taking substances of addiction like tobacco, alcohol, cannabis (marijuana), khat (Catha edulis) and volatile solvents with the aim of producing a mind-altering effect in the user (MOH, 2005).

Some studies have been conducted at the global, national and in other districts in Uganda such as Kampala. This study intended to assess knowledge, attitude and practices of the in-school adolescents in Sheema District on drug and substance use as a case study for South Western Uganda and findings will guide interventions aimed at addressing the public health concerns and issues about drugs and substance use.

The study findings will highlight some of the reasons responsible for the epidemiological transition from Communicable diseases to Non- Communicable diseases and diseases of behavior/ life style like drug and substance use.

The identified drivers of the drug and substance use in the school setting will be used as basis to design effective counter measures by public health experts, policy makers and the law enforcers to halt and reverse epidemiological trends of drug and substance use in settings where findings are applicable.

1.2 Background of the study

Kabwohe – Itendero Town Council is one of the eleven administrative units of Sheema District located in South Western Uganda. The community of Kabwohe – Itendero Town Council suffer from both communicable and non-communicable diseases. Non-communicable diseases associated with drug and substance use like mental illness and intentional trauma among adolescents are on the increase especially in Kabwohe – Itendero Town Council.

(Kabwohe HC IV HMIS Report, 2010/11)

Kabwohe –Itendero Town Council has a population of 17,543 people and 34.7% of this population are adolescents who are 6,088 people. The town council has a total of seven (07) secondary schools two (02) of which are government and five (05) private.

The town council is located on the Kasese - Mbarara highway which are the source and destination centres for some of the drugs and substances of abuse in the region. Sheema Police Crime report (2012) indicated that the rate of crime related to drug and substance abuse was on the increase and that some of the adolescents in secondary schools were involved. The town council authorities also indicated that school dropout rate was also high secondary to indiscipline and expulsion from schools due to drug and substance abuse. However, the knowledge, attitudes and practices of adolescents on drug and substance use in Kabwohe – Itendero Town Council are unknown.

Therefore, the assessment of knowledge, attitude and practices of secondary school adolescents on drug and substance use was required in order to guide interventions on how to reverse the trends.

1.3 Statement of the problem

Sheema District Police Crime Report (2012) indicated that the crime rate was on the increase including the drug and substance use. It is also indicated that the students in secondary schools were also involved in use and transacting in drugs and substances due to the fact that Kabwohe-Itendero Town Council is on Kasese - Mbarara highway which are source and destination of the drugs and substances of abuse respectively. The adolescents in secondary schools may be greatly affected since they are in explorative stage of adolescence and also the fact that their societies are institutionalized hence making the spread of the practice easy.

According to the Ministry of Health-Uganda (2005), 5 to 10% of Ugandans are regular drug users. Reports from Uganda Police (2011) indicated that drug and substance abuse were increasing in the country, including South Western Uganda. Generally drug and substance abuse has been more prevalent among Ugandan youths as evidenced by 71% of the respondents in a study conducted on magnitude of alcohol and drug use among secondary school students in Kampala and Wakiso districts in 2003 acknowledging the existence of alcohol and drug abuse in their respective schools. (Uganda Youth Development Link –UYDEL, 2008)

The prevalence of drug and substance use in Kabwohe - Itendero Town Council in Sheema District is however not known.

Increase in the drug and substance use has been attributed to poor academic performance, family disruption, high rates of school drop-outs and involvement in bad practices in school set up such as bullying and arranging student strikes. (UYDEL, 2008)

The existing body of information is highly deficient as far as the knowledge, attitude and practices of secondary school going adolescents towards drug and substance use in Kawohe - Itendero Town Council, Sheema district are concerned.

This study therefore was intended to assess drug and substance use by critically examining the knowledge, attitude and practices of the adolescents in secondary schools in Kabwohe - Itendero Town Council in order to address the existing information gap and contribute to existing interventions by the District Health Team (DHT) and other stakeholders, to control drug and substance use.

1.4 Research questions

1. What is the knowledge level of secondary school adolescents in Kabwohe - Itendero Town Council on drug and substance use?

2. What are the attitudes of secondary school adolescents in Kabwohe - Itendero Town Council towards drug and substance use?

3. What are the practices of secondary school adolescents in Kabwohe - Itendero Town Council on drugs and substances use?

4. What are the predisposing factors/drivers that lead secondary school adolescents in Kabwohe - Itendero to use drugs/substances?

1.5 Research objectives

1.5.1 General objective

The main objective of the study was to assess knowledge, attitude and practices of secondary school going adolescents on drug and substance use in order to provide information to policy makers, program managers and the District Heath Team to control the use of drugs and substances in Kabwohe - Itendero Town Council, Sheema District.

1.5.2 Specific objectives

1. To find out the knowledge of secondary school adolescents in Kabwohe - Itendero Town Council on drug and substance use.
2. To assess the attitudes of secondary school adolescents in Kabwohe - Itendero Town Council on drug and substance use.
3. To document the common practices of secondary school adolescents in Kabwohe - Itendero Town Council on drug and substance use.
4. To identify the possible drivers associated with drug and substance use among secondary school adolescents in Kabwohe - Itendero Town Council.

1.6 Study justification

Despite increased attention to drug demand reduction in recent years, drug use continues to take a heavy toll. Globally, some 210 million people use illicit drugs each year, and almost 200,000 of them die from drugs. There continues to be an enormous unmet need for drug use prevention, treatment, care and support, particularly in developing countries.

(UNODC, World Drug Report 2011)

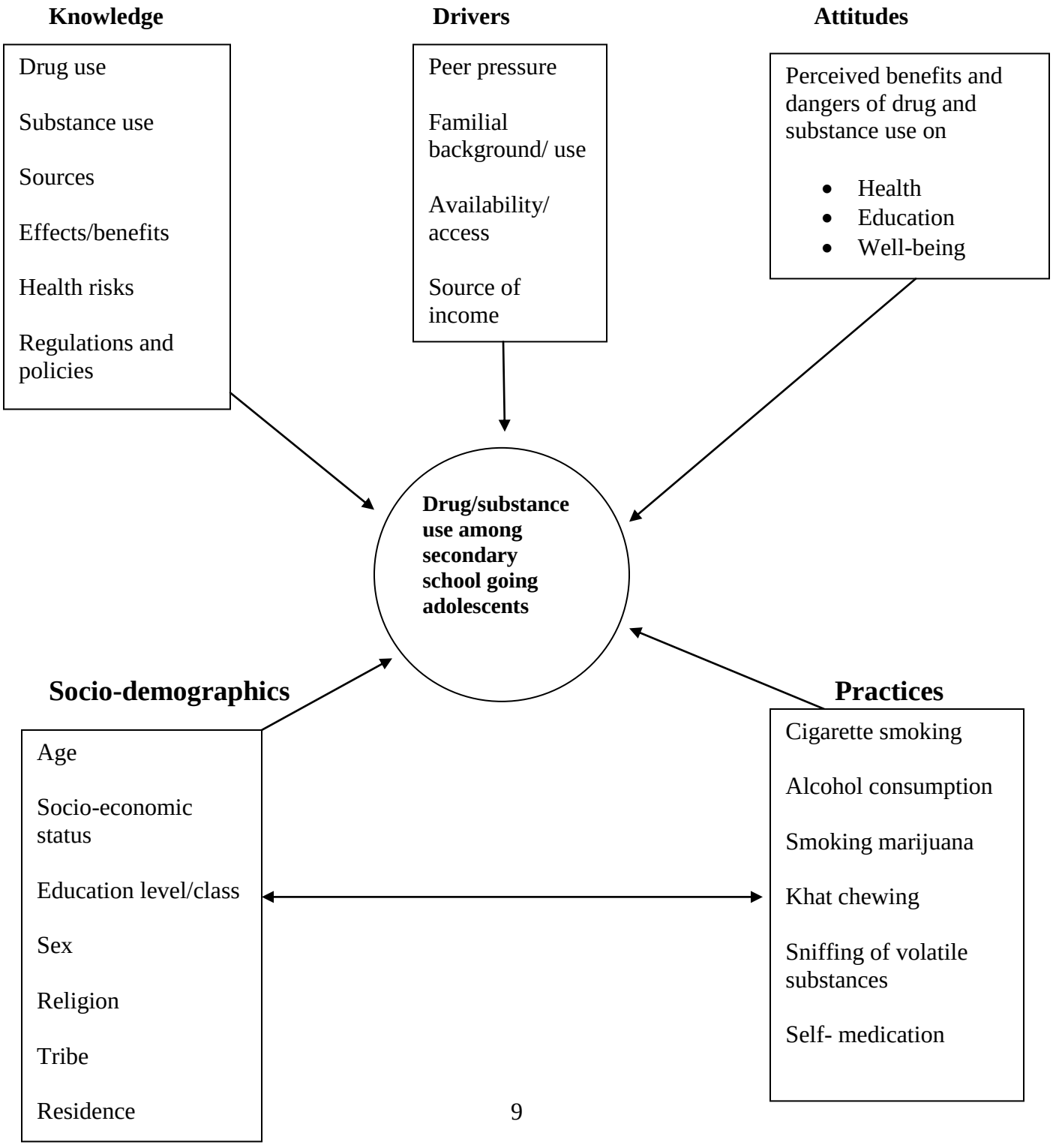
The study to assess the knowledge, attitude and practices of the adolescents as a special group that is more vulnerable was even more significant in institutionalized communities like secondary schools where peer influence and closeness is synergistic in spread of the practice in explorative and risk taking group.

Some studies have been conducted at the global, regional, national and other districts in Uganda especially Kampala but not in South Western Uganda. This study therefore, was intended to examine the knowledge, attitude and practices of the secondary school adolescents in Sheema District on drug and substance use as a case study for South Western Uganda where it is reported to be a big problem by the Uganda Police Crime Report (2011) and Uganda Demographic and Health Survey report (Uganda Bureau of Statistics, 2007)

The findings from this study will also serve as basis to guide policy makers and legislators who are yet to discuss the Narcotics and Psychotropic substances Control Bill 2007 that is already laid before the Ugandan 9th parliament to institute control strategies/actions, regulatory policies and the enforcement mechanisms in place in order to handle this important issue with complex social, medical and economic impacts.

1.7 Conceptual frame work

Figure 1 : Conceptual framework for KAP/drivers of drug/substance use in KITC



Explanatory notes of conceptual frame work in Figure 1.

The conceptual frame work shows the factors associated with drug and substance use which include socio-demographics, knowledge, attitude, practices and drivers that can lead an adolescent to initiate and continue using drugs/substances or protect the adolescents from using the drugs and substances.

The synergy of favorable socio-demographics coupled with inadequate knowledge, presence of drivers and attitudes such as approval of use of drugs and substances have been associated to increased use of drugs and substances by adolescents through practices like smoking, drinking, chewing, sniffing and self medication. On the other hand factors like caring/concerned parents who monitor their children, limited access to drugs/substances, adequate knowledge of adolescents about effects of drugs/substances and attitudes like disapproval of drugs/substances use by adolescents have been observed to be protective and inhibit adolescents from practices like smoking, drinking alcohol and chewing substances like khat.

(UNODC, World Drug Report 2012)

CHAPTER 2: LITERATURE REVIEW

2.1 Epidemiology and effects of drug and substance use

About 230 million people, or 5 per cent of the world's adult population, are estimated to have used an illicit drug at least once in 2010. Problem drug users number about 27 million, which is 0.6 per cent of the world adult population. Throughout the world, illicit drug use appears to be generally stable, though it continues to be rising in several developing countries.

(UNODC, World Drug Report 2012)

While illicit drug production, trafficking and use remain issues of concern, the international drug control system appears to have kept the consumption of illegal drugs well below the levels reported for legal psychoactive substances. Global estimates suggest that past-month prevalence of tobacco use (25 per cent of the population aged 15 and above) is 10 times higher than past-month prevalence of illicit drug use (2.5 per cent). Annual prevalence of the use of alcohol is 42 per cent (the use of alcohol being legal in most countries), which is eight times higher than annual prevalence of illicit drug use (5.0 per cent). Heavy episodic weekly drinking is eight times more prevalent than problem drug use. (UNODC, World Drug Report 2012)

The use of illicit psychoactive substances for which a global control system is in place continues to be substantially lower than the use of a legal psychoactive substance such as tobacco. Some 25% of the adult population (15 years and above) are current tobacco smokers, according to the World Health Organization. (WHO 2004, 2010)

Drug use accounts for 0.9 per cent of all disability-adjusted life years lost at the global level, or 10 per cent of all life years lost as a result of the consumption of psychoactive substances such as drugs, alcohol and tobacco. (UNODC, World Drug Report 2012)

Cannabis is the world's most widely used illicit substance: there are between 119 million and 224 million cannabis users worldwide, and consumption is stable. Cannabis seizure and eradication data suggest that the production of cannabis herb (marijuana) is increasingly widespread, but the often localized, small-scale nature of cannabis cultivation and production make it very difficult to assess. (UNODC, World Drug Report 2012)

The estimated annual prevalence rates of cannabis use for Africa is the second highest in the world, with estimates ranging between 3.8% and 10.4% of the population aged 15-64, or between 21.6 and 59.1 million people. Higher levels of cannabis use are estimated for West and Central Africa compared to other sub-regions. (UNODC, World Drug Report 2011)

In Kenya, a 2009 survey conducted among 4,500 households in the coastal provinces indicated that the overall lifetime prevalence of cannabis use was 10.6% among all ages, with a much higher prevalence among the urban (11%) than the rural population (4%). The lifetime prevalence was at similar levels for all age groups except the 12-17 year olds, whereas the current use, reported at 5.3% among all age groups, was fairly consistent.

(National Campaign Against Drug Abuse Authority-NACADA 2010)

According to the United Nations Office on Drugs and Crime –UNODC (2007) world drugs report Uganda was ranked as the 13th in world seizure of cannabis.

Annual prevalence of alcohol use is clearly above the global average in Europe (69 per cent), the Americas (58 per cent) and in the WHO Western Pacific region (56 per cent). It is below average in areas where alcohol use is prohibited or where it is considered inappropriate for religious reasons.

Based on WHO regional groupings, below average rates of alcohol use are found in the Eastern Mediterranean (3.5 per cent), in South-East Asia, which includes India (11 per cent) and, to a lesser extent, in Africa (29 per cent). Average per capita consumption figures reflect this pattern, the highest totals being reported in Europe and the Americas. (WHO, 2011)

A study conducted on alcohol and drug abuse among secondary school students in Kampala found out that 67% admitted to occasional use of alcohol, 15% to cannabis and some others to hard drugs (UYDEL, 2008)

A study conducted on the prevalence of alcohol consumption among university students showed that 78% of the students were drinking alcohol. About 79% of males drank alcohol as compared to 75% among females. The study further showed that the majority (92%) of the students began drinking alcohol before joining the university. Such findings are evidence that there is a general increase in the prevalence of alcohol and drug abuse among the youth.This agrees well with the cliché of alcohol turning an old hag into a beauty queen and leading many youth into temptation leaving them vulnerable to sexually transmitted infections (STIs) including HIV. (UYDEL 2008)

Alcohol is one of the drivers of the HIV epidemic 6% (1,936) of women and 2% (595) of men in the age group of 12-24, had un protected sex under influence of alcohol 12 months preceding the Uganda Demographic and Health Survey. Rape and defilement are very common and the majority of the offenders commit the offences under the influence of alcohol and drugs. Alcohol was also found to be a contributory factor to engage in cross generational and transactional sexual relationship. (Uganda Bureau of Statistics, 2007)

According to World Health Organization smoking continues to be a major but preventable cause of death and diseases worldwide and it was estimated that there are over 1.3 billion smokers in the world, about a third of the global population aged 15 years and above. (WHO 2009, 2010)

Global estimates show that current tobacco use (25 per cent of the population aged 15 and above) is 10 times more widespread than current illegal drug use. Tobacco caused over 4 million deaths in the late 2000's and it is estimated to cause over 10 million deaths per year by 2020 and 70% of the deaths expected to occur in developing countries. (WHO, 2011)

Global figures for the non-medical use of prescription drugs other than opioids and amphetamines are not available. Nevertheless, this is reportedly a growing health problem, with prevalence rates higher than for numerous controlled substances in many countries. In the United States, for example, lifetime, annual and monthly prevalence of non-medical use of psychotherapeutics (mostly pain relievers) among persons aged 12 and over was reported as 20.4, 6.3 and 2.7 per cent, respectively, for 2010, higher rates than for any drug other than cannabis. And while illicit drug use among males in general greatly exceeds that among females, the non-medical use of tranquillizers and sedatives among females, in those countries where data are available (in South America, Central America and Europe), is a notable exception to the rule (and exceeds the use of cannabis). There is also evidence that these substances are increasingly being used in combination with more traditional illicit substances, in poly drug use designed to either enhance or counterbalance their effects.

While psychoactive substances have been consumed for thousands of years, the drug problem has developed some key characteristics over the last few decades, against a backdrop of rapid socio-economic transitions in a number of countries.

Illicit drug use is now characterized by a concentration among youth notably young males living in urban environments and an expanding range of psychoactive substances. Although established illicit drug markets in many developed countries have shown signs of stabilization, the growth of drug use seems to continue in many developing countries. (UNODC, World Drug Report 2012)

While there are stable trends for traditionally used drugs, and in major consumption regions even some decline for heroin and cocaine, there seems to be an increase in the non-medical use of prescription drugs in a number of countries. Non-medical use of prescription drugs, such as a number of synthetic opioids, tranquillizers and sedatives or prescription stimulants is reportedly a growing health problem in a number of countries. In the United States, emergency room visits related to the non-medical use of prescription drugs have started to exceed the numbers related to the use of illicit drugs. (UNODC, World Drug Report 2011)

Nonmedical use of prescription drugs is a common phenomenon among young adults, women, elderly patients and health care professionals. Another issue of concern is that the growing numbers of poly-drug users among illicit drug users also use prescription drugs in combination with their illicit drug of choice to enhance the effects of the main drug. While there are stable or downward trends for heroin and cocaine use in major regions of consumption, this is being offset by increases in the use of synthetic and prescription drugs. Non-medical use of prescription drugs is reportedly a growing health problem in a number of developed and developing countries. (UNODC, World Drug Report 2011)

Several African countries appear to be affected by trafficking in, and consumption of, diverted or counterfeit prescription drugs containing controlled substances whose nature is not always clear, though they appear to include ATS as well as sedatives and tranquillizers.

(UNODC, World Drug Report 2011)

In Madagascar, around 38% of the total treatment demand was for tranquillizers, second to cannabis (>60%). Similarly in South Africa, on average 6.9% of people in treatment reported prescription opioids and tranquillizers as either their primary or secondary drug of abuse.

(South African Community Epidemiology Network on Drug Use- SACENDU, 2010)

There is an evident preference for psychotropic drugs among females 15-16 years old in Algeria, which exceeds not only cannabis use but also alcohol and tobacco use.

(Mediterranean School Survey Project on Alcohol and Other Drugs-MedSPAD, 2006)

Elsewhere, a school survey conducted in 2009/10 in Morocco found that lifetime, annual and past-month prevalence of the use of psychotropic substances without a prescription exceeded that of cannabis among females aged 15-17, while among young males cannabis, cocaine and "crack" were the most widely used drugs. **(**MedSPAD, 2009-2010)

While the initiation of psychoactive substance use typically occurs during the teens or early years of adulthood, the (legal) use of tobacco and alcohol continues in much larger proportions with age in the same population groups. The use of khat which is legal in a number of countries shows the same patterns. (UNODC, World Drug Report 2012)

2.2 Knowledge of adolescents on drug and substance use.

Adolescents' knowledge about drug and substance use is varied with some having the knowledge while others have inadequate knowledge.

In a study to assess the relationships among risk knowledge, attitudes and ability to resist substance abuse in adolescents, participants were most knowledgeable about tobacco (80.2%), followed by alcohol (72.0%), ecstasy (56.0%), and marijuana (30.0%). Only 19.3% demonstrated an understanding of the harmful effects of using Ketamine.

(Chueh, Ding, Yao, Huang, & Hung 2013)

In a study on substance use among adolescent high school students in India: A survey of knowledge, attitude, and opinion, level of knowledge on harmfulness of substance use among students was very high (urban 84.6% and rural 61.5%) and they stated media as the most frequent source of information. (Dechenla, Ranabir, & Aparajita, 2010)

2.3 Attitudes of adolescents on drug and substance use.

In a study on motivations for tobacco consumption among adolescents in an urban high school participants reported that smoking relaxed and improved self-image, providing security (boys) and improving relations with the opposite sex, as well as weight control (girls). Friends constituted a pressure group to start or continue smoking. Starting secondary school marked the beginning of experimental use. Society tended to accept consumption and buying tobacco was easy for minors (Pérez et al., 2012)

In a study in Florida, males, but not females, also perceived that increasing the number of cigarettes smoked per day provides social benefits in the form of more friends. (Saunders, 2011)

2.4 Practices of adolescents on drug and substance use.

In an Indian study on tobacco abuse among school going adolescents in a rural area of West Bengal, 9.8% reported having ever used smokeless tobacco and 4.3% ever smoked.
(Mukherjee, Sinha, Taraphdar, Basu, & Chakrabarty, 2012)

In a study conducted in Brazil on self-medication in university students from the city of Rio Grande, 86.4% self-medicated (88.5% of 446 healthcare students). The most frequently used active ingredients were acetaminophen (paracetamol), dipyrone, aspirin, phytotherapic compounds, and tea. (Corrêa da Silva, Soares, & Muccillo-Baisch, 2012)

In a study conducted in France about the sociology and epidemiology of consumption of psychoactive substances in adolescents revealed that four out of five 16 years old students had drunk alcohol during the past 12 months and 36 percent had been drunk during the research period (compared to 39% in the average European country). About one-third of the students had smoked cigarettes during the past 30 days (close to the 29% in the average European country). The use of cannabis, however, was clearly more prevalent in France. Almost one-third (31%) of the students had already used cannabis (compared to 19% in the average European country). The use of inhalants was reported by 12 percent, which was close to the average, while 15 percent of the students had used tranquillizers or sedatives without a doctor's prescription, which is more than twice the European average (6%) (Beck & Legleye, 2009)

In Ghana, general rates of smoking show that males smoked more than females. In a random sample of 30 regional census enumeration areas, comprising all individuals 14 years of age and above, smoking rates of 8.9% and 0.3% were reported for males and females, respectively.

(David, Susanna, & Nora, 2012)

Findings from a study in South Africa indicated a prevalence rate of 19.8% for illicit drug use, 10.6% for cigarette smoking and 39.1% for alcohol consumption among the participants.

(Madu & Matla, 2003)

In a study conducted among rural adolescent students in South Africa, alcohol was the most commonly used drug by the respondents. Reported lifetime prevalence of alcohol use was 47.9% (95% CI: 42.6-53.2%); tobacco, 18.2% (95% CI: 14.4-22.7%), inhalants, 5.9% (95% CI: 3.8-9.0%); cannabis 5.6% (95% CI: 3.5-8.7%). Reported use of mandrax (3.9%), tranquillizer (3.6%) and cocaine (1.4%) was low. (Taiwo & Goldstein, 2006)

2.5 Drivers of drug and substance use among adolescents.

In a study conducted in India 'Easy availability' and 'relief from tension' were the most frequent reasons for continuation of substance use. Users were successful in influencing their peers into taking up this habit (urban 15.4% and rural 26.9%) (Dechenla et al. 2010)

Findings from a study in South Africa indicated that majority of the drug users and cigarette smokers do so when they are bored, tired or stressed up, or at parties; and most of those who drink alcohol indicated that they do so at parties, weekends, or any other time.

(Madu & Matla, 2003)

A broad socio-cultural category of drivers including changes to traditional value systems and the emergence of a relatively uniform "youth culture" in many countries also influences the evolution of the problem, though in ways that are often challenging to quantify.

Analysis also shows that the availability of and perceptions of the inherent dangers of drugs are key variables in shaping drug use. (UNODC, World Drug Report 2012)

CHAPTER 3: METHODOLOGY

3.1 Study Area

The study was conducted in Kabwohe - Itendero Town Council, one of the 11 administrative units of Sheema District Local Government. It is located in the Eastern part of Sheema District. It is bordered by Sheema Town Council in the West, Kagango Sub County in the North and South, and Mbarara District in the East. Kabwohe – Itendero Town Council covers a total area of 28 km squared.

Administratively Kabwohe –Itendero Town Council is the local authority mandated to plan and budget for social services under decentralization system of governance. It is divided into 8 wards namely Nyanga, Kakunnyu, Kanyinasheema, Itendero, Ndebo, Rweshama, Kabwohe and Rutooma wards. The wards of Kabwohe, Itendero, and Kanyinasheema are inhabited by medium- to -high income groups while the wards of Nyanga, Kankunyu, Ndebo, Rweshama and Rutooma house the low income groups.

Kabwohe - Itendero Town Council is the most populated administrative unit of Sheema District, housing about 10% of the District population (Sheema District Projected Population, 2011).

According to Sheema District projected population (2011), the population of Kabwohe – Itendero Town Council is 17,543 and population growth rate of 2.0 %.

The town council has a total of seven (07) secondary schools two (02) of which are government aided and five (05) are private owned. Kabwohe Health Centre IV is the public health facility that is mandated to plan and implement the health care services to the community members of Kabwohe – Itendero Town Council and it is complemented by other private facilities.

Poverty is one of the major problems facing the people of Kabwohe – Itendero Town Council especially the youth and women. The majority of the population (about 60%) is comprised of low income earners. The people engage predominantly in small-scale businesses such as Matooke selling, retail and whole sale, small scale industries, artisan work and crafts, urban farming, fish vending and small-scale service industries., communications, sale of alcoholic and non-alcoholic beverages, commercial cycling, taxi driving and special hire; peddling, roadside vending, a variety of other business and doing professional work especially teaching.

(Kabwohe – Itendero Town Council Annual Work Plan, 2012/2013)

The community of Kabwohe – Itendero Town Council suffer from both communicable and non-communicable diseases. Non-communicable diseases associated with drug and substance use like mental illness and intentional trauma among adolescents are on the increase especially in Kabwohe – Itendero Town Council (Kabwohe HC IV HMIS Report, 2010/11).

However the knowledge, attitude and practices of adolescents on drug and substance use in Kabwohe – Itendero Town Council are unknown.

3.2 Study Population

The study was conducted on adolescents who were studying in secondary schools located in Kabwohe - Itendero Town Council irrespective of whether they were day or boarding, mixed or single, O' level or A' level schools.

3.3 Study Design

It was a cross sectional study employing both quantitative and qualitative research methods for triangulation.

3.4 Sample size determination

The sample size was **132** respondents and was determined using statistical software package Epi info 7 for descriptive studies as follows:

Kabwohe – Itendero Town Council has a population of 17,543 people. Adolescents (10-24 years) constitute 34.7% of the total population (UBOS 2011 Midyear projection) which comes to 6,088 people, however the total enrolment of adolescents in Secondary Schools in Kabwohe – Itendero Town Council was 2,774 (47%) which was the population size used to compute sample size. The national prevalence of drug and substance use is between 5 to 10% (MOH, 2005). Using stat calc formula of Epi Info 7 computer program, at confidence level of 95% sample size of **132** respondents was got as shown below.

Population size = 2,774

Expected frequency = 10 %

Confidence limits = 5 %

Confidence level	***sample size***
80%	58
90%	94
95%	**132**
97%	160
99%	220
99.9%	342
99.99%	456

At 95% confidence level sample size of **132** respondents was got.

3.5 Selection of respondents/sampling technique

Kabwohe - Itendero Town Council was selected purposively because it has got the highest population (10%), the biggest number of secondary schools in Sheema district and also due to the fact that it is located along Kasese - Mbarara high way which has been sighted by police as a conduit for drugs and substances such as khat and marijuana.

The total number of secondary schools in Kabwohe - Itendero Town Council was 7. The total sample size was 132 respondents. The number of respondents drawn from each school was determined by proportion to size. This was got by getting a list of all the seven secondary schools in the Town Council (Itendero High School, Itendero Secondary School, Road Side High School, St. Peter's Secondary School, Kabwohe Secondary School, Nganwa High School and Sheema Premier School) and then got their enrolment/number of adolescents in school which were (415, 320, 416, 115, 358, 650 and 500 students respectively). Then the total number of adolescents enrolled in all the seven schools was got by summing up all the enrolments of all the seven schools = (415 + 320 + 416 + 115 + 358 + 650 + 500) = 2774 students.

Therefore the proportion of respondents that was drawn from each Schoo1

= Enrolment of each school/Total enrolment for all the seven schools X Total sample size for the whole study.

School	**Enrolment**	**Proportion to size**	**Number of respondents taken from the school**
Itendero High School	415	415/2774 X 132	20
Itendero Secondary School	320	320/2774 X 132	15
Road Side High School	416	416/2774 X 132	20
St. Peter's Secondary School	115	115/2774 X 132	05
Kabwohe Secondary School	358	358/2774 X 132	17
Nganwa High School	650	650/2774 X 132	31
Sheema Premier School	500	500/2774 X 132	24

The same principle of proportion to size was also followed in determining the number of respondents drawn from each class. Considerations made here were the proportion of respondents for that school, the number of classes each school had and the enrolment in each class.

Therefore the proportion of respondents drawn from each class of different schools

was as follows.

1. **Itendero High School**

Class	**Enrolment**	**Proportion to size**	**Number of respondents taken from the Class**
S1	96	96/415 X 20	05
S2	100	100/415 X 20	05
S3	90	90/415 X 20	04
S4	79	79/415 X 20	04
S5	22	22/415 X 20	01
S6	28	28/415 X 20	01

2. Itendero Secondary School

Class	Enrolment	Proportion to size	Number of respondents taken from the Class
S1	40	40/320 X 15	02
S2	43	43/320 X 15	02
S3	43	43/320 X 15	02
S4	105	105/320 X 15	05
S5	40	40/320 X 15	02
S6	50	50/320 X 15	02

3. Road Side High School

Class	Enrolment	Proportion to size	Number of respondents taken from the Class
S1	108	108/416 X 20	05
S2	96	96/416 X 20	05
S3	89	89/416 X 20	04
S4	106	106/416 X 20	05
S5	17	17/416 X 20	01

4. St. Peters Secondary School

Class	**Enrolment**	**Proportion to size**	**Number of respondents taken from the Class**
S1	20	20/115 X 5	01
S2	30	30/115 X 5	01
S3	25	25/115 X 5	01
S4	40	40/115 X 5	02

5. Kabwohe Secondary School

Class	**Enrolment**	**Proportion to size**	**Number of respondents taken from the Class**
S1	70	70/358 X 17	03
S2	75	75/358 X 17	03
S3	70	70/358 X 17	03
S4	96	96/358 X 17	05
S5	35	35/358 X 17	02
S6	12	12/358 X 17	01

6. Nganwa High School

Class	Enrolment	Proportion to size	Number of respondents taken from the Class
S1	100	100/650 X 31	05
S2	112	112/650 X 31	05
S3	157	157/650 X 31	07
S4	117	117/650 X 31	06
S5	102	102/650 X 31	05
S6	62	62/650 X 31	03

7. Sheema Premier School

Class	Enrolment	Proportion to size	Number of respondents taken from the Class
S1	41	41/500 X 24	02
S2	120	120/500 X 24	06
S3	110	110/500 X 24	05
S4	138	138/500 X 24	06
S5	35	35/500 X 24	02
S6	56	56/500 X 24	03

The last step in selection of respondents was drawing the respondents from the class members to make the number determined by the proportion to size. This was done by employing systematic sampling using class lists where the n^{th} student was drawn /considered as respondent. So sampling was multistage whereby on school and class levels it was proportion to size and at drawing respondents from each class it was systematic sampling.

3.6 Inclusion criteria /exclusion criteria

All the students that were selected by the above sampling procedure and they fell in the age bracket 10-24 years who consented for those above 18 years or whose parents consented followed by adolescents assent (below 18 years) were included in the study and all those students that did not consent were excluded from the study.

3.7 Study variables

3.7.1 Dependent Variable/outcome was drug/substance use; that was using or having ever used drugs/substances such as alcohol, tobacco, khat, marijuana, volatile solvents and medicines not prescribed by doctor or nurse.

3.7.2 Independent Variables/exposurewere Knowledge of adolescents on (Drug use, Substance use, sources, effects/benefits, health risks, regulations and policies), Attitudes (perceived benefits and dangers towards health, education and well-being), Practices (smoking tobacco, drinking alcohol, chewing khat, smoking marijuana, sniffing solvents and self medication) and Drivers (Peer pressure, familial background/ use, availability/ access, source of income).

3.8 Quality control

- Data collection tools were developed by adopting some of the core indicators/questions in the WHO guide to drug abuse epidemiology of 2000.
- Pre-testing of tools was done in Shuuku Sub County which is another administrative unit of Sheema District at Butsibo Secondary School to test for flow and understand ability of questions by the secondary school adolescents. Corrections were made to data collection tools after pre-testing.
- Research assistants were trained about the objectives of the study and oriented on the tools and data collection process.

- Respondents were always requested to completely fill in the questionnaire.
- Deliberate understatement or denial of drug use was addressed by assuring confidentiality to the respondents and anonymity.

3.9 Tools for data collection

Quantitative -Self-administered questionnaire was administered to adolescents (respondents)

Qualitative-Focus group discussion guide was used to guide FGDs that were held with students

-In-depth interview guide was used to guide interviews held with Student leaders', Teachers, Head Teachers, Health Worker, Police Community Liaisons Officer and Police detectives.

3.10 Data Collection

Data collection was done by the researcher assisted by the trained research assistants using pre-tested/corrected data collection tools.

Data quality was ensured (beginning during the study) by monitoring data collection, striving to get complete data; review of questionnaires before participants leave (for completeness and accuracy) and also data was collected according to protocol.

3.11Data Management and analysis

After collection of the data, the principal investigator checked the filled questionnaires, checked the data, for consistency and completeness**.** Data were coded, cleaned and entered using epi data 3.1 version soft ware. Thereafter data was exported to STATA statistical soft ware package for analysis.

3.11.1 Uni-variate analysis

All the variables listed in the conceptual framework were used in uni-variate analysis. Drug and substance use was determined as a proportion of the population participating in the study that had ever used the drugs/substances under study.

3.11.2 Bi–variate analysis

Bi-variate analysis was used to explain the relationship between the independent variables and the outcome variable (drug/substance use). It was also used to determine the strength and significance of this relationship**.**

Statistical significance of the association between whether one is a user of drug/substance or not and the independent variables was tested using Chi-square and t-tests. The relationship was significant at p-value level less than the 0.05.The crude Odds ratio (OR) was used to measure the strength of association between the independent variable and the outcome variable (use of drug/substance). One level of the independent variable was assigned as the reference variable. Values of the Odds Ratio close to 1 were interpreted as having no relationship to the outcome variable. OR values less than 1 were interpreted as having a protective effect of the independent variable from use of drug/substance. OR values greater than 1 were believed to have a causal relationship between the independent variable and the outcome variable. The 95% confidence intervals were used as a measure of reliability of the estimate of the population parameter. The p-value was used to measure statistical significance and strength of the association between the independent variable and the outcome variable.

3.12 Ethical considerations

The ethical principles were followed and ethical review was undertaken by the University Research Committee prior to initiating the research. The study's purpose, benefits, risks, duration, procedures and alternatives were described to head teachers of the schools in a process of seeking for permission to meet and interact with adolescents in schools. The adolescents who were 18 years and above were asked to sign consent form prior to administration of questionnaires. For adolescents who were below 18 years and in boarding section whose parents/guardians could not consent prior to their assent were replaced by others that were either above 18 years or were in day section whose parents/guardians would sign consent forms first followed by their assent. Adolescents that were below 18 years and could not consent on their own but offered affirmative assent, it took precedence over their parents/guardians consent.**Uganda National Council for Science and Technology 2007. National Guidelines for Research involving Humans as Research Participants. Kampala- Uganda: UNCST, Section 6.6, Page 26.**

The process of seeking for consent/assent was done using easy to understand language; scientific or medical jargons were avoided. Potential subjects were informed that they had option of not participating in the study.

Written agreement was obtained from adolescents above 18 years or parents/guardians of adolescents in this manner referred to as an informed consent. Informed assent was sought from adolescents below 18 years and whose parents/guardians had consented after going through the whole assent process of information giving, comprehension and voluntariness.

Confidentiality was ensured since information collected on drug/substance use is strictly personal and can be damaging to respondents if traced back to them. Findings or results will be fed back to individuals, groups or communities that took part in the research.

Data was pooled and un-linked to individuals in order to ensure confidentiality. Respondents were recruited as per consent/assent and there were no financial inducements and they were guarded against risks and those that would have required on- going services would have been linked to service provision points within the service area who were already contacted.

3.13 Dissemination of results

The study findings have been presented to Uganda Christian University Department of Health Sciences and Uganda Christian University School of Research and Post Graduate Studies, as partial fulfillment for the award of the degree of Master of Public Health of Uganda Christian University. The report will also be disseminated to Kabwohe - Itendero Town Council and copies of the report will be provided to the DHO, the DEO, the police and other stakeholders such as secondary school administrators and school management committees.

Abstracts and manuscripts will be written for journal publications and conference presentations will be made.

CHAPTER 4: RESULTS

These are results from 132 respondents, 9 key informants and 4 focus group discussions held.

4.1 Socio-demographic characteristics

Table 4.1: Socio-demographic characteristic of respondents

Characteristic	Frequency N=132	Percentage %
Sex		
Male	89	67.4
Female	43	32.6
Age		
13-15	21	15.9
16-18	79	59.8
19-21	25	18.9
22-24	07	5.4
Class		
S1-S2	50	37.9
S3-S4	59	44.7
S5-S6	23	17.4
Religion		
Protestant	83	62.9
Roman Catholic	24	18.1
Pentecostal	08	6.1
Muslim	17	12.9
Tribe		
Munyankole	106	80.3
Mukiga	08	6.1
Muganda	11	8.3
Others	07	5.3
Father's Occupation		
Businessman	54	40.9
Civil servant	45	34.1
Driver	11	8.3
In Armed Forces	13	9.9
Spiritual leader	09	6.8
Area of residence		
Rural area	88	66.7
Urban area	44	33.3

The majority of the respondents were males constituting 67.4% (89/132). About 60% of the respondents were aged 16-18 years with a mean of 17.4 years, minimum age was 14 years while maximum age was 24 years. Majority of the respondents were from rural areas constituting 66.7% (88/132) while 33.3% (44/132) were from urban areas. Majority of the respondents were Banyankole by tribe constituting 80.3% (106/132) followed by Baganda 8.3% (11/132) while Bakiga and other tribes constituted 11.4% (15/132). A big proportion of the respondents fathers' were businessmen 40.9% (54/132) and least of the respondents' fathers were spiritual leaders 6.8% (09/132).

4.2 Knowledge of Secondary school adolescents on drug and substance use

Knowledge of Secondary School adolescents on drug and substance use was one of the objectives this research was intended to assess and it was assessed through asking respondents what drug and substance use are; common drugs/substances used by adolescents and their sources, effects/benefits of use and inquiry about regulations and policies in place to regulate use of the drugs and substances of concern.

4.2.1 Definition of drug/substance use, effects on users, effects on HIV/AIDS trends and commonly used drugs/substances

The responses of adolescents on definition of drug/substance, effects on users, effects on HIV/AIDS trends and commonly used drugs/substances are in tables 4.2

Table 4.2: Knowledge of Secondary School adolescents on Drug and Substance use

Knowledge of Secondary School Adolescents on Drug and substance Use	Total (N=132)	
	Number	Percent (%)
Definition of Drug Use		
Using Medicines according to prescription for treatment purposes	66	50
Harmful use of any drug for mood altering purposes including illicit	54	40.9
Using traditional preparations for management of common diseases	5	3.8
Could not define	7	5.3
Definition of Substance Use		
Using substances for intended purposes	60	45.5
Pattern of harmful use of substances for mood altering purposes	48	36.4
Using traditional preparations for management of common diseases	10	7.5
Did not know substance use	14	10.6
Effects of drug and substance use on adolescents in school		
Dropping out of school	38	28.8
Diseases like cancer and liver failure	34	25.7
Brain damage	34	25.7
Increased crime rate	10	7.6
Bad behavior	10	7.6
Poor academic grades	3	2.3
Student strikes	3	2.3
Effect of drug and substance use on the trends of HIV/AIDS		
It affects trends by increasing transmission (Yes)	108	81.8
It does not affect trends of HIV/AIDS (No)	24	18.2
Common drugs and substances used by adolescents in & around school		
Alcohol	76	52.4
Tobacco	22	15.2
Khat ("mairungi")	8	5.5
Cannabis (marijuana)	18	12.5
Un prescribed medicines	21	14.4

**Some respondents stated more than one drug and substance that are commonly used by adolescents in and around school setting.*

4.2.1.1 Definition of drug use by respondents.

Half of the respondents (50%) defined drug use asusing medicines according to prescription/direction for treatment purposes, about 40% defined it as pattern of harmful use of any drug for mood-altering purposes including illegal drugs, about 4 % defined it as using traditional preparations for management of common diseases while 5% could not define drug use.

4.2.1.2 Definition of substance use by respondents.

About 45% defined substance use as using substances for purposes they are intended for, 36.4% defined it as pattern of harmful use of substances for mood-altering purposes, 7.5% defined it as using traditional preparations for management of common diseases, while about 10% didn't know what substance abuse was.

4.2.1.3 Effects of drug and substance use on the adolescents in secondary school

About 30% of the respondents reported dropping out of school, 25.8% diseases like cancers and liver failure, 25.8%brain damage, 7.5% increased crime rate, 7.5% bad behavior, while poor grades and strikes constituted 2.3% each.

4.2.1.4 Effects of drug and substance use on the trends of HIV/AIDS transmission

Majority of the respondents 81.8% reported thatdrug and substance use had effect on HIV/AIDS trends while 18.2% of the respondents thought that itdidn't have any effect on HIV/AIDS trends (such as spread and transmission).

The majority of key informants and focus groups thought that drug and substance use can affect trends of HIV/AIDS by increasing its transmission as elaborated by the key informant.

"*The use of drugs and substances can easily increase the spread of HIV/AIDS since some of the users can end up raping or being raped of which such an act cannot be protected and also those that are already positive; efforts to have them on treatment may not yield good results and can continue spreading the disease"* (KI, CLO Sheema Police Station).

4.2.1.5 Reported common items (drugs and substances) used by students in and around school setting

Alcohol was the commonest reported among the drugs and substances used by students in and around the school setting followed by tobacco, un-prescribed medicines, cannabis, khat and others which included "kuber" among others. The above frequency was in agreement with what was reported in all the FGDs and Key Informant interviews held as one key informant reported in the interview that " *Alcohol, tobacco and cannabis in that order are the commonly used and of recent also "kuber" follows the three first mentioned"* (KI- Prefect-Student).

4.2.2 Places where students get drugs and substances in and around school setting.

The reported sources/places where in-school adolescents get drugs and substances for use were bars, shops, nearest trading centres/town, bad groups and friends, "ghettos", gardens, home, day-scholars, drug shops and market while others didn't know the source.

The proportion of respondents who reported the above as the sources of drugs and substances under study and their corresponding percentages are shown in table 4.3.

Table 4.3: Sources of drugs and substances in and around school setting.

Reported sources/places of drugs/substances in and around school setting			
Drug/substance	**Reported source**	**Proportion N=132**	**Percentage (%)**
Alcohol	Bars	66	50.0
	Trading centers	57	43.2
	"Tree shed"	05	3.8
	Fellow students	04	3.0
Tobacco/ Cigarettes	Bars and shops	61	46.2
	Trading centers/Town	44	33.3
	Friends/groups	07	5.3
	"Ghettos"	04	3.0
	Gardens	04	3.0
	Home	04	3.0
	Day scholars	04	3.0
	Market	02	1.5
	Didn't Know source	02	1.5
Khat/"Mairungi"	Town/centre	43	32.6
	Drug dealers	12	9.1
	Villages	12	9.1
	Ghettos	12	9.1
	Bush and Gardens	12	9.1
	Friends/Groups	24	18.2
	Video halls	02	1.5
	Home	05	3.8
	Didn't Know source	10	7.5
Cannabis/"Marijuana"	Trading centre	34	25.8
	Friends	20	15.2
	Home	18	13.6
	Ghettos	18	13.6
	Gardens	18	13.6
	Bushes and gardens	12	9.1
	Villages	12	9.1
Medicines	Health facilities	86	65.1
	Town	31	23.5
	Clinics/Pharmacies	15	11.4

4.2.3 Regulations and policies in place to regulate the use of drugs and substances

Members who attended all the FGDs and some key informants had inadequate knowledge about regulations and policies in place to regulate the use of drugs and substances that were under study.

Most didn't know the regulations about age and use, the warning about the harmful effects that should be put on packaging materials of harmful substances, the substances whose use are prohibited by the law and protection of the community members that don't use the drugs/substances of concern. *"Some members who participated in the FGDs had divergent views from their colleagues who were opposed to smoking in public, selling alcoholic beverages to students and people less than 18 years and using all classes of medicines not prescribed by health workers that were freely accessed from selling shops"*

Similar results were got from some key informants with exception of police officers, health worker and some school administrators as elaborated by this key informant *"Even students and people less than 18 years should be allowed to drink alcohol as long as they are not in school premises or are on holidays"*(KI - Student).

Other key informants had different views concerning policies and regulations with some even suggesting more control measures as elaborated by this key informant *"Government should ban any form of advertisement for all scientifically proven harmful substances in all mass media as they cause irreversible damage and lead to loss of lives and reduced productivity"*(KI-Teacher)

4.3 Attitudes of Secondary School Adolescents towards use of drugs and substances.

The attitudes of adolescents on drug and substance use were assessed by asking respondents on how they perceived use of drugs and substances by adolescents, perceived benefits or dangers of use, approval or disapproval of use, perceived accessibility, estimated friends who use drugs/substance and problems suffered by users of drugs and substances.

4.3.1Respondents perceived benefits and dangers of using drugs/substances by Secondary School adolescents.

Perceived benefits were relaxing mind, passing time, socializing, increasing confidence, prestige and medicine while dangers included causing diseases, poverty/loss of employment, brain damage and no benefit at all. Their frequencies and percentages are shown in table 4.4 below

Table 4.4: Benefits and dangers of using drugs/substances by Secondary School adolescents.

Perceived benefits and dangers of using drugs/substances by Secondary School Adolescents		
Perceived Benefits	**Total (N = 132)**	
	N	**%**
Relaxing mind and solving problem	46	34.8
Passing time	30	22.7
Friendship and socializing	20	15.2
Increase confidence	18	13.6
Prestige	10	7.6
Medicine	8	6.1

Perceived Dangers	**Total (N = 132)**	
	N	**%**
Cause diseases	50	37.9
Poverty/loss of employment	18	13.6
Brain damage	14	10.6
No benefit	50	37.9

4.3.2 Respondents' attitude on use of drugs and substances by Secondary School adolescents.

Half of the respondents (66/132) strongly disapproved use of the drugs and substances by Secondary School adolescents, 28.8% (38/132) disapproved use while 21.2% (28/132) didn't disapprove the use of drugs and substances by Secondary School adolescents.

4.3.3 The problems/effects the respondents have suffered following drugs/substances use

Of the 132 interviewed, 48/132 had ever used drugs and substances. Of these less than 50% (21/44) of the respondents who had ever used alcohol reported that it caused them to join bad groups, 31.8% (14/44) reported poor academic performance while 20.4% (9/44) reported breaking the law.

Half of the respondents (50%) who had ever used tobacco reported that it led to bad/ill health while the remaining 50% of the tobacco users reported that its use led to broken relationship.

Of the mairungi users 60% reported that it led to hurting relationship with parents or teachers while 40% of mairungi users reported negative academic performance.

All the marijuana users reported behaving in the way they later regretted as the only effect they had experienced during use.

Un-prescribed medicine users only reported bad health as the only effect they have experienced.

4.3.4 Respondents perceived accessibility and estimated friends using drugs/substances among secondary school adolescents.

Respondents' responses about what they thought on accessibility and number of friends using drugs/substances are shown in table 4.5 below.

Table 4.5: Accessibility and estimated friends using drugs/substances

Perceived accessibility (how easy/difficult) and estimated friends using drugs/substances

Accessibility of drugs /substances by school adolescents

Drug/substance	Very easy %	Fairly easy %	Fairly Difficult %	Very difficult %
Alcohol	64	23	10	3
Tobacco	56	15.1	16	12.9
Mairungi	30	19	24	27
Marijuana	25	8.5	7	59.5
Valatile Solvents	15	35	35	15
Un prescribed medicines	55	10	15	20

Estimated friends using drugs/substances

Drug/substance	None of them	Few of them	Most of them	All of them
Alcohol	52.3	34.8	11.3	1.6
Tobacco	78.8	15.1	3.8	2.3
Mairungi	78.8	17.4	2.3	1.5
Marijuana	79.5	15.1	3.8	1.6
Valatile Solvents	100	0	0	0
Un prescribed medicines	65.1	21.1	9.1	4.7

4.3.4.1 Respondents' perceived accessibility of drugs/substances by secondary school adolescents

Respondents thought that alcohol, tobacco and un-prescribed medicines were very easy to be accessed while marijuana and mairungi were very difficult to be accessed by secondary school adolescents as shown in table 4.5

4.3.4.2 Respondents' friends estimated to be using drugs and substances

Estimated percentage of respondents' friends using drugs/substances was 47.7% alcohol, 21.2% tobacco, 21.2% mairungi, 20.5% marijuana while 34.9% of the respondents' friends were estimated to be using un-prescribed medicines as shown in table 4.5.

4.4 Practices of in school adolescents on drug and substance use

4.4.1 Characteristics of respondents on drug and substance use.

The proportion of respondents who had ever used drugs/substances was 36.4% (48/132) while 63.6% (84/132) had never used any of the drugs/substances of concern. The mean ages at starting use of different drugs/substances were 12, 10, 14, 14 and 17 years for tobacco, alcohol, marijuana, mairungi and un-prescribed medicines respectively. The other characteristics of respondents who had ever used drugs/substances are shown in table 4.6 below.

Table 4.6: Practices of Secondary school adolescents on drug and substance use

Practices of Secondary school adolescents on drug and substance use.

	Use	Alcohol n/(%)	Tobacco n/(%)	Mairungi n/(%)	Marijuana n/(%)	Solvents n/(%)	Self medication n/(%)
Ever used	**Yes**	44 (33.3)	11 (8.3)	4 (3.0)	5 (3.8)	0 (0.0)	8 (6.1)
	No	88 (66.7)	121 (91.6)	128 (97)	127(96.2)	132(100)	124(93.9)
User category	**Past**	12 (27.3)	5 (45.4)	1 (25)	3 (60)	0 (0.0)	2 (25)
	Current	32 (72.7)	6 (54.6)	3 (75)	2 (40)	0 (0.0)	6 (75)
Frequency of use	**Rarely**	13(29.5)	2 (18.2)	1 (25)	2 (40)	0 (0.0)	2 (25)
	Occasionally	20 (45.5)	3 (27.3)	1 (25)	0 (0.0)	0 (0.0)	3 (37.5)
	Regularly	11 (25.0)	6 (54.5)	2 (50)	3 (60)	0 (0.0)	3 (37.5)
Duration of use	**> 6months**	18 (40.9)	4 (36.4)	0 (0.0)	1 (20)	0 (0.0)	5 (62.5)
	< 6months	26 (59.1)	7 (63.6)	4 (100)	4 (80)	0 (0.0)	3 (37.5)
Use in past 1 week	**Yes**	14 (31.8)	7 (63.6)	2 (50)	2 (40)	0 (0.0)	1 (12.5)
	No	30 (68.2)	4 (36.4)	2 (50)	3 (60)	0 (0.0)	7 (87.5)
Drugs transaction	**Yes**	0 (0.0)	2 (18.2)	2 (50)	0 (0.0)	0 (0.0)	0 (0.0)
	No	44 (100)	9 (81.8)	2 (50)	5 (100)	0 (0.0)	8 (100)

Note: Some respondents were using more than one drug/substance and no respondent was using solvents.

4.4.2 Bi-variate analysis

4.4.2.1 Relationship between socio-demographic factors and the use of drugs/substances

Bi-variate analysis was done to establish statistical significance and strength of association between independent variables and the dependent variable (use of drugs/substances).

Table 4.7 shows results of the relation between demographic characteristics and the use of drugs/substances. Respondents whose fathers were in armed forces were 0.4 less likely to use drugs/substances (OR= 0.4, 95% CI; 0.32- 0.50) while respondents whose fathers were businessmen were 0.6 less likely to use drugs/substances (OR= 0.6, 95% CI; 0.16 - 0.93) and associations were statistically significant with p-values of 0.003 and 0.035 respectively.

Table 4.7: Relationship between socio-demographic factors and drug/substance use

Relationship between Socio-demographic factors and drug/substance use

Variable	Users		Non Users		OR	95% CI	p-value
	N=48	%	N=84	%			
Age							
13-18	23	47.9	77	91.6	0.6	(0.34-0.98)	0.54
19-24	25	52.1	7	8.4	1	Reference	
Gender							
Male	36	75	53	63.1	1.7	(0.79-3.86)	0.16
Female	12	25	31	36.9	1	Reference	
Religion							
Catholic	10	20.8	14	16.7	0.8	(0.33-2.10)	0.702
Pentecostal	3	6.3	5	6	1	(0.22-4.45)	0.993
Muslim	4	8.3	`13	15.4	1.9	(0.58-6.46)	0.282
Protestant	31	64.6	52	61.9	1	Reference	
Tribe							
Mukiga	2	4.2	6	7.1	1.7	(0.33-9.07)	0.507
Muganda	4	8.3	7	8.3	1	(0.28-3.70)	0.978
Mutooro	1	2.1	1	1.2	0.6	(0.35-9.57)	0.705
Mukonjo	2	4.2	3	3.6	0.9	(0.14-5.45)	0.885
Munyankole	39	81.3	67	79.8	1	Reference	
Fathers' Occupation							
Businessman	23	47.9	31	36.9	0.4	(0.16-0.93)	0.035*
Driver	4	8.3	7	8.3	0.5	(0.12-2.06)	0.337
Armed Forces	9	18.8	4	4.8	0.1	(0.32-0.50)	0.003*
Spiritual leaders	2	4.2	7	8.3	1	(0.18-5.59)	1
Civil Servant	10	20.8	35	41.7	1	Reference	
Residence							
Town	16	33.3	28	33.3	1.1	(0.48-2.49)	0.82
Rural area	32	66.7	56	66.7	1	Reference	

Statistically significant association between the independent variable and drug/substance use

4.4.2.2 Relationship between socio-demographics and the use of segregated drugs and substances.

The segregated drugs/substances that were associated with socio-demographics and relationship statistically significant were alcohol, tobacco," mairungi" and marijuana.

Respondents whose fathers were in armed forces and businessmen were 0.2 and 0.4 times less likely to use alcohol compared to respondents whose fathers were in civil service and this association was statistically significant (p=0.001 and 0.020) respectively.

Respondents who were Baganda by tribe were 0.2 times less likely to use tobacco compared to Banyankole and the association was statistically significant p=0.033.

Respondents who were Batooro by tribe were 0.02 and 0.04 less likely to use "mairungi" and marijuana respectively compared to Banyankole and was statistically significant (p=0.021 and 0.031) respectively.

The relationship of socio-demographics and segregated drugs/substances which include alcohol, tobacco, "mairungi", marijuana and un-prescribed medicines are shown in tables 4.8, 4.9, 4.10, 4.11 and 4.12 respectively.

Table 4.8: Relationship between socio-demographic factors and alcohol use in adolescents

Relationship between Socio-demographic factors and alcohol use							
Variable	**Users**		**Non Users**		**OR**	**95% CI**	**p-value**
	N=44	**%**	**88**	**%**			
Age							
13-18	15	34.1	85	95.5	0.9	(0.57-2.34)	0.661
19-24	29	65.9	3	4.5	1	Reference	
Gender							
Male	34	77.3	55	62.5	2	(0.89-4.66)	0.094
Female	10	22.7	33	37.5	1	Reference	
Religion							
Catholic	9	20.5	15	17.1	0.9	(0.37-2.41)	0.901
Pentecostal	2	4.6	6	6.8	1.7	(0.32-8.95)	0.533
Muslim	3	6.8	14	15.9	2.6	(0.70-9.94)	0.154
Protestant	30	68.1	53	60.2	1	Reference	
Tribe							
Mukiga	2	4.5	6	6.8	1.4	(0.28-7.71)	0.646
Muganda	4	9.1	7	8	0.9	(0.24-3.14)	0.826
Mutooro	1	2.3	1	1.1	0.5	(0.29-8.12)	0.627
Mukonjo	2	4.5	3	3.4	0.7	(0.12-4.62)	0.753
Munyankole	35	79.6	71	80.7	1	Reference	
Fathers' Occupation							
Businessman	21	47.7	33	37.4	0.4	(0.13-0.87)	0.020*
Driver	4	9.1	7	8	0.4	(0.09-1.61)	0.191
Armed Forces	9	20.5	4	4.5	0.2	(0.02-0.39)	0.001*
Spiritual leaders	2	4.6	7	8	0.8	(0.13-4.34)	0.762
Civil Servant	8	18.1	37	42.1	1	Reference	
Residence							
Urban area	16	36.4	28	31.8	0.9	(0.39-2.05)	0.261
Rural area	28	63.6	60	68.2	1	Reference	

Statistically significant association between the socio-demographic factors and alcohol use

Table 4.9: Relationship between socio-demographic factors and tobacco use in adolescents

Relationship between Socio-demographic factors and Tobacco use							
Variable	**Users**		**Non Users**		**OR**	**95% CI**	**p-value**
	N=11	**%**	**N=121**	**%**			
Age							
13-18	4	36.4	96	79.3	0.8	0.11-2.24	0.067
19-24	7	63.6	25	20.7	1	Reference	
Gender							
Male	8	72.7	81	66.9	1.3	(0.33-5.23)	0.696
Female	3	27.3	40	33.1	1	Reference	
Religion							
Catholic	3	27.3	21	17.4	0.4	(0.09-2.03)	0.298
Pentecostal	1	9.1	7	5.8	0.4	(0.04-4.39)	0.491
Muslim	2	18.2	15	12.4	0.5	(0.08-2.71)	0.407
Protestant	5	45.4	78	64.4	1	Reference	
Tribe							
Mukiga	1	9.1	7	5.8	0.5	(0.05-4.61)	0.537
Muganda	3	27.3	8	6.6	0.2	(0.04-0.87)	0.033*
Mutooro	0	0	2	1.6	NA	NA	NA
Mukonjo	0	0	5	4.2	NA	NA	NA
Munyankole	7	63.6	99	81.8	1	Reference	
Fathers' Occupation							
Businessman	4	36.4	50	41.3	0.9	(0.19-4.22)	0.886
Driver	1	9.1	10	8.3	0.7	(0.07-7.61)	0.78
Armed Forces	2	18.2	11	9.1	0.4	(0.05-2.64)	0.337
Spiritual leaders	1	9.1	8	6.6	0.6	(0.05-6.21)	0.646
Civil Servant	3	27.2	42	34.7	1	Reference	
Residence							
Urban area	5	45.5	39	32.2	0.7	(0.18-3.31)	0.737
Rural area	6	54.5	82	67.8	1	Reference	

Statistically significant association between socio-demographics and tobacco use

Table 4.10: Relationship between socio-demographic factors and Khat use in adolescents

Relationship between Socio-demographic factors and Khat /"Mairungi" use							
Variable	**Users**		**Non Users**		**OR**	**95% CI**	**p-value**
	N=4	**%**	**N=128**	**%**			
Age							
13-18	1	25	99	77.3	0.9	(0.09-1.97)	0.75
19-24	3	75	29	22.7	1	Reference	
Gender							
Male	2	50	87	68	0.5	(0.06-3.46)	0.46
Female	2	50	41	32	1	Reference	
Religion							
Catholic	2	50	22	17.1	0.3	(0.04-2.03)	0.205
Pentecostal	0	0	8	6.3	_	_	_
Muslim	0	0	17	13.3	_	_	_
Protestant	2	50	81	63.3	1	Reference	
Tribe							
Mukiga	0	0	8	6.3	_	_	_
Muganda	0	0	11	8.6	_	_	_
Mutooro	1	25	1	0.8	0.02	(0.001-0.585)	0.021*
Mukonjo	0	0	11	3.9	_	_	_
Munyankole	3	75	103	80.4	1	Reference	
Fathers' Occupation							
Businessman	2	50	52	40.6	1.2	(0.16-8.95)	0.852
Driver	0	0	11	8.6	_	_	_
Armed Forces	0	0	13	10.2	_	_	_
Spiritual leaders	0	0	9	7	_	_	_
Civil Servant	2	50	43	33.6	1	Reference	
Residence							
Urban area	2	50	86	67.2	0.7	(0.06-9.01)	0.85
Rural area	2	50	42	32.8	1	Reference	

Statistically significant association between socio-demographics and Khat /"mairungi" use

Table 4.11: Relationship between socio-demographics and marijuana use in adolescents

Relationship between Socio-demographic factors and Marijuana use							
Variable	**Users**		**Non Users**		**OR**	**95% CI**	**p-value**
	N= 5	**%**	**N=127**	**%**			
Age							
13-18	3	60	97	76.4	1.9	(0.94-3.02)	0.665
19-24	2	40	30	23.6	1	Reference	
Gender							
Male	3	60	86	67.7	0.7	(0.12-4.45)	0.719
Female	2	40	41	32.3	1	Reference	
Religion							
Catholic	1	20	23	18.1	0.9	(0.09-8.69)	0.9
Pentecostal	0	0	8	6.3	_	_	_
Muslim	1	20	16	12.6	0.6	(0.06-6.14)	0.667
Protestant	3	60	80	63	1	Reference	
Tribe							
Mukiga	0	0	8	6.3	_	_	_
Muganda	0	0	11	8.7	_	_	_
Mutooro	1	20	1	0.8	0.04	(0.002-0.746)	0.031
Mukonjo	0	0	5	3.9	_	_	_
Munyankole	4	80	102	80.3	1	Reference	
Fathers' Occupation							
Businessman	1	20	53	41.6	3.7	(0.38-37.7)	0.256
Driver	0	0	11	8.7	_	_	_
Armed Forces	1	20	12	9.5	0.9	(0.08-9.01)	0.898
Spiritual leaders	0	0	9	7.1	_	_	_
Civil Servant	3	60	42	33.1	1	Reference	
Residence							
Urban area	2	40	42	33.1	1.2	(0.12-11.94)	0.876
Rural area	3	60	85	66.9	1	Reference	

Statistically significant association between Socio-demographics and Marijuana use

Table 4.12: Relationship between socio-demographics factors and un-prescribed medicine use among adolescents

Relationship between Socio-demographic factors and un-prescribed medicines use							
Variable	**Users**		**Non Users**		**OR**	**95% CI**	**p-value**
	N=8	**%**	**N=124**	**%**			
Age							
13-18	5	62.5	95	76.6	1.3	(1.07-2.97)	0.443
19-24	3	37.5	29	23.4	1	Reference	
Gender							
Male	3	37.5	86	69.4	0.3	(0.06-1.17)	0.079
Female	5	62.5	38	30.6	1	Reference	
Religion							
Catholic	2	25	22	17.7	0.6	(0.95-3.24)	0.515
Pentecostal	1	12.5	7	5.7	0.4	(0.04-3.62)	0.382
Muslim	1	12.5	16	12.9	0.8	(0.08-7.73)	0.855
Protestant	4	50	79	63.7	1	Reference	
Tribe							
Mukiga	0	0	8	6.5	_	_	_
Muganda	0	0	5	4	_	_	_
Mutooro	0	0	2	1.6	_	_	_
Mukonjo	0	0	11	8.9	_	_	_
Munyankole	8	100	98	79	1	Reference	
Fathers' Occupation							
Businessman	4	50	50	40.3	0.9	(0.19-4.22)	0.886
Driver	1	12.5	10	8.1	0.7	(0.06-761)	0.78
Armed Forces	0	0	13	10.5	_	_	_
Spiritual leaders	0	0	9	7.3	_	_	_
Civil Servant	3	37.5	42	33.8	1	Reference	
Residence							
Urban area	0	0	44	35.5	_	_	_
Rural area	8	100	80	64.5	1	Reference	

4.4.3 Relationship between other factors and the use of segregated drugs and substances

The other factors that were associated with use of segregated drugs and substances especially tobacco, alcohol, marijuana and "mairungi" were;

4.4.3.1 Tobacco

The other factors that were associated with tobacco use were accessibility and disapproval of use of tobacco. Respondents who thought that it was very easy to access tobacco were 4.1 times more likely to be users compared to those who thought it was very difficult to access tobacco used as reference.(OR=4.1; 95% CI; 2.13-8.02) and this association was statistically significant (p=0.037). Respondents who strongly disapproved tobacco use were 0.7 times less likely to be users compared to those who did not disapprove tobacco use reference.(OR=0.7; 95% CI; 0.13-3.06) and this association was statistically significant (p=0.041)

4.4.3.2 Alcohol

The other factor that was associated with alcohol use was accessibility.

Respondents who thought that it was very easy to access alcohol were 1.3 times more likely to be users compared to those who thought it was very difficult to access alcohol used as reference. (OR=1.3; 95% CI; 0.93-3.14) and this association was statistically significant (p=0.043).

4.4.3.3 Marijuana

The other factor that was associated with marijuana use was having friends who use marijuana.

Respondents who estimated most of their friends were using marijuana were 5.2 times more likely to be users compared to those who estimated none of their friends to be using marijuana used as reference (OR=5.2; 95% CI; 2.78-11.60) and this association was statistically significant (p=0.045).

4.4.3.4 Mairungi

The other factor that was associated with mairungi use was disapproval and respondents who strongly disapproved mairungi use were 0.5 times less likely to be users compared to those who did not disapprove mairungi use (reference).(OR=0.5; 95% CI; 0.16-2.01) and this association was statistically significant (p=0.041).

4.4.4 Relationship between practices of Secondary school adolescents on drug and substance use and different categories of use.

The Relationship between practices of secondary school adolescents on drug and substance use and different categories of use are shown in table 4.13.

Table 4.13: Relationship between practices of Secondary school adolescents on drug and substance use and different categories

Relationship between practices of secondary school adolescents on drug and substance use and different categories

	Use	Alcohol		Tobacco		Mairungi		Marijuana		Solvents		Self medication	
		N/(%)	p-value	N/(%)	p-value	N/(%)	p-value	N/(%)	p-value	N/(%)	p-value	N/(%)	p-value
Ever used	**Yes**	44 (33.3)	NA	11 (8.3)	NA	4 (3.0)	NA	5 (3.8)	NA	0 (0.0)	NA	8 (6.1)	NA
	No	88 (66.7)	NA	121 (91.6)	NA	128 (97)	NA	127 (96.2)	NA	132 (100)	NA	124 (93.9)	NA
User category	**Past**	12 (27.3)	_	5 (45.4)		1 (25)	_	3 (60)	_	0 (0.0)	NA	2 (25)	_
	Current	32 (72.7)		6 (54.6)	0.002*	3 (75)	_	2 (40)	_	0 (0.0)		6 (75)	_
Frequency of use	**Rarely**	13(29.5)	_	2 (18.2)	_	1 (25)	_	2 (40)	_	0 (0.0)	NA	2 (25)	_
	Occasionally	20 (45.5)		3 (27.3)	0.000	1 (25)	_	0 (0.0)	_	0 (0.0)		3 (37.5)	_
	Regularly	11 (25)		6 (54.5)	_	2 (50)	_	3 (60)	_	0 (0.0)		3 (37.5)	_
Duration of use	**> 6months**	18 (40.9)	_	4 (36.4)	_	0 (0.0)	_	1 (20)	_	0 (0.0)	NA	5 (62.5)	_
	< 6months	26 (59.1)		7 (63.6)	_	4 (100)	_	4 (80)	_	0 (0.0)		3 (37.5)	_
Use in past 1 week	**Yes**	14 (31.8)		7 (63.6)	_	2 (50)	_	2 (40)	_	0 (0.0)	NA	1 (12.5)	_
	No	30 (68.2)	_	4 (36.4)	_	2 (50)	_	3 (60)	_	0 (0.0)		7 (87.5)	_
Drugs transaction	**Yes**	0 (0.0)	_	2 (18.2)		2 (50)	_	0 (0.0)	_	0 (0.0)	NA	0 (0.0)	_
	No	44 (100)	_	9 (81.8)	0.000	2 (50)	_	5 (100)	_	0 (0.0)		8 (100)	_

Note Some respondents were using more than one drug/substance and no respondent was using solvents

4.5 Factors that predispose or put one at risk to start using drugs and substances

Above 70% (95/132) of the respondents thought that having a friend who uses drugs/substances was the predisposing factor for one to start using drugs and substances, 12.9% (17/132) thought of having parents who use drugs/substances, 8.3% (11/132) thought of staying in the neighbourhood of drug/substance users, 3% (4/132) thought of transacting in the drugs/substances while 3.8% (5/132) didn't know the predisposing factors for starting drug/substance use. The majority of key informants and focus group discussion members reported that factors that predispose or put one at risk to start using drugs and substances were peer groups, advancement of technology and family problems and one of the key informants elaborated:

"The use of alcohol, tobacco and other substances is on increase among school students; about 3 out of 10 of those who have ever used or are still using could be in a group of users, could have even watched it in movies or are facing family problems like neglect or were initiated by parents/guardians themselves". (KI, CID Officer Sheema Police Station).

CHAPTER 5: DISCUSSION

5.1 Socio-demographic characteristics of respondents

The majority of the respondents were males from rural areas, and Banyankole by tribe. A big proportion of the respondents fathers' were businessmen and least of the respondents' fathers were spiritual leaders. There was a significant association between respondents' fathers' occupation and drug and substance use with respondents whose fathers were in armed forces and business less likely to use drugs/substances.(OR= 0.4, p=0.003 and OR= 0.6, p=0.035) respectively. This could be as a result of family management-which include practices such as parental monitoring and family rules about drug/substance use which were reported to have the strongest and most consistent relationship with drug/substance use in early adolescence as was observed in a previous study conducted in Australia (Habib et al., 2010). The same study by Habib et al., (2010) also found that adolescents reporting higher family management and close relationships with their fathers were less likely to have drunk alcohol in their life-time and less likely to have had an alcohol binge in the preceding fortnight. Though these studies were in different settings of Australia and Uganda they show similar results that could be as a result of family management which has been linked to reducing substance use among adolescents.

5.2 Knowledge of Secondary school adolescents on drug and substance use

5.2.1 Knowledge of Secondary school adolescents on drug and substance use

This study found out that more than half (60%) of the respondents' level of knowledge about drug and substance use was inadequate and this was in agreement with the

Geramian et al. (2012) results of a study about determinants of drug abuse in high school students and their related knowledge and attitude in Iran who found out that the mean knowledge scores were 58.7 +/- 10.3 and 57.9 +/- 10.2 for girls and boys, respectively, which were significantly different ($p = 0.002$).This level of knowledge could be contributing significantly to risky practices of adolescents on use of drugs and substances.

5.2.2 Common drugs/substances used by adolescent students in and around school setting.

The findings revealed that alcohol (33.3%), tobacco (8.3%), un-prescribed medicines (6.1%) and cannabis (3.8%) in that order were the commonly used drugs/substances by adolescents in and around school setting. The findings were in agreement with earlier studies conducted in South Africa and India by Madu & Matla (2003) and Tsering, Pal, & Dasgupta, (2010) respectively where the former found that 39.1% and 10.6% of the participants were drinking alcohol and smoking cigarette respectively. The trends of drug/substance use are similar but with different prevalence of use and this could be due to high urbanization of South Africa as compared to Uganda or due to some regulatory policies in Uganda that could be nonexistent in South Africa or society approval and disproval in these two different states leading to the observed differences.

5.2.3 Places where students get drugs and substances in and around school setting.

Most respondents reported that the sources of alcohol and tobacco cigarettes were bars and shops in centres/town around schools while nearest town, friends and drug dealers were the common sources for khat and cannabis. Sources of un-prescribed medicines were reported to be health centres, school clinics and drug shops/pharmacies. These findings about sources of alcohol by this study were similar to those found out in an earlier study by Fabian, Toomey, Lenk, & Erickson, (2008) on where do underage college students get alcohol? However, the sources of tobacco identified by this study were different from what were identified by Saunders, (2011) where some of the sources were parents or stealing from a store for males while for the females they would give someone money to buy for them. The reported sources of alcohol by the respondents confirm that though we have regulations in Uganda that prohibit bar owners to sell alcoholic beverages to persons under age of 18 years they may not be respected by both bar owners and persons under 18 years hence making accessibility easy in Uganda that can affect the future of these vulnerable adolescents negatively.

5.2.4 Factors that predispose or put one at risk to start using drugs and substances

Having a friend and parent who uses drugs/substances, staying in the neighbourhood of drug/substance users and transacting in the drugs/substances were the factors respondents thought predispose students to start using drugs/substances. These results were in agreement with an earlier study by Pérez et al., (2012) where friends constituted a pressure group to start or continue smoking and starting secondary school marked the beginning of experimental use.

All the identified factors by both studies confirm that immediate members in all environments shape adolescent behaviors and that the period when the adolescents join secondary schools is a

critical period that should be closely monitored in order to prevent bad practices like drug/substance use.

5.3 Attitudes of Secondary School Adolescents towards use of drugs and substances.

5.3.1 Perceived benefits of using drugs and substances by secondary school adolescents.

Some of the perceived benefits of using drugs and substances by secondary school adolescents were relaxing the mind, passing time, socializing, increasing confidence, prestige and medicine. These findings were in agreement with a study by Dechenla et al. (2010) where 'Easy availability' and 'relief from tension' were the most frequent reasons for continuation of substance use. The findings from both studies show that alternative activities and remedies to drug and substance use such as games and sports can also be taken up by these adolescents during their free time when they want to socialize and relax their minds.

5.3.2 Perceived dangers of using drugs and substances by secondary school adolescents.

Causing diseases, poverty/loss of employment and brain damage were what respondents thought as dangers of using drugs and substances. What the respondents perceived as dangers of using drugs/substances were similar to some of the effects of drug abuse cited by MOH (2002) training manual so the use of drugs/substances by these students is not only exclusive to inadequate knowledge but could be due to multiple factors which should be addressed holistically.

5.3.3 The problems/effects the respondents have suffered following drugs/substances use.

Some respondents reported poor academic performance, ill health, broken relationship and being in bad groups as the problems/effects they have had secondary to drug and substance use.

Some of these findings were similar to what was found out in Kenya where drug use behavioral problems included school dropout, poor scholastic attainment, drunken driving, delinquency and adolescence pregnancy (Ndetei, Khasakhala, Mutiso, Ongecha, & Kokonya, 2010)

These reported effects are a confirmation that these adolescents are already suffering and they are aware of the effects hence programs involving fellow adolescents may be effective in preventing these effects in those that have not gotten them or even started using the substances.

5.3.4 Respondents' perceived accessibility of drugs/substances by secondary school adolescents.

Respondents thought that alcohol, tobacco and un-prescribed medicines were very easy to access while marijuana and mairungi were very difficult to be accessed by secondary school adolescents. These results were in agreement with some earlier studies by Fabian et al. (2008) and Pérez et al., (2012). The former found that alcohol was easy to obtain from a variety of sources, with friends/acquaintances who are of legal age or those with a false ID being the most common while the latter found that families encouraged smoking by providing a model to imitate and society tended to accept consumption and buying tobacco was easy for minors. The differences in ease/difficult in accessibility of some of these substances found out by this study in a Ugandan setting which is different from the previous study settings in USA and Spain could be due to the fact that some substances such as marijuana are illicit in Ugandan laws hence making it difficult to access because even the dealers and suppliers could be dealing only with the people they know. On the other hand the easy accessibility for alcohol and tobacco found out by this study in Uganda, that was similar to findings in USA and Spain though in different settings could be due to the fact that all these different settings treat these substances as licit and even not restricted to underage and they could be learning the practices at home as well.

5.4 Practices of in school adolescents on drug and substance use

5.4.1 Use of drugs/substances by secondary school adolescents

Results of this study showed that 36.4% of respondents had ever used drugs/substances while 63.6% had never used any of the drugs/substances of concern. This percentage was higher than what was observed in a study on substance use among adolescent high school students in India where 12.5% of the respondents used or abused any one of the substances irrespective of time and frequency in lifetime; (Dechenla et al. 2010). The observed difference could be due to the setting differences as a result of religious restrictions and disapproval of the use of some of the substances such as alcohol in India as opposed to Uganda where even some tribes/clans even initiate children into drinking in infancy before giving family names. The other probable explanation could be policies in place that restrict some of these substances and whether those restrictive policies are followed or not.

5.4.2 Relationship between socio-demographic factors and the use of drugs/substances

Results of the study showed that occupation of respondents' fathers and residence were associated with of use drugs/substances. Respondents whose fathers were in armed forces and business were 0.4 and 0.6 times less likely to use drugs/substances with p-values of 0.003 and 0.035 respectively. These findings were in agreement with an earlier study conducted in New Zealand where adolescents whose fathers were classified in the lowest-status occupational group were twice as likely as those whose fathers occupied the highest-status occupational group to be daily smokers. (Mariël et al. 2005). This could be due to the fact that adolescents whose fathers are in gainful employment are most likely to monitor their children's behavior both at home and at school in order to ensure proper up-bringing and value for their hard earned resources.

5.4.3 Relationship between socio-demographics and the use of segregated drugs and substances.

The segregated drug/substance that was associated with socio-demographics and relationship statistically significant was alcohol. Respondents whose fathers were in armed forces and business were 0.2 and 0.4 times less likely to use alcohol compared to respondents whose fathers were in civil service used as reference and this association was statistically significant (p=0.001& 0.020) respectively.

This could be as a result of family management-which included practices such as parental monitoring and family rules about alcohol use which were reported to have the strongest and most consistent relationship with alcohol use in early adolescence as was observed in a previous study conducted in Australia. (Habib et al., 2010)

5.4.4 Practices of adolescents on the use of segregated drugs and substances

5.4.4.1 Tobacco

This study also found out that 8.3% of the respondents had ever used tobacco and 54.6% of these were current users while 45.4% were past users. This prevalence was lower than what was observed in a study conducted in Kampala by Mpabulungi & Muula, (2004) where 17.5% of the respondents reported to have ever smoked however the percentage of current smokers in the Kampala study (5.3%) was lower than that observed in this study.

The high prevalence observed in Kampala could be attributed to exposure and easy access to tobacco since even this study found out that those from urban setting were more likely to use drugs and substance as compared to their rural counterparts.

The other factors that were associated with tobacco use were accessibility and disapproval of use of tobacco.

Respondents who thought that it was very easy to access tobacco were 4.1 times more likely to be users compared to those who thought it was very difficult to access tobacco used as reference and this association was statistically significant (p=0.037). Respondents who strongly disapproved tobacco use were 0.7 times less likely to be users compared to those who did not disapprove tobacco use reference, p=0.041. These findings show that all the efforts to address tobacco use reduction should have in built components to address accessibility and attitude issues.

5.4.4.2 Alcohol

A third of the respondents (33.3%) had ever used alcohol of whom 72.7% were current users and 27.3% past users. The percentage of alcohol users observed in this study was slightly lower than what was found out in a study in South Africa where 39.1% of the participants had ever consumed alcohol (Madu&Matla,2003). This study also found out that respondents who thought that it was very easy to access alcohol were 1.3 times more likely to be users compared to those who thought it was very difficult to access alcohol used as reference. (OR=1.3; p=0.043) This observation was in contrast to what was observed by Keryn, Mary, Melissa, Ann, &Leslie, (2009) in a study on alcohol outlets and youth alcohol use: Exposure in suburban areas where results found no relationship between alcohol outlet exposure, using a measure of both distance to and density around students' homes and schools, and alcohol use. Accessibility to alcohol is an important factor that all programs intended for addressing the high prevalence of alcohol use by adolescents should first address if a decline in use is to be achieved.

5.4.4.3 Marijuana

From this study it was found out that 3.8% of the respondents had ever used marijuana 40% of whom were current users which was higher than what was observed in the Best et al., (2005) study where the current users were only 15%. The other factor that was associated with marijuana use was having friends who use marijuana. Respondents who estimated most of their friends to be using marijuana were 5.2 times more likely to be users compared to those who estimated none of their friends to be using marijuana used as reference (OR=5.2; p=0.043) These findings were in agreement with Best et al., (2005) study where in addition to greater likelihood of illicit drug use, lifetime cannabis users were less likely to spend time regularly with both their mothers and fathers, but more likely to spend free time with friends who smoked, drank alcohol and used illicit drugs, and with friends involved in criminal activities.

The percentage of current users was high and posed a great risk to those who had never used marijuana due to the fact that peer influence which was identified by this study as one of the drivers of drug and substance use.

5.4.4.4 Mairungi

The prevalence of khat (Catha edulis) use in this study was found to be 3.0% and was far less than what was found out in the Reda, Moges, Biadgilign, & Wondmagegn, (2012) study which was 24.2%. This study also found out that respondents who strongly disapproved mairungi use were 0.5 times less likely to be users compared to those who did not disapprove mairungi use (reference). Disapproval was the factor found to be protective of khat (Catha edulis) use by this study where as in another study non-using parents had a buffering effect on friends' influences to use substances, such that friends' use did not influence adolescent use when parents were non-users, and the effects of substance offers on refusal were weaker. Reda et al. (2012)

5.4.4.5 Self medication

This study found out that 6.1% of the respondents were users of un-prescribed medicines 75% of whom were current users. This percentage of respondents self medicating was far less than that found out in a study in Brazil where, 86.4% of the respondents self-medicated.

(Corrêa da Silva et al. 2012)

The percentages of 6.1% users of un-prescribed medicines 75% of whom were current users is high and poses a great health risk to the lives of those adolescents and the community at large and could be secondary to laxity in policies that regulate use of medicines and the irrational prescription practices of some service providers.

CHAPTER 6: CONCLUSION, LIMITATIONS, RECOMMENDATIONS AND SUGGESTIONS FOR FURTHER RESEARCH

6.1 Conclusion:

The knowledge of the secondary school adolescents in Kabwohe - Itendero Town Council on drugs/substance use was inadequate, with mixed attitudes and risky behaviors towards drug/substance use hence the need to have school health preventive initiatives implemented through multi sectoral strategies that involve all stake holders.

6.2 Limitations of the study

- This study looked at a wide range of drugs/substances so designed tools were not as exhaustive as would be the case if the study had concentrated on one or two of the studied drugs/substances.
- The findings of this study cannot be generalized to the entire population; they are specific to secondary school adolescents in one region.
- In order to keep the anonymity, the reasons for incompleteness of responses could not be sorted out.
- Follow up of the users could not be done as they were anonymous and even when some opened up in the FGD the researcher could not easily make a follow up since the practice is highly associated with stigma and concealment.
- Recall bias was another limitation since respondents were asked about occurrences that were some time in the past. This was minimized by reducing the questions of frequency of use to a shorter duration.

- Intentional refusal to disclose use or having ever used drugs/substances. This was minimized by ensuring confidentiality and not requiring respondents to include their names on the questionnaires.
- The study design (cross sectional) could not permit follow up and documentation of the effects of drug and substance use among the users.
- The sample size was small and following the proportion to size principle the schools that had very small enrollment had few respondents drawn from each class which could have affected representativeness. This was minimized by strictly following sampling procedure.

6.3 Recommendations

The study found out that knowledge of the secondary school adolescents in KITC on drugs/substance use was inadequate, with mixed attitudes, existent predisposing factors and risky behaviors towards drug/substance use hence the need to have school health preventive initiatives implemented through multi sectoral strategies that involve all stake holders. There far, the following recommendations are guided by the findings.

- Government should enact the Narcotics Drug and Psychotropic substances (control) Bill, 2007 and monitor its implementation in order to halt and start reversing the trends of drug and substance use.
- The ministry of health in collaboration with ministry of education should design Information, Education and Communication programs and messages targeting all the in-school adolescents, out of school adolescents and the general population that would address the identified knowledge gap and mixed attitudes in a bid to halt and reverse the trends.

- The Kabwohe – Itendero Town Council leadership in collaboration with the police, DHT, schools administration, parents and Non Government Organizations should carry out routine community sensitisation about the dangers of drug/substance use since all these stakeholders were identified by majority of Key Informants as people who can lead the campaign.
- The district health team should closely monitor all the facilities (public, private not for profit and private for profit) under its jurisdiction on prescription practices and rational use of medicines in order to address the public health concern of un-prescribed medicines use.

6.4 Suggestions for Further Research

- The academia should conduct more research in the same area on the use of individual segregated drug/substance and further explore the protective and predisposing factors of use as they were identified by this study.
- The adolescents out of school in the same study area should also be studied in order to make comparisons and inform policy and interventions.
- Research should be conducted about the factors responsible for high percentage use of un-prescribed and over the counter medicines by adolescents and general population in KITC and Sheema District in order to document the practices and plan how to reverse the trends and prevent the effects of using un-prescribed medicines.

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Consent Form for Parents/Guardians

Assessment of knowledge, Attitudes and Practices on drug and substance use among secondary school adolescents in kabwohe-Itendero Town Council Sheema District

Consent Form for Parents/Guardians

I have read the **Information Sheet for Participants** for this study and have had the details of the study explained to me. My questions about the study have been answered to my satisfaction, and I understand that I may ask further questions at any time.

I also understand that students (adolescents) are free to withdraw from the study at any time, or to decline to answer any particular questions in the study. I agree to consent on behalf of the students (adolescents) who will also assent to provide information to the researchers under the conditions of confidentiality set out on the **Information Sheet**.

I consent on behalf of students to participate in this study under the conditions set out in the **Information Sheet** form.

Signed: _____

Name: _____

Date: _____

Researcher's Name and contact information: **MABUGA WILLIAM 0772396614**

Supervisor's Name and contact information: **DR NABANKEMA EVELYN- UCU**

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I agree to participate in this study under the conditions set out in the **Information Sheet** form.

Signature or thumb print: _____

Date: _____

Researcher's Name and contact information: **MABUGA WILLIAM 0772396614**

Supervisor's Name and contact information: **DR NABANKEMA EVELYN -UCU**

QUESTIONNAIRE TO ASSESS KNOWLEDGE, ATTITUDES AND PRACTICES(KAP) ON DRUG AND SUBSTANCE USE AMONG SECONDARY SCHOOL GOING ADOLESCENTS IN KABWOHE –ITENDERO TOWN COUNCIL SHEEMA DISTRICT

I am called Mabuga William a student from Uganda Christian University-Mukono offering Master of Public Health. I am carrying out an Assessment on the KAP on drug and substance use among secondary school-going adolescents in Kabwohe-Itendero Town Council, Sheema District. The data obtained from this study will be used as basis of designing or revising the strategies aimed at reversing the trend of drug and substance use among secondary school-going adolescents. Your participation is voluntary and your responses will be treated with confidentiality. Thank you.

INSTRUCTIONS

1. Don't put your name on the questionnaire.
2. Answer all questions
3. Where you have not understood ask the investigator/ assistant
4. Circle the correct alternative for Multiple Choice Questions or fill in/write in.

Demographic Data

1. How old are you? (Age)……. (Only respondents 10- 24 years are eligible)

2. Are you male or female (Sex) A) Male B) Female (***CIRCLE ONE***)

3. What Class are you in? A) S.1 B) S.2 C) S.3 D) S.4 E) S.5 F) S.6

4. What is your religion?

I) Protestant
II) Roman catholic
III) Pentecostal (born again)
IV) Muslim
V) Other specify…….

5. What is your tribe? A) Munyankole B) Mukiga C) Mukonjo D) Mutooro E) Muganda

F) Other specify……..

6. What is your father's occupation? A) Civil servant B) Businessman C) Driver

D) In armed Forces E) Spiritual leader F) other specify…….

7. During most of the past 12 months, have you been living in a rural/village, town or city? (**CIRCLE ONE CODE**)

A) Rural area (or village)
B) Urban area (Town or City)

KNOWLEDGE OF SECONDARY SCHOOL ADOLESCENTS ABOUT DRUG AND SUBSTANCE USE

8. To you, what is a drug?.....

9. To you, what is a substance?.....

10. According to you which of the following best describes drug use?***(CIRCLE ONE)***

A) Using medicines according to prescription/direction for treatment purposes
B) Pattern of harmful use of any drug for mood-altering purposes including illegal drugs
C) Using tradition preparations for management of common diseases
D) I don't know.

11. According to you which of the following best describes substance use?***(CIRCLE ONE)***

A) Using substances for purposes they are intended for
B) Pattern of harmful use of substances for mood-altering purposes
C) Using tradition preparations for management of common diseases
D) I don't know.

12. What are the common items used in and around the school setting by students? (***CIRCLE APPROPRIATE ONES***)

A) Alcohol
B) Tobacco through smoking
C) Khat 'Mairungi"
D) Cannabis (marijuana/njaga/weed/enzayi)
E) Sniffing volatile liquids such as petrol and glue
F) Medicines such as Valium (Diazepam) or piriton or dexamethasone or prednisolone orAmoxycillin (Amoxil) or MCG tube (not prescribed/given by nurse or Doctor/ other health worker)
G) Other medicines that are used but not given by nurse or Doctor/health worker, name them…….

13. Where do students get the followings items listed belowin and around the school setting?

A) Alcohol…….

B) Tobacco and Cigarettes……

C) Khat 'mairungi"……

D) Cannabis (marijuana/njaga/weed/enzayi)…….....

E) Sniffing volatile liquids such as petrol and glue……...

F) Medicines such as Valium (Diazepam) or piriton or dexamethasone or prednisolone or Amoxycillin (Amoxil)or MCG tube……..

14. What are the factors that predispose or put one at risk to start using drugs and substances? (***CIRCLE ONE***)

A) Having a friend who uses the drugs/substances
B) Having parents who use the drugs/substances
C) Proximity (staying near where they are kept or sold)
D) Transacting in them such as selling them
E) I don't know.

15. What could be the effects of drug and substance use on the adolescents in secondary school? (***WRITE IN BELOW)***

…….

……..

……..

16. Do you think practices such as tobacco smoking, chewing mairungi and drinking alcoholby secondary school adolescents has effect on HIV/AIDS trends (such as spread and transmission)? **(CIRCLE ONE)**

YES NO

17. If you answered **YES** above how?

…….

…….

ATTITUDES TOWARDS USE OF DRUGS AND SUBSTANCES

18. What are the perceived benefits or dangers from the use of the drug or substances listed below on one's health, education and general social being? (***WRITE IN SPACES PROVIDED***)

Drug or Substance	**Perceived benefit/ danger of use**
Alcohol	Perceived benefit ……
	Danger of using ……
Smoking Tobacco	Perceived benefit ……
	Danger of using ……
Chewing mairungi (Khat)	Perceived benefit ……
	Danger of using ……
Smoking marijuana /weed /enjaga/ enzayi	Perceived benefit ……
	Danger of using ……
Sniffing petrol/glue or other volatile substances	Perceived benefit ……
	Danger of using ……
Regular use of medicine not ordered by doctor/nurse/ or Amoxycillin (Amoxil) or MCG tube	Perceived benefit ……
	Danger of using ……

19. Individuals differ in whether or not they disapprove of people doing certain things. Do you disapprove of people using drugs/substances such as alcohol, tobacco/cigarettes, khat (mairungi), cannabis (marijuana/njaga/weed/enzayi), petrol and regular use of medicines not ordered by doctor/nurse/health worker {such as diazepam (valium), piriton and others}?(***CIRCLE ONE FOR EACH***)

Drug or Substance	**Estimated No. of friends who use it**
Alcohol	A) Don't disapprove
	B) Disapprove
	C) Strongly disapprove
Smoking Tobacco	A) Don't disapprove
	B) Disapprove
	C) Strongly disapprove
Chewing mairungi (Khat)	A) Don't disapprove
	B) Disapprove
	C) Strongly disapprove
Smoking marijuana /weed /enjaga/ enzayi	A) Don't disapprove
	B) Disapprove
	C) Strongly disapprove
Sniffing petrol/glue or other volatile substances	A) Don't disapprove
	B) Disapprove
	C) Strongly disapprove
Regular use of drugs not ordered by doctor/nurse/	A) Don't disapprove
health worker such as valium or piriton or	B) Disapprove
predinisoline or dexamethasone or MCG tube	C) Strongly disapprove

20. How many of your friends would you estimate to use any of the following drugs and substances listed in the table below? For each of the drug and substance tick only one option.

Drug or Substance	Estimated No. of friends who use it
Alcohol	A) None of them
	B) Some few of them
	C) Most of them
	D) All of them
Smoking Tobacco	A) None of them
	B) Some few of them
	C) Most of them
	D) All of them
Chewing mairungi (Khat)	A) None of them
	B) Some few of them
	C) Most of them
	D) All of them
Smoking marijuana /weed /enjaga/ enzayi	A) None of them
	B) Some few of them
	C) Most of them
	D) All of them
Sniffing petrol/glue or other volatile substances	A) None of them
	B) Some few of them
	C) Most of them
	D) All of them
Medicines not ordered by doctor/nurse/	A) None of them
health worker such as Diazepam (valium) or piriton or	B) Some few of them
predinisoline or dexamethasone or	C) Most of them
Amoxycillin/Amoxilor MCG tube	D) All of them

21. Have you ever used any of the drugs/substances such as alcohol, tobacco/cigarettes, khat (mairungi), cannabis (marijuana/njaga/weed/enzayi), petrol and regular use of medicines not ordered by doctor/nurse/health worker {such as diazepam (valium), piriton and others}

(CIRCLE ONE)

YES …… NO……..

22. If you answered yes to question 18 above, has the use of any of the drugs and substances listed below in the table caused you any of the problems below?***IF YES TICK THE DRUG/SUBSTANCE AND THE EFFECT ITCAUSED***

Drug/substance	**Effect of using the drug or substance caused or resulted in**
Alcohol	A) Behave in the way you later regretted such as bad groups
	B) Hurt your relationship with your parents or teachers
	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED THISDRUG/SUBSTANCE**
Smoking Tobacco	A) Behave in the way you later regretted such as bad groups
	B) Hurt your relationship with your parents or teachers
	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED THISDRUG/SUBSTANCE**
Chewing mairungi (Khat)	A) Behave in the way you later regretted such as bad groups
	B) Hurt your relationship with your parents or teachers
	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED THISDRUG/SUBSTANCE**
Smoking marijuana /weed /enjaga/ enzayi	A) Behave in the way you later regretted such as bad groups
	B) Hurt your relationship with your parents or teachers
	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED THISDRUG/SUBSTANCE**
Sniffing petrol/glue or other volatile substances	A) Behave in the way you later regretted such as bad groups
	B) Hurt your relationship with your parents or teachers
	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED THISDRUG/SUBSTANCE**
Regular use of medicine not ordered by doctor/nurse/	A) Behave in the way you later regretted such as bad groups
health worker such as valium or piriton or predinisoline	B) Hurt your relationship with your parents or teachers

or dexamethasone or Amoxycillin/ Amoxilor MCG tube	C) Hurt your relationship with your friends including boy/girl friend
	D) Affected your academic performance negatively
	E) Bad /ill health
	F) Commit a crime or break the law
	G) **NEVER USED ANY THESEDRUGS/SUBSTANCES**

23. How easy/difficultdo you think it would be for a student to get or access any of the following types of drugs and substances listed below if he/she wanted some?(***CIRCLE ONE***)

Drug or Substance	**Estimated No. of friends who use it**
Alcohol	A) Very Easy
	B) Fairly Easy
	C) Fairly Difficult
	D) Very Difficult
Smoking Tobacco	A) Very Easy
	B) Fairly Easy
	C) Fairly Difficult
	D) Very Difficult
Chewing mairungi (Khat)	A) Very Easy
	B) Fairly Easy
	C) Fairly Difficult
	D) Very Difficult
Smoking marijuana /weed /enjaga/ enzayi	A) Very Easy
	B) Fairly Easy
	C) Fairly Difficult
	D) Very Difficult
Sniffing petrol/glue or other volatile substances	A) Very Easy
	B) Fairly Easy
	C) Fairly Difficult
	D) Very Difficult
Medicines not ordered by doctor/nurse/	A) Very Easy
health worker such as Diazepam (valium) or piriton or	B) Fairly Easy
predinisoline or dexamethasone or	C) Fairly Difficult
Amoxycillin/Amoxilor MCG tube	D) Very Difficult

Give reasons for your choice above

……
……
……

PRACTICES OF IN SCHOOL ADOLESCENTS ON USE OF DRUGS AND SUBSTANCES

Question 24	Drugs and substances					
	Tobacco	**Alcohol**	**Cannabis/ marijuana**	**Mairungi/ Khat**	**Volatile inhalants**	**Medicines not prescribed/ given by Doctor/nurse**
(a) Have you ever used the following? Tick one appropriate answer	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….
(b) If you have ever used any of the above have you used it in the past (past user) or you are currently using it (current user)?	Past user …… Current user ……	Past user …… Current user ……	Past user …… Current user ……	Past user …… Current user ……	Past user …… Current user ……	Past user …… Current user ……
(c) How old were you when you started using? (age in years) or NA If you have never used	……..	……..	……..	……..	……..	……..
(d) How often were you using (past users) or are you using (current users)	Rarely…… Occasionally….. Regularly……..	Rarely…… Occasionally….. Regularly……..	Rarely…… Occasionally….. Regularly……..	Rarely…… Occasionally….. Regularly……..	Rarely…… Occasionally….. Regularly……..	Rarely…… Occasionally….. Regularly……..
(e) For how long did you use if you have stopped? (write the duration of use in spaces)	……	……	……	……	……	……
(f) For how long have you used if you are still using? (write the duration of use in spaces)	……	……	……	……	……	……

(g) How many of the following do you use in a day? (write in the number you use or NA if you have never used)	……	……	……	……	……	……
(h) If you have ever used or still using who initiated you to start (WRITE IN CATEGORY OF THE PERSON AND NOT THE NAME)	……	……	……	……	……	……
(i) If you have ever used but stopped what prompted you to stop?	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……
(J) Have you used any of the above for more than six (6) or more months?	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….
(K) Why did you start usage of the following?	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……
(l) Have you used the following in the past one (1) week?	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….	Yes…….. No…….
(m) In what ways have you used the following?	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……	…… …… …… ……

(n) Have you ever transacted (buying and selling)of the following for your own use?	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….
(o) Have you ever had sexual intercourse?	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….
(p) How old were you when you first had sexual Intercourse	……	……	……	……	……	……
(q) Have you ever had sexual intercourse after using	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….
(r) Was the sex protected like using a condom	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….	Yes……. No…….

THANK YOU VERY MUCH FOR YOUR TIME

FOCUS GROUP DISCUSSION GUIDE

QUESTIONS

1. What is drug and substance use?

2. What are the common drugs and substances used by the school going adolescents in and outside school setting?

3. What are the drivers for the drug and substance use among school going adolescents?

4. What are the sources of these drugs and substances used in the school setting?

5. What is your general opinion about people that use drugs and substances especially the school going adolescents?

6. Do you think drug and substance use can affect the trends of HIV/AIDS in anyway? How?

7. Do you think there are some in-school (secondary) adolescents that transact in some of these drugs and substances of abuse in school or outside school?

8. What are your comments on smoking in public?

9. What are the common sources of information about drugs and substance use and which areas do they cover?

10. What are some of the policies and regulations on drug and substance use?

11. As an adolescent which drug and substance use control strategy would you advocate for?

Thank you very much

Key informant Interview guide for teachers, prefects, health workers and police officers on drug and substance use by adolescents in secondary schools

Questions

1. Level of school 1- O' Level 2- A' Level [ ]

2. Ownership 1- Government 2- Private [ ]

3.Interviewee's designation…….

4.Qualification…….

5.Have you ever heard of drug and substance abuse?

1- Yes 2- No [ ]

6. Have you seen any secondary school adolescent using, buying and transacting in drug or substances such as alcohol, tobacco, khat, marijuana or sniffing volatile solvents like petrol? 1- Yes 2- No [ ]

If yes where……..

7. What are the common drugs and substances used by the school going adolescents in or outside school?

……...

……...

……..

8. What are the drivers for drugs and substances use?

……

……

……

9.What are the sources of the drugs and substances used by adolescents in and outside school setting?

…….

…….

10.When are the drugs and substances commonly used?

……

……

11.What are your attitudes/ perceptions of an adolescent that uses drugs/substances of abuse?

……..

…….

12.Do you think drug and substance use can affect the trends of HIV/AIDS in any way?

1- Yes 2- No [ ]

If yes how?

……

……

13.Do you think there are in-school adolescents that transact in some of the drugs and substances of abuse?

1- Yes 2- No [ ]

If yes

14.Who? (Their characteristics and not names) Where?

…….. ……

…….. ……

15.Have you ever had an opportunity to discuss or address any gathering of in school adolescents on drug and substance use?

1- Yes 2- No [ ]

If yes

Where?

……

……

16.In your own view who, where and when should such a topic be discussed with in-school adolescents?

Who……

Where…….

When…….

17.What could be your comments on smoking in public and what can be done about it?

…….

…….

18. What drug /substance use control strategy would you propose/advocate for?

……

……...

THANK YOU VERY MUCH FOR YOUR TIME

MAP OF SHEEMA DISTRICT SHOWING TOWN COUNCILS AND SUBCOUNTIES